



Shades of Green

Athens-Clarke County Agriculture and Natural Resources

E-Newsletter

August 2023

Included in this issue...

Articles

Events/Resources

[A Note from Athens-Clarke County Agriculture and Natural Resources](#)

Pg. 2

[Biology and Management of Carpenter Ants](#)

Pg. 3

[A Look into The ACC Extension Demonstration Garden](#)

Pg. 9

[Join the Count! The Great Southeast Pollinator Census](#)

Pg. 12

[Green Thumb Lecture— Native Host Plants for Butterflies and Moths](#)

Pg. 14

[Stay in the Loop! August 2023 Events](#)

Pg. 15

[Local Farmers Markets 2023](#)

Pg. 16

[Helpful Resources](#)

Pg. 19

A note from Athens-Clarke County Agriculture & Natural Resources

Hello readers! August flowers are brightly blooming at the Athens-Clarke County Extension Office. We are excited to share some fun events happening at the office and around Athens this month! Be sure to check out local [Farmers Markets](#) and [other events](#) happening throughout the month hosted by UGA Extension, State Botanical Garden of Georgia, Georgia Museum of Natural History, and Sandy Creek Nature Center, among many others.

We hope you enjoy this month's issue of "Shades of Green".

Take care,
Athens-Clarke County Agriculture and Natural Resources



Biology and Management of Carpenter Ants

Daniel R. Suiter, Ph.D.

Department of Entomology

University of Georgia

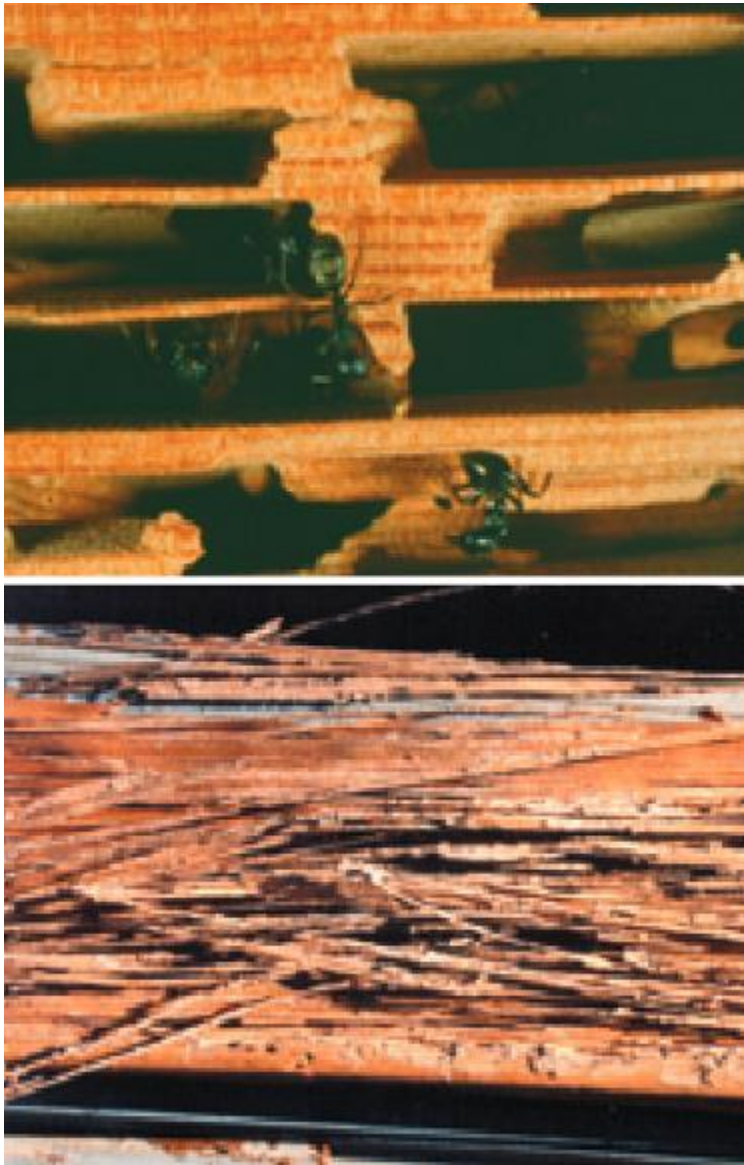


Figure 1. Damage to wood caused by carpenter ants (above left) is different than the damage to wood caused by subterranean termites (bottom left). Carpenter ants chew wood with and across the grain, while termites only damage wood with the grain. Furthermore, termites often line their

CARPENTER ANTS are so-called because of their habit of chewing wood to create nest sites. They do not eat wood, like termites, but excavate it with their strong, saw-like jaws to create random galleries where they nest (Figure 1). Carpenter ants are also a nuisance because of their abundance and large size.

