

WINTER 2017

## PIEDMONT NEWS

Extend your garden

Plant asparagus

Two pesky moles

Winter lawn care tips

Minimize deer damage

Nutrient ratios

## STATE NEWS

Get real

Harry Lauder's walking stick

Winter windowsill gardening

Winter pruning

Environmental education

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## Get Real: Choose and Cut a Christmas Tree

We spend much of our lives surrounded by things made of plastic and imported from other countries. Often family time is spent as everyone gathers around his or her own electronic device. Invite nature to Christmas this year and enjoy time together creating memories that will last a lifetime. Make the centerpiece of your holiday traditions a freshly cut Christmas tree grown right here in North Carolina on a family-owned farm. Unlike its artificial counterpart, a freshly cut tree engages the senses with fragrance and soft green limbs. And traveling to a Christmas tree farm is all about the time your family spends together.

There are more than 300 family-owned choose-and-cut farms in North Carolina, in both the eastern and western parts of the state. These farms offer a variety of experiences for the family to enjoy. For younger children or grandchildren, you can choose a farm that has activities such as photos with Santa Claus, hayrides, and opportunities to interact with farm animals. If you're after a taste of winter to get you into the spirit, visit a mountain farm where snow often falls, offering opportunities for snowball fights and sledding down the mountain. Dress warmly, but don't worry about the cold. Most farms have a warm fire with complimentary hot chocolate and cider.

Farms offer other Christmas-related items, such as wreaths, garland, bows, and handmade crafts. Making wreaths and garland are family traditions for the owners of the farms and their families. Often several generations will gather together in barns and garages to cut the greenery and



North Carolina's choose-and-cut Christmas tree farms offer families a variety of festive experiences.  
©Cornett-Deal Tree Farm

assemble the wreaths and garland in the weeks leading up to and during the Christmas season.

Some people are concerned about cutting down a tree that took years to grow. Not to worry. For every tree cut, another is planted in its place. Replanting provides a sustainable crop that can be produced on land that is unsuited to other crops. At the end of the season, most cities have programs to recycle cut trees into mulch and other landscaping products—unlike the artificial counterparts that eventually end up in a landfill. To find a farm, visit these websites:

NC Christmas Tree Association:

**[www.ncchristmastrees.com](http://www.ncchristmastrees.com)**

Eastern NC Christmas Tree Growers

Association: **[www.nc-chooseandcut.com](http://www.nc-chooseandcut.com)**

Watauga Christmas Tree Association, Boone:

**[www.wataugachristmastrees.org](http://www.wataugachristmastrees.org)**

Jackson County Christmas Tree Association:

**[jacksoncountytrees.com/retail/](http://jacksoncountytrees.com/retail/)**

Ashe County Christmas Tree Association:

**[www.ashecounychristmastrees.com](http://www.ashecounychristmastrees.com)**

Alleghany Christmas Tree Association:

**[www.alleghanycta.com](http://www.alleghanycta.com)**

Avery County Christmas Tree Association:

**[www.averycountychristmastrees.org](http://www.averycountychristmastrees.org)**

Yancey County Grown:

**[www.yanceygrown.com](http://www.yanceygrown.com)**

Mitchell Grown: **[www.mitchellgrown.com](http://www.mitchellgrown.com)**



Freshly cut trees offer seasonal scents and soft branches. ©Paige Patterson.

—Paige Patterson

## Extension Showcase

### Minimizing deer damage

Deer pose a major threat to the health and appearance of new and established landscape plantings in many NC communities.

The most effective strategies to minimize deer damage in residential landscapes are the use of repellents, fencing, and plant selection to emphasize species deer prefer *not* to eat.

These strategies were the topic of a two-hour workshop offered by NC Cooperative Extension's Chatham County Center.

Nearly 200 residents attended the workshop, which was offered three times over the course of a month.

Following each workshop, the majority of attendees reported they gained knowledge that will help them reduce deer damage to their landscapes and increase the diversity of plant species in their yards.

