

White Grubs (Family Scarabaeidae): A Serious Lawn Pest

Order: Coleoptera (Beetles)

By Margaret Skinner, Ph.D., University of Vermont Extension Entomologist

Email: mskinner@uvm.edu Tel: 802-656-5440

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Description. While there are many different types of beetles with a whitish soil-dwelling larval phase, the most common group are white grubs, which include several different beetle species that all feed on grass roots and cause damage directly or indirectly to lawns. At least 10 species of scarabs in five subfamilies are pests in lawns in the US. White grubs within the Scarabaeidae family are whitish, soft-bodied and “C”-shaped, with 3 pairs of legs and a hard brownish head (Fig. 1). They vary in size from less than 0.5 to 1.9 inches long depending on the species and age of the larva. For example, mature larvae of May and June beetles (*Phyllophaga*) are up to ~1.9 inches long, whereas those of Japanese beetle (*Popillia japonica*) and Asiatic garden beetle (*Maladera castanea*) are ~0.5 inches long. White grubs can be identified to species based on the shape of the anal slit and pattern of hairs at the base of the abdomen (rastral pattern). This requires the assistance of an entomologist and microscope.

Damage Symptoms and P

Cultural Practices to Minimize Grubs. The height of mowing appears to have some impact on the size of some grub species, with smaller ones found in association with high-mowed lawns. The population of some species is reduced when lawns are not mowed too short. In general, the most significant factor

Beneficial nematodes: Nematodes are microscopic worm