Deodar Weevil (Eastern Pine Weevil)

(Pissodes nemorensis)

Description:

Immature stages – The legless larvae are white with a light amber to dark orange head. They can be 6-12 mm long when mature. The pupae are similar in size to adults, but are creamy white, darkening as they complete the developmental stage.

Adult stages - Adults have a long, curved snout and are reddishbrown to gray with two gray or white spots on their back. Adults are typically 6-8 mm long.

Biology:

Life Cycle – Adult deodar weevils are active in the fall and winter months. In the fall, adult weevils infest stressed trees, feed and mate. Females lay eggs while feeding in the inner bark. Larvae emerge from eggs and continue to feed in the inner bark where they make chambers commonly referred to as "chip cocoons". Deodar weevils pupate in these cocoons from late winter to early spring. In spring from March to April, adult weevils emerge from pupation. Deodar weevils are usually inactive in hot summer months. There is one generation per year.



Larva in Chip Cocool

Damage to Crop:

All native southeastern pines of all ages are susceptible to attack by the deodar weevil. Common hosts are loblolly, longleaf, shortleaf, slash, spruce and sand pines. Trees that are dying or extremely stressed by environmental conditions such as fire, drought, excessive cold, fusiform rust and wind damage are often attacked. Young pines in overstocked stands are also susceptible. Often, a deodar weevil infestation is in conjunction with a bark beetle attack. Damage includes foliage discoloration, with needles having a scorched appearance, particularly topmost branches. Small holes (0.4 mm wide) in shoots, often the most dominant branch. Shallow depressions or chambers in the sapwood with a layer of long yellowish-white wood fibers on top. Wounds created by the deodar weevil can allow the pitch canker fungus to enter infested stems.

Management:

Maintain tree vigor. Thin overstocked stands to reduce pest population size. Thin once tree growth falls below a 5% annual diameter growth threshold, as egg-laying females avoid pines growing at 5% or higher. Applying an approved insecticide on recently attacked and neighboring trees is also a viable control option. An insecticide application is not very practical on infested trees in a rural forest stand.





Damage