

Culinary Herb Gardening

Kentucky GROW



The goals of this module are:

Herbs have been defined simply as “the useful plants,” so that definition encompasses trees (black birch), shrubs (bay), vines (passionflower), annuals (basil), and perennials (thyme). Herbs are used for cooking, fragrance, repelling insects, medicine, dyeing fabric, decoration, and even as fertilizer and furniture polish. This module explores the most common use of herbs: that of adding them to foods to enhance flavor and presentation.

What you need:

Determined by selected project.

How to prepare:

Because herbs are such a diverse group of plants, learning about them can be done in several ways:

- Participants make the recipes included in this module using fresh herbs collected at the site. Have a tasting as the facilitator discusses how to grow and use herbs.
- The presenter brings food made with herbs. Participants snack after making a living herbal wreath (directions below) to take home.
- Participants plant an herb garden (see Planting Module).
- Participants plant herbs in containers (See Container Planting Module).
- Participants start herb plants from seed (See Seed Starting Module).
- Enhance any of the above activities with exposure to herbs of other cultures. Bring in plants or the dried herbs so participants can experience how they look, smell, and feel. If possible, arrange to have someone native to another country discuss how the herbs are used in his or her homeland.

If consuming herbs, the facilitator should make all participants aware of the ingredients used, so that anyone with allergies can avoid ingesting anything that might cause a reaction. A good idea might be to print up the recipes ahead of time, making enough copies for everyone to take home. When making teas, be certain of the identity of the plants. Do not allow anyone to contribute herbs that you are unsure of as to their palatability and safety. Wild-collected plants shouldn't be used unless collected by a botanist. There is a potential for poisoning with misidentified plants.

The kitchen tools required for the recipes are common ones, and a kitchen is necessary only for the lemon-balm cookies (although a kitchen might make it easier to prepare the other recipes). Caution should be exercised when handling sharp knives, and a first-aid kit should be handy, as well as a place to clean hands.

Sphagnum moss is used as the base for the living herbal wreath, and this particular moss has been implicated in harboring a microorganism that might cause skin problems in those with compromised immune systems. People building the wreath should wear gloves (gardening gloves are fine) and long sleeves.

The program:

How to use fresh herbs

Pick herbs when they are at their best –before they have begun flowering or setting seed. The best time of day to collect herbs is early in the morning. Choose leaves without disease or insects, and re-inspect before using (sometimes these are not visible until you get back in the house). Rinse under water and pat dry.

Small bunches of herbs can be wrapped in paper towels, then placed in plastic bags and stored in the crisper drawer of the refrigerator. Store large bunches upright in glass jars in the refrigerator. Set the stems in an inch or two of water and cover loosely with plastic wrap.

In most recipes, use twice as much fresh herb as dried. When making long-cooking dishes such as stews and soups, add fresh herbs 20 minutes or so before serving. Uncooked dishes such as salad dressings and marinades tend not to release the full flavor of the herbs. Taste before serving and adjust as necessary.

How to preserve herbs

Collect herbs in the late morning, before the heat of the day but after the dew has dried. Cut with scissors or hand pruners rather than breaking the stems or tugging on the plants. Take no more than two-thirds of the plant's top growth (in late fall, cut no more than one-third of perennials such as sage). Select only blemish-free foliage, and try to collect when the flavors are at their peak, which is right before the flower buds open. Gently rinse the herbs under the faucet or swirl in a bowl of water. Pat dry with paper towels or whirl the cuttings in a salad spinner.

There are several methods for drying herbs. The most traditional method is to hang them in a hot (80 degrees or above), dark place with good circulation. A garage, attic, or covered porch is ideal. Separate into small bundles to speed the drying process, binding them with rubber bands. The rubber bands will hold tight to the stems as they dry and shrink. If you are worried about dust getting on the herbs, cover them with a paper bag that has slits in the sides for circulation.

Herbs can also be dried flat on a drying tray. Do not overlap the herbs, as poor circulation will produce uneven drying and a possibility of spoilage. Galvanized-metal screens might react with plants to produce off flavors or even toxic compounds – use plastic or nylon instead.