IDENTIFICATION

Carpenter ants are the largest of the pest ants found in Georgia. In Georgia, there are two pest species of primary importance: the black carpenter ant (*Camponotus pennsylvanicus*) and the Florida carpenter ant (*Camponotus floridanus*). Black carpenter ants are dull black and their abdomen is covered by yellowish hairs, while the Florida carpenter ant has a deep reddish-colored head and thorax and a shiny black abdomen (Figure 2). Since ants from a single carpenter ant nest vary greatly in size, ant size alone is usually not a good characteristic for identification. Carpenter ants vary in size from about 1/4 to 1/2 inch (Figure 3). To confirm their identity, a few ants should be collected in a small vial filled with a preservative, such as rubbing alcohol, and sent to a Cooperative Extension Service county agent. Look in the white pages under county name for the phone number of the nearest Cooperative Extension Service office.

Biology and Management of Carpenter Ants (Cont.)



Figure 2. In Georgia, the black carpenter ant (top) is more common than the Florida carpenter ant (bottom).



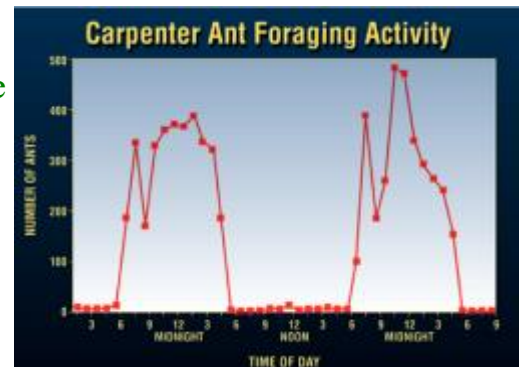
Figure 3 Ants from a single carpenter ant colony vary in size considerably. Identification of ants should not be based on size alone.



BIOLOGY In Georgia, carpenter ants become active in the spring (March/April) and remain active through the early fall (September/October). During the winter, ants become inactive and hibernate in their nest to survive the cold. The habitat where carpenter ants are most common are those areas abundant in mature hardwood trees, typified by older, well-established suburban neighborhoods (Figure 4).



Carpenter ants are most active at night, when it is not uncommon to see 10 to 20-fold or more ants than would be seen during daylight hours (Figure 5). Ants emerge about 15 minutes after sundown and leave the nest in large numbers in search of food, traveling up to hundreds of feet from the nest on semi-permanent trails. Unlike other pest ant species, carpenter ants create semi-permanent trails through the grass from their nest to areas where they collect food. Movement between nest sites and between nest sites and feeding sites is often facilitated by the use of these well-maintained, semi-permanent trails. In the evening, ants can be seen using these trails as they emerge from and return to their nest. Colonies may even use the same trail in different years. Carpenter ants also follow man-made guides, such as wall edges, when foraging.



Biology and Management of Carpenter Ants (cont.)

Carpenter ants feed mainly in the tops of trees where they consume the sweet, sugar-rich honeydew directly from aphids and scale insects that are found feeding on the tree's sap. Honeydew is nearly pure sugar, and is excreted by aphids and scale insects in large quantities during the spring and summer months. Many ant species depend on honeydew as a stable, predictable source of food throughout the warm season.

NEST HABITS Carpenter ants may establish nest sites inside and/or outside the home. Some examples of where carpenter ants have been found nesting inside are in moisture-damaged wood around chimneys and skylights, under bathtubs, inside dishwashers, in wall voids beneath window sills, inside hollow doors and door frames, under fiberglass insulation in crawlspaces and in wall voids, in wood porch supports and columns, under siding and wood shingles, and in moisture-damaged eaves. In general, wood suffering from moisture damage will attract and be used by carpenter ants as nest sites because damp

