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Rejuvenating Turf Areas After the Drought of 2002

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Eight weeks or more of high temperatures with virtually no rain has taken a toll on turfgrasses around the state. Though some local areas in central IN have received ample rain in the last week, many areas are still very dry. We are just entering the window when significant turf recovery can be encouraged. Reseeding is most effective in August and September, while September through November are prime growing and fertilization months. Following is brief information to help improve turf this fall.

Assess the condition of the turf

Damage should be clearly visible on irrigated areas, but non-irrigated areas should be watered as needed to green-up those plants that are still alive. Irrigation should be applied every 3 to 5 days to wet the top 2-4 inches of soil. Dormant plants should recover and green-up within 10 to 14 days. If areas do not green up in 2 weeks time, the grass is most likely dead and will need reseeding.

Determine the course of action

Minimal damage:

On Kentucky bluegrass, thin turf with softball-size holes can be healed with aggressive fertilization this fall. On perennial ryegrass or tall fescue, golf ball to maybe baseball size holes can be healed with fertilization. Fertilize in September with 1.0 lb N/1000 ft² with a fertilizer containing 30-50% of the N as slow

release, such as sulfur- or polymer-coated urea, urea formaldehyde, methylenediurea, dimethylenetriurea or natural organic nitrogen. Fertilize a second time near the final mowing in early November at 1.5 lb N/1000 ft² with urea. These two fertilizations will promote good recovery of the turf. If the turf is exceptionally thin, a third application in early October at 1.0 lb N/1000 ft² with urea will provide a tremendous boost to the turf. However, reduce the November fertilization to 1.0 lb N/1000 ft² if you make this October application. Since this October application may encourage snowmold, use it only in thin areas where you can justify this risk with the reward of improved turf.

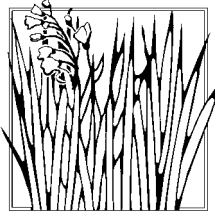
Major damage:

On areas that have more damage than what can be healed through fertilization, reseeding will be needed. Seeding is most effective from Aug 15 through Sep 15 in central IN, a week earlier in northern IN and a week later in southern IN. Seeding as early as possible during this window will provide the best results. Before you overseed, take a step back and determine if reseeding could be only a temporary fix when other major improvements are really needed. Poor drainage, faulty irrigation, poorly-adapted grass species, perennial grassy weeds, compacted soil, buried construction materials, shade, and excessive traffic are just a few of the issues where reseeding is only a band-aid. If

Table 1. Seeding and corresponding fertilization (in lbs N/1000 ft²) schedule for Fall seedings.

Seeding Date	Expected Germination	Starter Fertilizer (0.5-0.75 lb N)	Starter Fertilizer (0.5-0.75 lb N)	Urea	
Aug 15	Aug 20-31	Aug 15	Sep 20-30	Oct 15 (1.0 lb N)	Nov 7 (1.0 lb N)
Sep 1	Sep 7-14	Sep 1	Oct 7-14	Nov 1 (1.5 lb N)	
Sep 15	Sep 22-30	Sep 15		Nov 1 (1.5 lb N)	

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there are no major factors to address, use a hand rake or power rake to disturb the soil and then hand seed small areas. On larger areas, power overseeders are available from rental businesses that can cut grooves and drop the seed at the same time, or professional lawn care and landscape providers can be hired to do this.

Post seeding Care

On newly seeded areas, apply a starter fertilizer at 0.5-0.75 lb N and 1.0-1.5 lb P_2O_5 /1000 ft² at seeding and again 4 weeks after germination. Even if only part of the area was reseeded, it won't hurt the rest of the area to receive this fertilization in lieu of the September fertilization discussed earlier. Depending on timing of seeding, the final application of the year should be 1.0-1.5 lbs N/1000 ft² with urea

as above. See Table 1 for more details on scheduling fertilization.

Newly seeded or overseeded areas should be irrigated often to promote survival of seedlings. Be careful with herbicide applications after seeding because they may damage seedlings. Refer to the label for specifics, but generally waiting until late October to control dandelions will be safe on the seedlings while giving very effective control.

More information

Much more information is available on our web page at <http://www.agry.purdue.edu/turf/> including the following publications:

- AY-3: Establishing Lawn Areas From Seed
- AY-7: Irrigation Practices for Homelawns
- AY-13: Lawn Improvement Programs
- AY-20: Seeding a Turf Area in the Spring
- AY-22: Fertilizing Established Lawns
- AY-25: Purchasing Quality Grass Seed for Your Lawn
- AY-27: Maintenance Calendar for Indiana Lawns