

Chinch Bugs

by

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The most damaging insect pest of St. Augustinegrass, the southern chinch bug (*Blissus insularis*), does not cause significant economic damage to other warm-season turfgrasses. However, since there are millions of acres of St. Augustinegrass from Texas to Key West and back up through Virginia, the importance of this insect cannot be underestimated.

Depending on the location, one to several generations of chinch bugs can occur each year. In southern Florida count on 7 - 10 generations, generally beginning in February. In the Panhandle/upper Gulf area, two to four generations are the norm beginning in April. Eggs hatch into [bright red nymphs](#) which have a white band across their back. Nymphs molt 5 times then into adults that are black with white wings.

[Chinch bugs](#) feed by sucking juices out of above-ground portions of St. Augustinegrass. Chinch bug activity often starts during the drier part of the year in many southern areas, and is often first noticed in water-stressed areas such as along sidewalks or in poorly irrigated areas. Therefore, conditions such as poor irrigation design, insufficient watering, or both help to exacerbate the problem.

Symptoms of feeding include patches of [yellowish to brownish turf](#). Since these symptoms are synonymous with other lawn problems such as water stress, disease incidence, etc., it is wise (as always), before spraying, to [inspect](#) for signs of the insects in areas which are adjacent to the damaged areas. Examine the soil line and leaf tissues for crawling chinch bugs. If necessary, insert a coffee can with both ends cut out a few inches into the soil and fill with water. Chinch bugs will float to the top within a few minutes. In lawns with previous chinch bug history, it is especially important to monitor in early spring, before significant damage occurs.

Cultural management can be a critical tool in minimizing or avoiding damage. Again, it is prudent to have an irrigation system that is operating efficiently in order to maintain turf without water stress. Avoid excessive nitrogen fertilization and limit the use of soluble nitrogen, which encourages attacks. When possible, substitute slow-release N sources and be sure to avoid over-watering. Keep mower blades sharpened and maintain a high cutting height (about 3 inches). Prudent management includes reducing thatch, which harbors many insects. Following the above advice on fertilization, watering, and mowing will help reduce thatch.

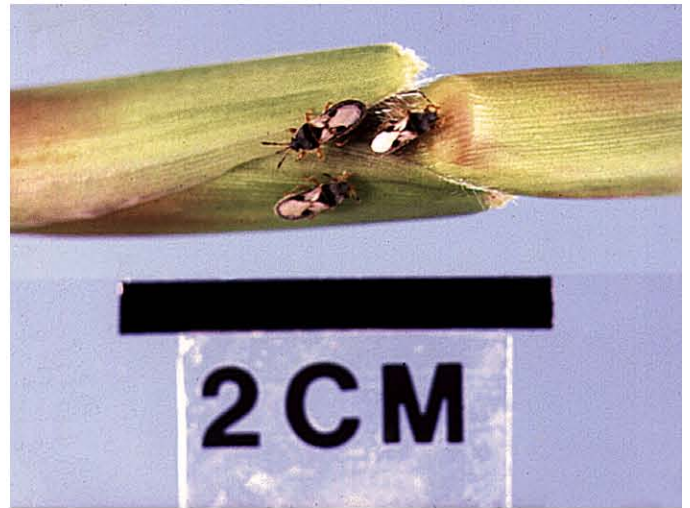
When inspecting for chinch bugs, look for predatory insects. The most common chinch bug predator is the [black big-eyed bug](#), an insect that looks similar to its prey. In addition, the

[striped-earwig](#) is an important predator of chinch bugs in all stages of development. Do not discount the importance that these predators may have on reducing chinch bug populations.

When damage is readily apparent or when counts of 20-25 chinch bugs per square foot are reached, pesticide applications are an option. There are numerous products available. Consult your local cooperative extension service office for recommendations of types, rates, and restrictions of pesticides. Spot-treatments are an option when infestations are not too widespread. Treat the damaged area plus a 5 foot buffer. Check for activity after a few days and treat again if necessary.



Bright-Red Nymphs



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Black Big-Eyed Bug



Striped Earwig



yellowish to brownish turf