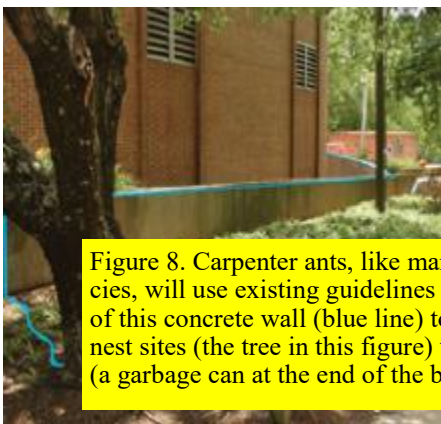


Figure 8. Carpenter ants, like many other ant species, will use existing guidelines such as the edge of this concrete wall (blue line) to forage from nest sites (the tree in this figure) to foraging sites (a garbage can at the end of the blue line)

wood is easier for the ants to chew than sound, dry wood. Damp wood, combined with warm temperatures, also promotes the survival, growth, and reproduction of carpenter ant colonies.

Outdoors, nests are most commonly found in hardwood trees containing tree holes (Figure 9). Most large hard-wood trees contain a tree-hole or other imperfection where ants might nest. In tree holes, ants find an environment that is ecologically stable (consistent humidity and temperature) and protected from adverse environmental conditions and natural enemies. There they chew dead wood to create galleries for nest sites. Colonies are less commonly found in stumps, logs, railroad ties, or similar large pieces of wood.



Figure 9. Outdoors, the most common nest site of black carpenter ants is in hardwood trees containing one or more

FINDING NESTS IS THE KEY TO ELIMINATING CARPENTER ANTS

The key to eliminating carpenter ant infestations is to find the nest and remove it, either physically (e.g., by vacuum) or by treating it with an insecticide. Inspect all locations listed as indoor and outdoor nest sites in the previous section. To find nest sites indoors, follow a few foraging ants to learn where they might be nesting. Tap the void suspected of harboring the nest. This excites the ants, allowing the inspector to detect

Biology and Management of Carpenter Ants (cont.)

their presence by hearing their raucous movements. Look for small piles of wood debris, resembling sawdust, that ants drop from the nest during excavation of the wood. Close examination of the debris may also reveal parts of dead carpenter ants and the uneaten, discarded pieces and parts of prey insects brought into the nest for food.

Carpenter ants found in the home often times can be found nesting outdoors in trees. To find outdoor nest sites inspect each large tree (greater than 6 inches in diameter), beginning 15 to 20 minutes after sundown, by walking around it while shining a flashlight up and down the trunk. If a nest is present, ants will be seen moving up and down the trunk as they leave from and return to the nest with food (Figure 10).

Since carpenter ants use permanent trails, use a flashlight to find ants on the trail and then follow them as they move to and from their nest. Finding just part of the trail can be a tremendous help in finding the nest. After locating several points along a trail a directional pattern will emerge, and often lead directly to the nest. Look for sawdust at the base of trees. Since carpenter ants must excavate wood to expand their galleries, it is common to find piles of sawdust on the ground at the base of a tree where carpenter ants nest (Figure 11). As mentioned previously, carpenter ants do not consume wood but must chew it to build and expand nest galleries. Galleries are created by biting off small pieces of wood and disposing of it to the outside. The small bits of wood often pile up at the base of a tree and take on the appearance of sawdust.



Figure 10. The presence of numerous carpenter ants moving up and down a tree trunk in more or less a single file line is a strong indication of colony presence.



Figure 11. Since carpenter ants do not eat the wood they chew, piles of sawdust-like wood shavings are commonly found at the base of trees where carpenter ants nest.

Biology and Management of Carpenter Ants (Cont.)

TREATING NEST SITES INDOORS

Either physically remove indoor nests or treat them with an insecticide labeled for ant control indoors. Use insecticidal dusts and/or aerosols to eliminate carpenter ant infestations indoors. Apply small amounts of dust into voids where the ants are known to be nesting, are suspected of nesting and/or in voids that they use when foraging. Dusts must be placed into voids so that they will not be contacted. Since dusts become airborne very easily, it is advisable to wear a protective mask when applying dusts.

Apply dusts so that a very thin film settles in treated areas. Place dusts behind electrical outlets and switch plates, and in the voids under window sills. Small holes (1/8 inch) may also be drilled into drywall in areas where ants are suspected of nesting, dust placed into the void and the hole patched with drywall cement.

