

School Integrated Pest Management: Turfgrass Establishment

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The optimal time to establish turfgrass in Oregon is in the fall (late September and October). Spring (April and May) establishment can be successful as well, but summer irrigation will be required to ensure survival of a spring-established stand.

The following are a list of steps for successful turfgrass establishment. Complete these steps in the order listed below. Steps 1, 2, 4, 5, and 8 are recommended, and therefore can be skipped. Steps 3, 6 and 7 are required for establishment of a healthy turfgrass stand.

- 1. Soil test - Recommended:** A composite soil sample and basic soil test will provide an assessment of the locations pH/lime requirement, and macronutrient levels. For details on soil samples contact the OSU Central Analytical Laboratory (<https://cropandsoil.oregonstate.edu/cal>)
- 2. Weed Control - Recommended:** When establishing a new turfgrass area, apply a non-selective herbicide like glyphosate. If renovating an existing turfgrass stand, apply a selective broadleaf herbicide containing 3 or more active ingredients. Do not apply pre-emergence herbicides when seeding.
- 3. Surface Renovation - Required:** Surface renovation includes dethatching, sod cutting, and tilling. During this phase, remove debris (dead plant material, stones, roots, stumps, etc.).
- 4. Liming and Basic Fertilizer - Recommended:** If the soil test identified acidic soil conditions (pH < 5.5), and a calcium or magnesium deficiency, apply agricultural limestone or dolomite at the labeled rate or at the rate suggested in the soil test.
- 5. Seed Bed Preparation - Recommended:** This is done to relieve surface crusting, compaction, or undulation, which can occur during the renovation process. Seedbed preparation tools include spring rakes, drag mats, or Harley rakes.
- 6. Starter Fertilizer – Required:** Always apply a starter fertilizer when renovating or establishing a turfgrass stand. Starter fertilizer must contain the primary nutrients: nitrogen, phosphorus and potassium. Apply fertilizer with high levels of phosphorus at seeding.
- 7. Seeding or Sodding – Required:** Apply turfgrass seed using a drop spreader or slit-seeder. Apply the seed in two directions at the rate recommended on the bag of seed. Two to three weeks after the initial seeding, reseed areas with poor turf coverage.
- 8. Mulch – Recommended:** Apply a ¼” layer of mulch (bark dust, wood shaving, hydro-mulch, straw, etc.) over seeded turfgrass. Do not exceed ¼” or germination will be inhibited.