



Photo by H. Perry

### Frequency of *Ophiosphaerella korrae* on Tifway bermudagrass roots in Mississippi

Spring dead spot, which is caused by *Ophiosphaerella korrae*, is the most destructive disease of bermudagrass. In Mississippi, spring dead spot occurs where temperatures are cold enough to induce a winter dormancy period of at least eight weeks. The objective of this study was to monitor the occurrence of *O. korrae* in bermudagrass roots on a monthly basis throughout the year. Beginning in September 2004, root samples were taken from a Tifway bermudagrass fairway with a history of spring dead spot. Samples will continue to be taken into summer 2007. Occurrence of *O. korrae* has ranged from 1% to 16%, with the highest occurrence to date in April 2006. Although occurrence has been sporadic, *O. korrae* has been isolated from living roots throughout the year. The results of this study suggest that viable *O. korrae* mycelium is present either in an active or a dormant state throughout the year in bermudagrass roots in Mississippi. — D. Hunter Perry (dperry@plantpath.msstate.edu) and Maria Tomaso-Peterson, Ph.D., Mississippi State University



Photo by R. Goss

### Oxygenated water for improved turfgrass performance with drip irrigation

Using subsurface drip irrigation on turfgrass

swards may reduce water loss compared to irrigating with sprinklers, but swards receiving subsurface drip irrigation are more likely to have problems associated with the lack of oxygen in the soil. The objective of this study was to evaluate whether highly oxygenated water improved Penncross creeping bentgrass performance and reduced anaerobic black layer in a sandy root zone. Two lathe-house experiments were conducted using two levels of oxygenated water: tap water (3-5 ppm and 12 ppm) and two irrigation regimes (50% and 100% ET). In these short-term experiments, turfgrass performance was not affected by oxygen level. However, visible black layer development was dramatically reduced when highly oxygenated water (12 ppm) was applied through subsurface drip irrigation. Elevating oxygen levels in the irrigation water source appears to be a promising strategy for improving turfgrass performance and rooting with subsurface drip irrigation systems. — Ryan Goss, Ph.D. (ryangoss@nmsu.edu), and Gabriel Ludwig, New Mexico State University



Photo by L. Nelson

### Nonnative invasive aquatic plants in the United States

The Center for Aquatic and Invasive Plants at the University of Florida has developed a Web site (<http://plants.ifas.ufl.edu>) that provides a wide range of information on the characteristics, habitat, identification, problems/effects and control of nearly 500 native and nonnative aquatic plant species found in Florida and other states. An index of the plants on the Web site can be found under the heading Plant Images and Information.



Clark Throssell is GCSAA's director of research.

Clark Throssell, Ph.D.