Aerosol formulations may also be used when indoor ant nests are visible and accessible. For example, when nests are uncovered during inspection spray all ants with an aerosol before they can disperse. Never use water-based or other wet formulations in voids. Wet formulations not only damage drywall, insulation, and wood molding but there is a danger of electrical shock and/or fire when using liquids around electricity.

TREATING NEST SITES OUTDOORS

Out doors, pour a water-based, liquid insecticide directly into carpenter ant nests located in tree holes. Use enough insecticide to thoroughly saturate the entire nest and all ants inside. This may require pouring one gallon or more of liquid insecticide into the nest. It is important to saturate all nest galleries with insecticide. If the nest is awkwardly positioned and difficult to reach with a liquid spray, it may be necessary to drill a small hole (one-quarter to one-half inch) into the top of the suspected nest location so that the liquid insecticide can be introduced and allowed it to flow downward through the nest.

When treating carpenter ant nest sites inside or outside, the choice of a particular product or brand name is not as important as the choice of formulation and the direct treatment of ants and/or nest sites. Carpenter ants are not resistant, or immune, to any insecticide.

CONTROL ATTEMPTS WHEN THE NEST CANNOT BE FOUND

Often times the nest cannot be found or, if found, cannot be easily treated. Under these circumstances, use baits and/or treat outside with a liquid spray.

Biology and Management of Carpenter Ants (Cont.)

Baits are an effective means of controlling ants in some cases. Indoors use liquid baits and baits contained in childproof, plastic bait stations; outdoors use liquid and granular baits. For liquid baits, soak a small cotton ball and place it on a piece of aluminum foil in areas where ants have been seen.

Granular baits should be delivered from two or three small piles (about the size of a quarter) placed in areas where ants have been seen (e.g., next to semi-permanent trails and trees containing nests) (Figure 12).



Figure 12. Since carpenter ants rarely deviate from their foraging trail (see Figure 7), baits should be placed next to the trail and as close to the suspected colony location as possible. Baits should be delivered from several points sources and not scattered.

Perimeter treatments are used as a means of keeping ants from entering the structure. To conduct a perimeter treatment spray the outside walls with a water-based, liquid insecticide two to three feet up and spray the ground (including shrubbery, mulch, flower beds, etc.) five feet away from each wall. Spray as many areas traveled by carpenter ants as possible, and concentrate spray treatments to areas where ants might enter the structure (e.g., around doors and windows). As part of the perimeter spray program, apply a liquid insecticide to the trunk of each tree on which carpenter ants have been seen. This treatment strategy will kill ants moving up and down the tree trunk.

Perimeter treatments should be re-applied every 4 to 6 weeks during the summer and within a week following a heavy rain. Typical perimeter treatments often require 7 to 10 gallons of liquid spray.

PREVENTION

Homeowners can take several measures to help prevent future problems with carpenter ants. Eliminate sources of excess moisture to help make the home a less desirable nesting site to ants and other pests. Fix leaks around attic vents, pipes, sinks, and around chimneys and skylights. Replace water-damaged wood. Dry-out the crawlspace by installing a vapor barrier and foundation vents. Keep rain gutters clean and adjust drain spouts so water flows away from the building. Install rain gutters if they do not already exist. Trim tree limbs away from the structure. Foraging carpenter ants often enter structures by bridging to roofs and siding from tree branches in contact with these surfaces.

A LOOK INTO THE ACC EXTENSION DEMONSTRATION GARDEN

CURRATED BY KRISTI SEGO, JOHN AITKENS, AND THE UGA MASTER GARDENERS



The ACC Extension Garden, located at the Athens Clarke County Extension office, is open for the community to enjoy. Come spend some time outside and relax at the “pollinator palace”, where butterflies can often be spotted. These beautiful ornamentals are curated by the dedication of Kristi Segó with the help of our Master Gardeners.



A LOOK INTO THE ACC EXTENSION DEMONSTRATION GARDEN

CURATED BY KRISTI SEGO, JOHN AITKENS, AND THE UGA MASTER GARDENERS



The ACC Extension Garden has a wide variety of vegetables thoughtfully curated by John Aitkens and the Master Gardeners. This garden is a demonstration garden intended for educational enjoyment, so come see how your favorite vegetables are grown. In the garden there are multiple varieties of tomatoes, tall growing asparagus and corn, berries, and artichoke!



The only thing asked of visitors is to close the gate as they leave (to protect our plants from deer!) and to respect the garden that our community has grown with love.