Drying herbs in a microwave works quite well, as it takes much less time and the herbs retain more of their color, form, and in some cases, their flavor. To dry in the microwave, place on a microwave-safe plate between two paper towels. Dry slowly, stopping to check every 30 seconds for doneness. Herbs that dry well with this method include bay, tarragon, rosemary, sage, and thyme.

The herbs will be dry if they crumble when crushed. If the leaves bend or feel leathery, continue drying. Strip leaves off the stems and store in tightly closed containers out of direct sunlight.

Herbs can be frozen, but keep in mind that they will not be very pretty after they are defrosted, so freeze herbs that will be used in soups and cooked sauces. Although not cosmetically appealing,

herbs that lose their flavor when dried traditionally do keep their flavor when frozen – chives, cilantro, lovage, and parsley are best when frozen.

Recipes using herbs

There are lots of cookbooks with recipes for using herbs, but here a few simple recipes that highlight herbs.

Mint Lemonade

Preparation Time: 5 minutes

Serves: 16

Tools: one-gallon pitcher, mixing spoon with a long handle

Ingredients:

Generous handful of any variety of mint

1 gallon lemonade

Ice

Wash mint and remove any diseased or off-color leaves. Roll the mint between the hands to crush the leaves, and place in a gallon pitcher. Pour lemonade over the mint leaves, let sit for a few minutes, then serve over ice. Add a spring of mint for decoration.

Guacamole

Recipe from Jackie Diachun, Master Gardener and Lexington Herb Guild member

Preparation Time: 10 minutes

Serves: 6

Tools: knife, fork, mixing bowl, measuring spoons, ¼ cup measuring cup, mixing spoon.

Ingredients:

2 ripe Haas avocados

2 Tbs lemon juice

6-8 Tbs tomato salsa of choice

4 Tbs mayonnaise

2 Tbs onion powder (optional)

¼ cup cilantro, minced

Peel and cut avocados in half. Place in small mixing bowl with the lemon juice and mash with a fork. Mix in the remaining ingredients. Serve with pita triangles, crackers, or taco chips. If made ahead of time, cover with plastic wrap, pressing the plastic wrap onto the surface of the guacamole before storing in the refrigerator.

Lemon Balm Cookies

Recipe from Del Osborne, Lexington Herb Guild member

Preparation Time: 20 minutes to mix and cut, plus 3 hours of refrigeration time

Cooking Time: 8 – 10 minutes per batch

Serves: Makes about 2 dozen

Tools: Measuring cups and spoons, mixing bowls, rolling pin, 2-inch round cookie or biscuit cutter, knife for mincing the lemon balm, plastic wrap, refrigerator, oven, spatula, cookie pan, cooling rack, electric mixer, mixing spoon, timer, hot pads or mitts, cookie plate or storage container.

Ingredients:

2 Tbs minced lemon balm, plus about 2 dozen whole leaves

1 tsp vanilla extract

2/3 cup sugar

1 cup butter, at room temperature

1 egg

2 1/3 cup all-purpose flour

1/4 tsp salt

Combine the minced lemon balm with the vanilla in a small dish. Mash them together with the back of a spoon to bring out the flavor. In a large bowl, cream the sugar and the butter together until light and fluffy. Add the egg and the lemon balm/vanilla and mix in. In a medium bowl, mix together the salt and the flour. Gradually add the flour/salt to the other ingredients. Cover and refrigerate 3 hours until firm. Heat the oven to 350 degrees. Roll out the dough to 1/8-inch thick, and cut into 2-inch or smaller rounds. Press a lemon balm leaf into the top of the cookie. Bake 8-10 minutes or until a light golden color. Remove to a cookie rack and cool.

Herbal Tea

Preparation Time: 10 minutes

Serves: 1

Tools: Tea kettle or saucepan, measuring cup, measuring spoons, tea ball or strainer, spoon, teacup, hotplate/stove/electric kettle/microwave.