A webpage was created to provide links to Extension resources that offer more detailed information about the topics covered. Visit the page to learn how you can minimize deer damage in your landscape:

[go.ncsu.edu/managingdeer](http://go.ncsu.edu/managingdeer).

—Charlotte Glen



White-tailed deer (*Odocoileus virginianus*).  
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## Smart Gardening: Extend your garden with tunnels



©Shawn Banks

Constructing low tunnels can be a cost-effective way of keeping vegetables growing through the winter. A low tunnel is a structure built just high enough to cover the plants, generally around 3 to 4 feet high, and covered in thin plastic or frost cloth. Low tunnels can help increase day temperature by 5° to 15°F.

Tunnels can be built with simple materials found in your local hardware. You'll need a minimum of four 10-foot-long pieces of ½-inch EMT conduit or PVC, 4 mil plastic (at least 20 feet wide), four pieces of rebar (optional), and sand bags (optional). If you use PVC to construct your tunnel frame, you'll need the rebar to hold the PVC in place. Hammer the rebar into the ground, with one piece directly across from another, over your garden spot. Rebar are placed no more than 4 feet apart. Insert a piece of PVC onto one rebar, and bend the PVC onto the opposite rebar. If you're using EMT conduit, you will need to pre-bend the conduit with a curved bender and stake the EMT conduit over your garden area. Once the frame has been constructed, pull the plastic over the frame and bury both sides with dirt or sand bags. The ends of the tunnels can be pulled down, bunched and tied, and buried with dirt or sand bags to hold in place. Remember to keep the tunnel small: no more than 40 feet long. Longer tunnels can catch winds and collapse. Crops that overwinter well include spinach, mustard, kale, broccoli, onion, and Swiss chard. Remember to open the tunnel ends if temperatures get above 70°F.

—Der Holcomb

## Food Production: Plant asparagus, and reap a bounty for years

Any home gardener can grow and enjoy this vegetable. Asparagus is a perennial. If you plant and manage it properly, it will produce for 15 years or more. Because this crop will occupy the land for many years, you should start the asparagus bed properly. Look at location, soil type, soil fertility, size and age of crowns, and correct planting to produce quality asparagus.

To grow enough asparagus for fresh table use, plant 10 crowns for each family member. If you are especially fond of asparagus or want a surplus to can or freeze, plant at least 25 plants for each family member. Begin by adding organic matter to the soil at least a year in advance of planting. This can be done by turning under green manure crops, animal manure, straw, peat moss, or leaf mold. Till the soil deeply several times before planting so that it will be in fine tilth at the time of planting. Use commercial fertilizer in addition to manures, and follow soil test recommendations. On average soils that have not been tested, broadcast 3 to 5 pounds of 5-10-10 per 100 square feet of bed.



Fresh green asparagus. ©HandmadePictures, www.bigstockphoto.com, ID 131696174.

Asparagus should not be harvested the first growing season after planting crowns. It can be harvested (cut) for a short time (not to exceed two weeks) the second year. The asparagus beds should be cared for each year. Cultivate the beds when necessary to control grass and weeds and to ensure a good crop of large spears. During the harvest period, asparagus can withstand shallow cultivation. Allow the plants to grow in the fall until they have turned brown. Then cut down the ferns and destroy them. If the ferns are cut down before frost, the next year's crop of spears is reduced.

—Aaron Ray Tompkins



## Pest Alert: Two pesky moles

Moles make raised, dome-shaped tunnels in lawns that annoy many homeowners and make taking a walk difficult. There are several management options, but none are quick and easy. Combinations of strategies should be used for the best results. The guidance in this article pertains to both the **eastern** and the **hairy-tailed** moles. Both have recently been reclassified as “pests” by the NC Wildlife Resources Commission. The **starnosed** mole, however, remains protected as “non-game,” and trapping it requires a depredation permit from the Wildlife Commission.



