



Ambrosia beetle

Xylosandrus germanus

Order Coleoptera, Family Scolytidae; bark, engraver, ambrosia, or timber beetle
Introduced pest

Host plants: Ash, beech, birch, bald cypress, dogwood, elm, holly, honeylocust, linden, maple, pine, red cedar, sycamore, willow, and many other trees and shrubs.

Description: Adult beetles are 1–3 mm long, and usually black or brownish in color.

Life history: Adults emerge in spring and look for new sites to make tunnels and lay eggs. They bore into the hardwood of trees, but do not eat the wood. They introduce a fungus called ambrosia, *Ambrosiella*, which they farm for food. Sometimes other fungi are also introduced, such as *Fusarium*. There are two generations a year.

Overwintering: Adults in tunnels.

Damage symptoms: Adult females may introduce a *Fusarium* fungus into trees as they excavate their tunnels into the wood. This fungus causes a cankered area in the wood, usually causing dieback in the canopy and suckering at the base of the tree. Cankering may not always be apparent.

Monitoring: Look for frass emerging from entrance holes near ground level. Look for black fungal stains in any discovered tunnels. Also look for dieback in the upper canopy and suckering at the base of the tree.

Physical control: Cut and remove dead or infected tree tops and branches and burn, if possible.

Chemical control: Spray for adults when they emerge in the spring.

Biological control: Clerid beetles

Plant mortality risk: High, for small diameter trees

Biorational pesticides: None

Conventional pesticides: chlorpyrifos (nursery only), permethrin



Fusarium and exit hole damage on *Styrax* (snowbell) caused by ambrosia bark beetle. This beetle killed an acre of *Styrax* in a nursery by carrying *Fusarium* into bark tunnels. This is becoming a widespread beetle. (1)

Photo: John Davidson



Ambrosia bark beetle adults. (2)

Photo: John Davidson