Ingredients:

1 cup water

2 Tbs fresh herb of your choice, alone or in the one of the following blends:

Suggested combinations:

- spearmint and lemon balm
- marjoram, anise, and lemon verbena
- anise and chamomile
- lemon verbena and borage
- blueberry leaf, beebalm, and ginger
- savory, lemongrass, and scented geranium
- rose petals, rose hips, and raspberry leaf
- chicory, ginseng, and cinnamon
- basil, lemon thyme, and lemongrass
- chamomile and apple mint

Bring the water to a rolling boil, then pour over the herbs. Let steep for about five minutes. Strain out the leaves after it reaches the desired strength. Serve with honey, lemon, or orange slices. To make 4 cups of tea, use 10 tablespoons fresh herbs. Use half the amount of herbs if using dried. Disposable paper tea bags for making your own tea can be bought from: The Cook's Corner, 1-800-729-9030, www.cookscorner.net. Tea bags can also be made from inexpensive muslin (wash with unscented detergent before using).

Making a living herbal wreath

Time required: About 1 hour

What you need:

- Strip of ½-inch-mesh chicken wire, 3 inches wide by 14 to 18 inches long. Do not remove the loose prongs.
- Sphagnum moss, 3 to 4 large handfuls. Available from a florist or floral supply house.
- 3 or 5 gallon bucket
- Water
- Tin snips or wire cutters
- Needle-nose pliers
- 5 to 7 three-inch pots of herbs
- Floral wire
- Plastic tablecloth to keep table dry
- Rags or towels to mop up water

Soak the sphagnum moss in water in the bucket until it is wet throughout (this takes about 15 minutes). Fold up the long side of the chicken wire so that it curls up to form a trough. Squeeze water out of the moss until it is not dripping wet, then pack it tightly into the chicken-wire trough. Bend the sides of the trough together until they overlap slightly. With the needle-nosed pliers, bend the loose prongs to form little hooks, then hook into the mesh hole on the opposite side of the seam. Make a circle and fasten the ends with short lengths of floral wire. With your fingers or a similar tool, create holes in the moss and place an herb in the hole. Let the herbs grow horizontally for a week or so, then hang on an outside wall (a protected west- or east-facing wall works best). When the moss starts to dry out, take down the wreath and soak it for 15 minutes in a tub of water with a dilute solution of plant fertilizer. In about 6 weeks, you should have a fully-covered wreath.

Source: Peggy Armstrong, as cited in Rodale's Illustrated Encyclopedia of Herbs, Rodale Press, 1987.

How to grow and use the most common culinary herbs

Basil — *Early Greek physicians thought basil seeds would grow better if the sower shouted and cursed as the seeds were planted.*

Use in: Tomato sauce, pesto, bean dishes, vinegar, oil, vegetable dishes.

Best flavor: Fresh. Best stored in oil, in vinegar, or frozen.

How to grow: An annual, basil doesn't like cold weather and does best in full sun. It likes well-drained, rich soil with consistent moisture. Keep pinching to produce leafy, full plants.

Chives – *The American colonists brought chives with them from Europe. Some believed chives had the power to drive away disease and evil.*

Use in: Anything that might call for onion.

Best flavor: Fresh. Flowers are also edible. Chives do not dry well.

How to grow: Chives come up slowly but easily from seed, which also makes them a bit of a pest in the garden if it suits them. They are perennial, and do best in full sun or partial shade in moist soil. Cut down to the ground after flowering to rejuvenate.



Dill – *Swallowtail butterfly larvae love the foliage.*



Use in: Tossed salads, dips and spreads. Add to fish, eggs, cabbage, cucumbers, green beans, and potatoes.

Best flavor: Fresh. Whole seed is best. Freeze on the stem.

How to grow: A hardy annual, dill is easy to grow. Sow directly into loose, rich soil after the threat of frost is past. Grow in full sun but protected from the wind. There are also varieties available that are shorter or have bronze foliage.

Lemon Balm – *Its scientific name means “honey bee” in Greek, alluding to this plant’s ability to attract scores of honey bees when flowering.*

Use in: Salad dressing, stuffing, tossed salad, marinated vegetables, chicken salad, punch, teas, and cookies.