Eastern mole (*Scalopus aquaticus*).  
©Kenneth Catania, Vanderbilt University,  
Wikimedia Commons, CC BY SA-3.0.

There is no scientific evidence that home remedies like chewing gum or gopher-spurge plants drive away moles. Nor do many of the commercially available products, such as sonic vibration or magnetic devices. Trapping has proven to be the most effective strategy. But some traps can be difficult to use, and others force the homeowner to deal with captured animals. Set traps in active tunnels and check daily.

Reducing the mole food supply (grubs) will encourage moles to move on to better hunting grounds. Some products provide preventive control and are most effective when applied before the insects that produce grubs lay their eggs. Curative insecticides are best applied when grubs are actively feeding near the soil surface, which is usually April to May and August to October. Late summer or fall applications are recommended. Pesticides applied during any other time will be less effective. Water the insecticides in after application to wash the pesticide down to the grubs. Always follow the pesticide label.

— Joanna E. Radford

## Lawns: Winter lawn care tips

The lawn is no longer actively growing. The mower is safely in the shed. We hope we can take a well-earned rest from lawn care. Winter is the time, however, to reassess our efforts from 2016 and plan for the next growing season. A major area of concern for winter lawns is physical damage. Leaves need to be mulched or removed to avoid shading and damage to the lawn. Avoid foot traffic and parking cars on winter lawns to prevent damage to the crowns.

Choose de-icing materials wisely. Rock salt, calcium magnesium acetate, magnesium and potassium chloride, and urea/carbonyl diamide are all potentially damaging to turf, pets, and even concrete! The best strategy is not to use them. But if you must, follow these guidelines:

- Use sparingly and never exceed the labeled rate
- Avoid de-icers that contain urea—they are ineffective at lower temps, and the runoff can send excess nitrogen into the water supply
- Shovel ice and snow away early and often. You will use less de-icing material, and the smaller amounts are less likely to damage turf.

Winter is also a good time to perform routine maintenance on your mower. Change the oil, sharpen the blades, and clean under the deck.

Many NC lawns are adversely affected by crabgrass. This summer annual weed is best controlled by timely applications of a preemergent herbicide in early spring. Look for blooms on forsythia to know when it’s time to apply these materials. Materials containing benefin, dithiopyr, and oryzalin all provide good control, Oxadiazon may be a better choice for warm-season grasses such as bermudagrass as oxadiazon is less likely to affect the lateral spread of warm-season grasses. Mowing height is also a factor in crabgrass control. Close mowing at 1 inch to 2 inches encourages vigorous crabgrass infestation, while mowing at 4 inches can limit the growth and spread of crabgrass.

— Randy Fulk

## Tips & Tasks

### Important Nutrient Ratios for Turf Fertilization

Before fertilizing turf, a soil test is recommended to find any nutrient and pH imbalances that may need correcting. Healthy soil, including a thriving soil microbe population, is the best way to have a successful lawn or garden.

Potassium helps turf and ornamentals with drought and cold tolerance, and reduced disease pressure. Among other functions, potassium is needed to convert soluble carbohydrates into starch in the roots for normal root function.

Potassium is also essential for guard cells to function properly. Guard cells are responsible for opening and closing stomata (small openings on leaf blades). These openings must open and close for gas exchange and transpiration to occur.

On most turf grasses, nitrogen is needed at about a 2-to-1 ratio to potassium, and the nitrogen to phosphorous ratio is approximately 3-to-1 for optimum growth. So using a complete fertilizer—for example, one with a 16-4-8 analysis—should be sufficient in the absence of a soil test.

If a soil test, however, shows a potassium, phosphorous, pH, or other nutrient imbalance, corrective measures (such as using fertilizers with higher or lower nutrient analysis, or correcting pH) should be taken.

