

Problem: Carpenter Bees (*Xylocopa virginica*)



Hosts: Though carpenter bees can attack virtually any wood, including treated lumber, they prefer bare, unpainted softwoods.

Description: Although they buzz, hover and look like bumble bees, carpenter bees are very much different in appearance and habit. Unlike bumble bees, which have hairy (usually yellow and black) abdomens, carpenter bees have hairless, shiny blue-black abdomens. Also, carpenter bees lack pollen baskets on their hind legs.

Carpenter bees are solitary bees, and although capable of delivering a sting, female carpenter bees will only sting if prodded and provoked. Male carpenter bees (which have a menacing habit of buzzing about a person's head) do not have a stinger and, therefore, are harmless.

Female carpenter bees have strong jaws which they use to bore into, primarily, unfinished wood. Although the damage may appear minimal (all one sees is the 3/8-inch circular opening), the tunnels in the wood may be 6 inches in length.

Damage attributable to the excavating activities of a single carpenter bee is slight. However, the cumulative efforts of several to many carpenter bees can be structurally damaging.

Life Cycle: Carpenter bees overwinter as adults. They emerge in the spring (usually April or May) and mate. Fertilized females lay their eggs within newly excavated tunnels or old ones that they have enlarged and reused. An individual egg is deposited in each of 6 to 8 cells off of a main tunnel.. Developing larvae feed off of "bee bread" (pollen and nectar) regurgitated by the female bee. Larvae become adults by late August and September, but do not emerge until the following spring.

Recommendations:

Wood can be somewhat protected by preserving it with a solid coat of paint. Wood stains do not afford protection. Also, consider using wood pressure-treated with a preservative for constructing outdoor projects. Though such wood can be attacked, untreated wood is preferred. Aerosol insecticides or insecticidal dusts such as carbaryl (Sevin) or a synthetic pyrethroid (permethrin or cyfluthrin) can be used to treat carpenter bee entryways. Sprays may only be effective for 1 to 2 weeks and so retreatment may be necessary. Excavated tunnels are best treated with an insecticidal dust (e.g., 5% carbaryl (Sevin)) puffed into the tunnel opening. After carpenter bees have had an "in-and-out" access time of several days, holes can be filled with wood putty to discourage future use of already excavated tunnels.

References:

1. [Carpenter Bees](#), Kansas State University, K-State Research & Extension Entomology Structural Pests Publication MF-2946
2. [Carpenter Bees](#), University of Kentucky College of Agriculture, Department of Entomology

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