Best flavor: Fresh, but it dries well also.

How to grow: Lemon balm is a perennial. Stem cuttings or divisions are the best way to start it, and it is easy to start from seed. It grows best in full sun, and usually sulks the first year it is planted out.

Mint – The Pharisees of the Bible paid their tithes in mint, and it was once used as a remedy for mad-dog bites and sea-serpent stings.

Use in: Teas, alcoholic drinks, fruit salads, jelly, candy, marinades.

Best flavor: Fresh. Dried or frozen are poor seconds.

How to grow: Mints are notoriously hardy and will take over a garden if not restrained. They spread by underground stolons, so plant in a pot sunk into the soil or surround the roots with a 10-inch-deep metal barrier. They do not come true from seed, and peppermint is a sterile cross that produces no seed at all. Grow in full sun or partial shade in rich, moist soil. Mint should be cut back frequently for the best appearance.

Oregano – This is a catchall name for a group of closely related plants.

Use in: Tomato sauces, cheese-and-egg combinations, marinated vegetables.

Best flavor: Fresh, but dried is fine also.

How to grow: A perennial, oregano needs full sun and a well-drained soil. Lots of plants sold as oregano look nice but have no flavor, so pinch a small leaf off at the nursery and taste it before buying.



Parsley – Grecian race horses were given parsley to increase their stamina. Parsley pound for pound has more vitamin C than oranges.



Use in: Tabbouleh, salsa, gazpacho, sauces, potato dishes.

Best flavor: Fresh. Does not hold its flavor when dried. Frozen parsley is OK.

How to grow: Parsley is often grown as an annual even though it is truly a biennial (lives for two years, producing seed the second year, then dies). Frequently pinch back the outside stems and remove all flower stems. Grow in full sun in well-drained soil.

Rosemary – Legend has it that if a rosemary bush grows vigorously in a family’s garden, it means the woman heads the household.

Use in: Roasted meat dishes, potato soup, salad dressing, cream sauces.

Best flavor: Fresh, although dried is very good.

How to grow: Rosemary is an evergreen perennial, but occasionally a cold winter in Kentucky will kill it. Some gardeners pot it up and bring it indoors for the winter. Outside, well-draining soil is essential. Do not overwater.



Sage – At one time, the Chinese so prized sage that they traded their own green tea for it in a ratio of four to one.



Use in: Stuffing, omelets, sausages, fritters, soups, and marinades.

Best flavor: Both fresh and dried have good flavor, although they taste slightly different.

How to grow: Sage is a woody perennial that requires full sun and well-drained soil. Harvest only once the first year, no later than September. In the following years, harvest as needed. Consider replacing the plant after its third year, as its beauty begins to wane and leaf production slows down.

Thyme – In World War I thymol (the essential oil) was used as a battlefield antiseptic. It is still used in some cough medicines and mouthwashes.

Use in: Clam chowder, meat dishes, stuffing, pate, sausage, stew, stocks, bread, mayonnaise, casseroles.

Best flavor: Fresh, but can be dried or frozen.

How to grow: Thyme is a perennial and grows best in full sun. There are many different varieties, and just about all are easy to grow. They do fine in poorer soils as long as they are well drained. Replace every three years or so if they become woody and scraggly.



Herbs NOT to grow

If planting a community or public garden, take care not to grow plants that can be harmful if ingested or touched. This same warning applies to those whose household includes small children or the mentally disabled. The following plants have been used historically as herbs, but are best left alone:

Aconite	<i>Aconitum napellus</i>
American Hellebore	<i>Veratrum viride</i>
Black Hellebore	<i>Helleborus niger</i>
Angelica	<i>Angelica archangelica</i>
Arnica	<i>Arnica montana</i>
Autumn Crocus	<i>Colchicum autumnale</i>
Bloodroot	<i>Sanguinaria canadensis</i>
Blue Cohosh	<i>Caulophyllum thalictroides</i>
Comfrey	<i>Symphytum officinale</i>
Deadly Nightshade	<i>Atropa belladonna</i>
Foxglove	<i>Digitalis purpurea</i>
Hemlock	<i>Conium maculatum</i>
Jimsonweed	<i>Datura stramonium</i>
Juniper	<i>Juniperus sp.</i>
Lobelia	<i>Lobelia inflata</i>
Mayapple	<i>Podophyllum peltatum</i>
Mistletoe	<i>Phoradendron serotinum</i>
Pennyroyal	<i>Mentha pulegium</i>
Pokeweed	<i>Phytolacca americana</i>
Rue	<i>Ruta graveolens</i>
Sassafras	<i>Sassafras albidum</i>
Sweet flag	<i>Acorus calamus</i>
Tansy	<i>Tanacetum vulgare</i>
Wormwood	<i>Artemisia absinthium</i>

Accommodations for this program:

As with all Kentucky GROW programs, providing needed accommodations is an individualized process. Below are some ideas to get you started, but the best route to take is to listen to the person, as he or she will usually have the best ideas of all!



For those with mobility impairments, ensure adequate leg and knee clearance under all work tables. Ensure that all materials are placed at an accessible height and reach. Consider providing smaller portions of mixes and mulches rather than large, heavy bags. Consider a lapboard for a person using a wheelchair if accessible tables are not available. If planting is part of this module, adaptive gardening tools can be beneficial to help increase reach and efficiency for gardeners (see Starting Seeds Module for more information).



For those who have cognitive impairments, consider working as a team for this module. Use photos or pictures to demonstrate each step. Enable participants to have choices and take part at whatever level they are comfortable. Provide options as to what herbs can be planted.



For those with learning disabilities, provide the information in a variety of methods. Some individuals learn best by hearing the instructions; others will prefer to see the step by step procedure in writing with pictures or photos, or have the instructions on tape. Written instructions will also be helpful for those with hearing impairments. Provide pictures of the plants at different times in the growing season as well as pictures of foods prepared with the herbs used in this program.



For individuals with visual impairments, review placement of the needed materials. Don't move items without informing the person. Ensure that the area is well lit. A magnifying glass can make materials easier to see. Provide any written instructions in large print and other alternative formats as requested. If planting is part of this module, small herb seeds can be mixed with fine sand or used coffee grounds to make sowing easier. Some small seed is also available in a larger pelleted form. There are seed dispensers available, also. Seed tapes are seeds sealed in biodegradable paper slips that are planted directly in the ground. Or make your own with 1" strips of newspaper and a flour-and-water paste. Space the dabs of paste according to the proper spacing of your seeds (see Starting Seeds Module for more information). Label all planted herbs with contrasting colors (i.e. black text on a white background) or Braille markers.

Where to go from here:

HO-73 Medicinal Herb Seed and Root Sources for Planting in Kentucky, University of Kentucky College of Agriculture Cooperative Extension Service Publication.

HO-74 Culinary Herbs, University of Kentucky College of Agriculture Cooperative Extension Service Publication.

ID-2 Some Plants Of Kentucky Poisonous to Livestock, University of Kentucky College of Agriculture Cooperative Extension Service Publication.

The Herb Society of America New Encyclopedia of Herbs and Their Uses, by Deni Brown, DK Publishing, 2001.

New Herb Bible: Growing and Knowing Your Herbs – And How to Use Them, by C.Foley, et al., Penguin Studio, 2002.

Your Backyard Herb Garden: A Gardener's Guide to Growing Over 50 Herbs Plus How to Use Them in Cooking, Crafts, Companion Planting, and More, by Miranda Smith, Rodale Press, 1999.

Herb Gardening, by P. Hopkinson et al., Pantheon Books, 1994.

The Herb Companion magazine, published bimonthly by Interweave Press. Available in most bookstores.

“Herbs and Herb Gardening: An Annotated Bible and Resource Guide,” USDA, find online at www.nal.usda.gov/afsic/AFSIC_pubs/srb9606.htm.

This material is available in alternate formats. Contact Kentucky GROW for more information.