—Matt Lenhardt



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## Helping You Grow



Do you want to explore the state? Help your community? Grow as a professional? Meet amazing people? Get outdoors and close

to nature? Achieve all of these things and more by completing the **NC Environmental Educator Certification Program**.

The program's goals are to increase environmental literacy, provide practice in environmental education teaching methods, and foster community leadership. The program enhances the ability of educators and organizations to provide quality programs and resources that benefit local communities while investing in the future of our environment. The self-paced, experiential program includes six different components: workshops, outdoor environmental education experiences, knowledge of resources and facilities, teaching components, community partnerships, and continuing education.

Those who are certified will receive a certificate of program completion signed by the Governor, Chairman of the N.C. State Board of Education, and Secretary of the Department of Environment and Natural Resources. A statewide ceremony occurs for professional recognition, and networking opportunities are arranged with other environmental educators across the state. For more information visit [www.eenorthcarolina.org](http://www.eenorthcarolina.org).

—Katy Shook

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## Plant Watch: Harry Lauder's walking stick



*Corylus avellana* 'Contorta'. @Shawn Banks

serious disease or insect pest problems. Most plants sold in commerce are grafted. It even does well in large containers.

*Corylus avellana* 'Contorta', commonly referred to as the contorted filbert or Harry Lauder's walking stick, is a wonderful plant with its array of twisted, gnarled, and contorted branches. It was first discovered growing as a sport in an English hedgerow in the mid 1800s. It was given the common name of Harry Lauder's walking stick in the early 1900s in honor of Scottish entertainer Harry Lauder (1870 – 1950). This deciduous, rounded, multi-trunked shrub typically grows to 8-to-10-feet tall. It is noted for its beautiful, contorted branches, which are best observed in winter when the foliage is absent. Late winter flowers known as catkins brighten the winter scene, but don't expect any nuts. This filbert will thrive in USDA zones 4 through 8 and has no

—Karen Neil

## Incredible Edibles: Winter windowsill gardening

Gardening right through winter will help chase those blues away. Microgreens offer the opportunity for a fresh winter harvest. A southern facing window providing six or more hours of direct sunlight works best. Artificial lighting may be provided to supplement natural light if needed. Leggy, pale greens are a sign of not enough sunlight. Options to grow include many cool-season greens, such as beets, arugula, lettuce, chard, turnips, mustards, spinach, kale, radish, peas, and even sunflowers, and some herbs like dill or fennel. Seeds are sown very close together in a shallow potting soil mix because the plants will be harvested when tiny. Harvest can be as soon as two weeks from seeding. Keep the soil moist but not wet. A small fan for air circulation reduces disease pressure. These nutrition packed greens are harvested after the first true leaves develop. Enjoy your fresh garnish on a sandwich or salad.

—Mack Johnson

## Sustainability: Winter pruning

When people are asked why they prune in the winter rather than in the summer when it's warm outside, they often answer with, "This is when I was told to prune." A good answer to be sure. A better answer might be that winter pruning makes it easier to see what needs to be removed, and there is less chance of a fungal spore landing on the cut and infecting the tree. The real question should be this: **Why prune?** When we think about it, pruning is often about aesthetics. Pruning, however, can also be about keeping the plant healthy. When pruning, look for dead, damaged, or diseased wood.

These are the first parts to be removed. Also look for water sprouts—limbs that grow straight up in the middle of the plant—and remove those as well. Crossing limbs and those growing back into the middle of the plant get removed because they are potential problems for the tree or shrub, blocking air flow and preventing sunlight from penetrating deep into the plant. Limbs that are rubbing create open wounds where diseases can enter and infect the plant, so these limbs also are removed. If about a third of the plant hasn't been removed by that point, then remove limbs that are growing down toward the ground. Those do little good for the plant. Pruning is as much about creating a healthy plant as about aesthetics, although it's important to keep each plant's beauty in mind as well.



Winter pruning makes it easy to see what needs to be removed and reduces the chance of a fungal invasion. @Shawn Banks

—Shawn Banks