

Controlling Carpenter Ants

J.D. DeAngelis and J. Capizzi

Carpenter ants are serious pests of buildings in Oregon, particularly west of the Cascade Mountains. Although they normally excavate in logs, stumps, and hollow trees, these ants become pests when they move indoors.

Unlike termites, carpenter ants do not eat wood, and so they kick out the sawdust-like chavings during nest building.

This is a sure sign of carpenter ant infestation; termites do not make sawdust.

Carpenter ants do not restrict their nesting activities to wood. They can establish nests in any material they can bite into—insulation, paper, bark, and wood product mulches are just a few examples.

Nests even have been found in stored clothing and sleeping bags. In some instances, these ants will carry nest-building material, such as fir needles, into a wall space or attic.

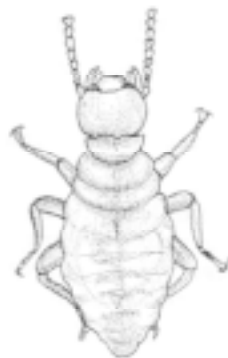
Signs of infestation

- Ants foraging around or in the home
- Piles of sawdust-like borings visible under porches, in basements, or emerging from cracks or crevices between walls and partitions
- Slit-like holes in woodwork, especially window and door casings
- Large winged ants in the house in late winter and spring
- Faint rustling sounds in walls, floors, or woodwork



Carpenter ant worker

Winged carpenter ant



Termite worker



Winged termite

How to recognize them

Carpenter ants are large black or red-and-black ants. The size varies in workers from $\frac{1}{4}$ to $\frac{1}{2}$ inch; queens are larger, up to $\frac{3}{4}$ inch. Ants have a constriction (thin waist) between their thorax (where legs originate) and abdomen. If winged, there are two pairs of membranous

wings that extend beyond the tip of the abdomen. The front wings are much larger than the rear wings.

Carpenter ants frequently are confused with dampwood termites. Both insects live in colonies and mine wood. Since they are controlled in different ways, it is important to distinguish between them.

Termite workers are yellowish to grayish white, up to $\frac{3}{4}$ inch long, short-legged, rather slow-moving insects that spend their lives hidden

from view, unless their mines are broken open.

Reproductive termites are brown, thick-waisted, and have long wings, approximately equal in length. The antennae of termites are short and straight (those of ants are angled). Termites fly during warm, humid evenings in the fall.

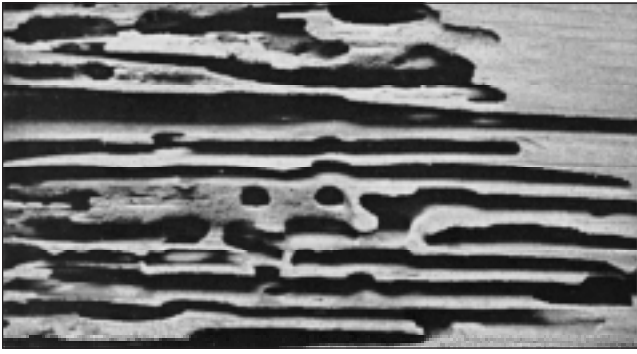
What carpenter ants do

Carpenter ants commonly tunnel in building timbers. With a longstanding infestation, damage may require extensive repairs. Usually, only minor repairs are needed. If you find the infestations soon enough, all that may be needed is to get rid of the ants.

New colonies are established either by a lone queen or by migration of an existing colony. The latter is common in houses. Colonies disturbed by the clearing and grading of building sites often migrate. Houses near woods are most likely to become infested.

Usually, carpenter ants enter a house through openings around the foundations. They seem to prefer moist, rotting timbers, but they will readily mine sound, dry wood any place in a house. Ants may enter through plumbing or wiring access points, or they may travel into the structure from trees hanging over the roof.

Jack DeAngelis, Extension entomologist, and Joseph Capizzi, Extension entomologist emeritus; Oregon State University.



Carpenter ants mine building timbers, causing serious damage if they're unchecked.

Among the commonly mined portions are porch pillars and supporting timbers, sills, girders, joists, studs, and casings. The ants often establish colonies in masses of fir needles or other refuse within walls, under floors, in attics, and in other undisturbed places.

Carpenter ants are destructive in several other ways. They occasionally damage telephone poles. They damage boxes and other wood products in storage. By mining in the heartwood of living cedar trees, they cause much of the "wormy" lumber that must be discarded. Similarly, they mine and weaken orchard and ornamental trees. They girdle and kill young conifers in forest plantations. By tending aphids for honeydew, they encourage these garden or ornamental pests.

Besides being destructive, carpenter ants in houses are a nuisance, crawling over things, getting into food, and periodically swarming in the living quarters.

Ant control

If you locate a nest, you can remove it with a vacuum cleaner, then dispose of the bag outdoors. Unfortunately, you can't always find the nest or nests. If this is the case, control is indirect. Place insecticides very carefully, to form chemical barriers that foraging ants must cross in their search for food.

The ant then contaminates its body with the insecticide and carries it back to the nest, where other ant stages are poisoned. Slow-acting, persistent insecticides are best suited for this approach.

Insecticidal dusts often are used between walls (in wall voids), in attics, and in other areas where water-based sprays might cause moisture problems and where emulsifiable sprays (with strong solvents) might harm fabric, wallpaper, or tile. Treat the line where your foundation meets the soil. Treat it inside, if you can reach it through a crawl space; treat it outside, along the walls and entries.

Consult your county office of the OSU Extension Service or a current edition of the *PNW Insect Control Handbook* regarding specific pesticide recommendations for indoor and outdoor use.

How to prevent infestation

A tightly constructed house with concrete foundation, good clearance, and a full basement with good ventilation is least subject to infestation.

- Remove logs, stumps, and waste wood near and under the house.
- Destroy all known colonies of carpenter ants within 100 yards or so of the house.
- Do not bring fuel wood infested with carpenter ants into the house.
- Do not build over stumps, logs, or sizeable pieces of wood.
- Check for signs of ants annually since presently registered insecticides do not offer long-term protection. A structure may be reinfested.

Use insecticides safely!

- **Read** the manufacturer's label carefully and follow the instructions.
- **Avoid** contaminating food.
- **Do not use** household sprays near an open flame.
- If household emulsifiable sprays get on asphalt tile floors, **wipe up** immediately.
- **Store** all insecticides out of reach of children and pets.
- **Empty** insecticide containers completely. Rinse empty containers and use rinse water in spraying.

This publication was produced and distributed in furtherance of the Acts of Congress of May 8 and June 30, 1914. Extension work is a cooperative program of Oregon State University, the U.S. Department of Agriculture, and Oregon counties.

Oregon State University Extension Service offers educational programs, activities, and materials—*without regard to race, color, religion, sex, sexual orientation, national origin, age, marital status, disability, and disabled veteran or Vietnam-era veteran status*—as required by Title VI of the Civil Rights Act of 1964, Title IX of the Education Amendments of 1972, and Section 504 of the Rehabilitation Act of 1973. Oregon State University Extension Service is an Equal Opportunity Employer.