A LOOK INTO THE ACC EXTENSION DEMONSTRATION GARDEN

CURATED BY KRISTI SEGO, JOHN AITKENS, AND THE UGA MASTER GARDENERS





GREAT SOUTHEAST Pollinator Census

AUGUST 18-19, 2023

A History of the Census from Project Coordinator Becky Griffin

The Great Southeast Pollinator Census was started in response to my work in community and school gardens. I was meeting gardeners who knew about soil health and plant selection but, were lacking knowledge about insect ecosystems, especially pollinators. At the same time, I found that teachers were not usually trained in entomology so they were unlikely to educate their students about the insects they were finding in their school gardens.

A pilot project was launched in 2017 and repeated in 2018. The pilot project included 50 gardens. This allowed us to refine the counting criteria and to determine the needs of the participants to successfully participate in the project. We wanted the project to be easy enough for anyone to learn some basic entomology and participate while at the same time ensure that we were generating useful data. We met with statisticians as well as researchers.

We defined three goals of the project:

1. **To create sustainable pollinator habitat** by educating gardeners about using plants that provide nutrition for our pollinators while handling our summer droughts and do not

have disease or pest insect pressure.

2. **To increase the entomological literacy of our citizens.** As I mentioned to one teacher, we want students to go from “oooo, it’s a bug” to “look at the tarsal claw on that bee!”
3. **To generate useful data about our pollinator populations,** so we can begin to spot trends and see how pollinator populations are affected by weather and how honey bees influence native bee populations.

The first statewide Great Georgia Pollinator Census was in August of 2019. Over 4,000 people participated.

During 2020, COVID regulations allowed us to be creative and we encouraged families to count at home. We provided online training through webinars. Family and Consumer Science agents contributed recipes featuring foods needing pollinators, like watermelon salsa. These were published through social media, our website, and newsletter.

In 2021, almost 6,000 participants recorded data. In 2022, South Carolina joined the Census through the efforts of Clemson University. In 2023, North Carolina joined the Census through North Carolina A&T. I’m looking forward to the future growth.

– [Becky Griffin](#), project coordinator



GREAT SOUTHEAST Pollinator Census

AUGUST 18-19, 2023

The Great Southeast Pollinator Census is a citizen science project created by the **University of Georgia**. This project is designed for everyone to participate and make a difference for pollinator conservation!

Visit our Website: <https://gsepc.org/>

Join the count!

Interested in joining our count this year? Here's how:

[Sign up for our newsletter](#) to get the latest in your inbox

1. Prepare for the count days on August 18th and 19th
2. Download the printable the [2023 Counting Sheet](#) ([2023 Guia de Conteo](#))

Check out the [2023 Insect Counting & Identification Guide](#) ([2023 Conteo de Insectos y Guia de Identificacion](#))

Review the [corresponding pamphlet](#).

Join our [Southeast Pollinator Census](#) Facebook page and follow us on instagram [@SoutheastPollinators](#).

- View *The Pollinator Census—How-To and History*
- <https://youtu.be/LNgrSzuGRQc>

Those interested in joining the count on August 18-19th may also do so in the ACC Extension Demonstration Garden, located behind our office at 275 Cleveland RD, Bogart GA 30622.

Athens-Clarke County Extension
Green Thumb Lectures

2023 Free Monthly Gardening Class Series



August: Native Host Plants for Butterflies and Moths

Please join us for an informative presentation by Beech Hollow Nursery's Tanner Biggers on topics including

- The importance of having diverse, native plants in your garden
 - Host plants for pollinators
 - Butterfly and Moth lifecycles, and adaptations
 - How to attract more pollinators to your yard
- Gardeners of all experience levels are welcome.

WHEN:

Wednesday, August 16th
6:00 -7:30 pm

WHERE:

The Athens-Clarke County Extension Office, 275 Cleveland Rd, Bogart, GA 30529

TO REGISTER:

Please register by August 15th by visiting www.accgov.com/gardening



Contact Laura Ney, Extension Agent at lney@uga.edu

The University of Georgia is committed to principles of equal opportunity and affirmative action.



Local August Events

Critter Tales

August 12, 2:30-3:00 PM

(Second Saturday of every month)

Listen to a story about nature and watch it be brought to life

Sandy Creek Nature Center
205 Old Commerce Rd.

UGA Extension offices around the state are working hard at developing quality online presentations on various topics.

