

Clark Talks Turf

■ TIMELY TURF ADVICE



→ Repairing Winter Damage on Annual Bluegrass Greens

Kevin Frank, Ph.D., Associate Professor of Turfgrass Science at Michigan State University shares his insight on recovering from winter damage on annual bluegrass greens gained from observing recovery procedures on greens in Michigan and experiments on research plots.

Q How do you determine if some of the annual bluegrass on the greens has died? As soon as it is practical, take several plugs from the green or greens you are concerned about and bring them into the maintenance facility. Place the plugs in a warm, sunny location and see if the grass starts to grow. It is vital that you take several cores from each location on each green you are concerned about. Be sure to take a plug from an area where no damage occurred, take a plug from an area where you suspect damage and take a plug from an area where you are certain there is damage. A comparison of recovery among plugs is vital to making sound decisions.

As soon as the snow melts, start a regular routine of observing the turfgrass on the greens to follow the progress of the recovery.

Q What is the first step to promote the annual bluegrass to recover?

Get out early and charge the irrigation system, if feasible, and water if needed. It was dry early in the spring last year and sufficient irrigation was critical to helping the annual bluegrass recover. Don't give up on the damaged turf-

grass until it has received sufficient rainfall or irrigation and had some time and warm weather to recover. Be prepared for a dry spring by having the irrigation system ready.

Keep observing the turfgrass and watch for new leaves.

Q The annual bluegrass on parts of some greens is dead. What next?

The answer depends on the size and number of dead areas. For small areas, sodding with annual bluegrass from a nursery green on your golf course is the best option. The annual bluegrass from the nursery will be the best match appearance-wise to the annual bluegrass on the golf course. Hex-plugs can be used for small areas and sod strips can be used for larger areas.

For larger areas, some superintendents have had success enhancing recovery by aerifying the dead areas, removing the plugs and then aerifying a healthy area of annual bluegrass, collecting the plugs with healthy turfgrass and inserting the plugs with healthy turfgrass hole-by-hole into the damaged area. Yes, this is a time consuming process but it does speed up recovery.

For areas where neither of the above options is a good solution, slit seeding in two directions with creeping bentgrass is recommended. Be patient. Soil temperatures are cool in the spring and it will take several weeks for the creeping bentgrass seed to germinate and develop.

Q What about golfer traffic and mowing? Ideally, you should close the green. The reality is that few courses can close greens due to winter damage. Anything you can do to minimize stress on the green is recommended. Place cups on healthy parts of the green away from damaged areas, raise the mowing height, reduce the number of mowings per week and roll instead of mow.

Q What cultural practices will enhance recovery? Follow the regular fertility program that you normally use, and consider supplying additional phosphorus if it's not already part of your regular program. Phosphorus aids in turfgrass establishment. A slight increase in rate from your regular program, maybe 20- to 30-percent, will help promote recovery.

If you have the budget, cover the greens on cool days and cold nights and remove the covers on warm days.

Green sand can mask the damage on greens with spotty damage. While the green sand may not enhance recovery, it sure helps improve the appearance on the damaged green and might increase golfer satisfaction.

Regular syringing can make all the difference in recovery. Keep in mind the sod, healthy turfgrass aerification plugs and seedlings will all have a short root system and regular mowing isn't going to allow much of a root system to develop. Be prepared to syringe the damaged areas all spring and summer to compensate for a short root system.

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