

carpenter ants

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Carpenter ants are pests for several reasons. First, they are considered mild wood-destroying organisms because they chew wood to create nest sites. They do not eat wood (as do termites), but excavate it with their strong, serrated mandibles to create random galleries where they nest. Second, because of their abundance and large size carpenter ants can be a nuisance when they forage in and around the home.

Carpenter ants are perhaps the largest of the pest ants likely to be encountered by homeowners and pest management professionals. In Georgia, there are two important pest species--the black carpenter ant (*Camponotus pennsylvanicus*) and the Florida carpenter ant (*Camponotus floridanus*). Black carpenter ants are dull black in color and their abdomens are covered with yellowish hairs (Figure 1), while the Florida carpenter ant has a deep reddish-colored head and thorax and a shiny black abdomen (Figure 2). Florida carpenter ants are most common in southern and southeastern Georgia, while the black carpenter ant is more common inland in central and northern Georgia. Because ants from a single carpenter ant colony vary greatly in size, ant size alone is usually not a good characteristic for identification. Should you have questions regarding a carpenter ant problem contact your county extension agent by calling 1-800-ASK-UGA1 or visit the University of Georgia's Extension Service website at www.caes.uga.edu/extension.

Biology. In Georgia, carpenter ants are active from late spring (May/June) through early fall (September/October). They are most active at night. Ants emerge about 15 minutes after sundown and leave the nest in large numbers, traveling up to hundreds of feet between nest sites and feeding sites on semi-permanent paths that the ants construct and maintain (Figure 3).



Figure 1. Black carpenter ants (≈3/8 up to ≈5/8 inch) are dull black and their abdomens are covered with fine, yellowish hairs. They are most common inland in central and northern Georgia.

In the evening, ants can be seen using these paths as they emerge from and return to their nest.

Carpenter ants may establish nest sites inside and/or outside the home. Some examples of where ants have been found nesting inside are in moisture-damaged wood around chimneys and skylights, under bathtubs, inside dishwasher walls, in wall voids beneath window sills, inside hollow doors and door frames, under fiberglass insulation in crawlspaces and in wall voids, in wooden porch supports and columns, under siding and wood shingles, and in moisture-damaged eaves.

Outdoors, nests are most commonly found in hardwood trees. Most large hardwood trees contain a knothole, treehole or other natural void where ants find a habitat that is ecologically stable (consistent humidity and temperature) and protected from adverse environmental conditions and natural enemies (Figure 4). There they chew dead wood to create and expand galleries for nest sites. Colonies are less commonly found in stumps, logs, railroad ties, etc. The Florida carpenter ant is more opportunistic in its nesting habits. It is not only found nesting in trees but also under loose debris found lying on the ground (e.g., old doors, roof shingles, cardboard boxes, plywood, in soft drink cans, etc.) as well as in stumps, logs, railroad ties, etc.



Figure 2. Florida carpenter ants (≈3/8 up to ≈5/8 inch) have a reddish-colored head and thorax and a shiny black abdomen. They are most common in southern and southeastern Georgia.

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 or by treating it with an insecticide. To find the nest, inspect all potential indoor and outdoor nest sites. If possible, inspect at night beginning 30 minutes after sunset. To find nest sites indoors, find and follow a few foraging ants to learn where they might be nesting.

Carpenter ants in the home oftentimes can be found nesting outdoors. To locate outdoor nest sites after dark, inspect nearby large trees by walking around them 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.

An indication of a nest in a tree is the presence of sawdust-like wood shavings on the ground at the base of the tree. Because carpenter ants must excavate wood to expand their galleries, it is common to find piles of wood shavings on the ground at the base of a tree where carpenter ants nest. Close examination of the debris may also reveal parts of dead carpenter ants and the uneaten, discarded pieces and parts of dead insects brought into the nest for food.

Control and Prevention. In the majority of cases, the use of insecticidal baits is the preferred method for controlling carpenter ants. Indoors, use baits contained in childproof, plastic bait stations. Place bait stations in areas where ants have been seen or where the stations are most likely to be encountered by foraging ants. Outdoors, deliver gel baits from two or three small piles (about the size of a quarter) in areas where ants have been seen (e.g., next to or on semi-permanent paths and / or on the bark of trees containing nests; Figure 5). It is prudent to apply gel bait in the evening or at night so that day-foraging ants will not eat the bait before the carpenter ants become active.

Homeowners can take several measures to help prevent problems with carpenter ants. First, eliminate sources of excess moisture to help make the home a less desirable nesting site to ants and other pests. For example, repair leaks around attic vents, pipes, sinks, chimneys, and skylights. Replace water-damaged wood. Second, 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.

If property owners experience an ongoing infestation of carpenter ants, it is advisable to hire a pest management professional. In addition to specific knowledge and experience regarding carpenter ants and their control, pest management professionals also may utilize tools not readily available to the property owner. Regardless of the company hired, the technician



Figure 3. Carpenter ants construct and use semi-permanent paths as they move between nest sites and feeding sites, and will even use the same path from one year to the next.



Figure 4. Outdoors, a common nest site of carpenter ants is in hardwood trees containing a knothole or treehole where ants find an environment that is ecologically stable and protected from adverse environmental conditions.



Figure 5. Provide carpenter ants gel bait when attempting to control them outside the home. Baits should be placed, preferably in the evening or at night, where ants can find and eat it—e.g., next to or on trees where they are nesting or directly on their path.

should conduct a thorough and complete inspection that results in location of the nest, or at least a probable nest site, before treatment. Although locating the nest is not always easy, it is the key to eliminating the carpenter ant infestation.

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