Visit the [UGA Extension event calendar](#) to see events happening local to our county as well as virtual opportunities.

West Broad Farmers Market—Health and Wellness Day

August 26, 11:00 AM—2:00 PM

300 S. Rocksprings Rd.

Nature Ramblers

August 3, 9:00– 10:30 AM

Learn more about the State Botanical Garden's natural areas, flora, and fauna, and enjoy inspirational readings about nature

State Botanical Gardens
Children's Garden Arbor
2450 S Milledge Ave

Diamond Hill FarmStand

Every Thursday, 4-6 pm

Vegetables and fresh flowers are available on hand and pre-ordered. Every Thursday, 4–6 p.m. at Authentic Brewing Company.

www.diamondhillfarmathens.com

Introduction to Sustainable Trails Workshop

August 19, 9:00—11:00 AM

Sandy Creek Nature Center
205 Old Commerce Rd.

FARMRx 5K

August 26, 7:30 AM

5K race to support FARMRx
Bishop Park
705 Sunset Drive

Alice H. Richards Children's Garden Performance Series

August 26, 9:30AM, 11AM

State Botanical Gardens Theatre in the woods stage
2450 S Milledge Ave

Green Thumb Lecture Series

Wednesday, August 16

6:00 PM—7:30 PM

Native Host Plants for Butterflies and Moths
Athens-Clarke County Extension Office
275 Cleveland Road

Local Farmers Markets



The **Athens Farmers Market** takes place on **Saturdays** from 8am-12pm at Bishop Park and **Wednesdays** from 5pm- 8pm at Creature Comforts Brewery. Be sure to visit [their website](#) for updates and details.

Saturday Market: Year-Round

Wednesday Market: March—November

Find them on Facebook: [@AthensFarmers-Market](#)

Follow them on Instagram:
[@athensfarmersmarket](#)



The **West Broad Farmers Market** takes place on **Saturdays** from 11am– 2 pm at 300 S. Rocksprings Street and on **Tuesdays** from 5pm– 8pm at Authentic Brewing Company.

Both markets run from April 1—December 16

Visit [their website](#) for more information.

MARIGOLD



MARKET

The **Winterville Farmers Market** takes place on **Saturdays** from 10am-2pm at Pittard Park. Visit [their website](#) for more information.

The market runs from April 15th– December 16th.

Find out more on Facebook:

[@marigoldmarketwinterville](#)

Instagram: [@marigoldmarketwinterville](#)

Join Athens-Clarke County 4-H!



Students in 5th - 12th grades in Athens-Clarke County can sign up for 4-H now. The mission of Georgia 4-H is to assist youth in acquiring knowledge, developing life skills, and forming attitudes that will enable them to become self-directing, productive and contributing members of society. 4-H meetings will look different this year and are online. There is no charge to be a member or participate in a competition.

To start your 4-H Adventure e-mail the ACC 4-H Agent, Elizabeth Conway, at ebarber@uga.edu today!



Virtual 4-H Programs can be viewed on the ACC 4-H website:

<https://tinyurl.com/acc4hvirtual>

The University of Georgia is committed to the principals of equal opportunity and affirmative action.





Concerned about the state of your garden?

Are weeds taking over your landscape?

No need to fear, Clarke is here!



Follow @gardenwithclarke on Instagram and learn how to battle pests, identify weeds, build your soil and so much more as you garden alongside Clarke, Athens-Clarke County's super gardener!



gardenwithclarke
UGA Extension Athens-Clarke County





Helpful resources online:

[Find My Local Extension Office](#)

[Bugwood— Pest Images](#)

[Landscape Alerts Online](#)

[Georgia Turf](#)

[Pest Management Handbook](#)

[Pesticide Applicator Info](#)

[Free Online Webinars](#)

[SE Ornamental Horticulture Production & IPM Blog](#)

[UGA Center for Urban Agriculture](#)

[Georgia Certified Plant Professional](#)

[Extension Publications](#)

Athens-Clarke County Extension Agriculture and Natural Resources

Mission Statement

The UGA Athens-Clarke County Extension's mission is to respond to the people's needs and interest in Agriculture, the Environment, Families, and 4-H/youth in Athens-Clarke County with unbiased, research-based education and information.

Visit us online:



Contact us:

275 Cleveland Road
Bogart, GA 30622
Phone: (706) 613-3640
Email: lney@uga.edu
vlc74120@uga.edu

Like us on Facebook:

