Grasscycling and Heathy Lawns

What is Grasscycling?

Grasscycling is the natural recycling of grass by leaving clippings on the lawn when mowing with a mulch mower. Grass clippings are chopped so finely that they quickly decompose, returning valuable nutrients to the soil.

Lawns are often treated like a "crop": they are watered and fertilized to encourage growth. The "harvested crop" (grass clippings) is then gathered up and disposed. Proper mowing, watering and fertilizing practices can result in more moderate turf growth, yet still produce a healthy, green lawn. Grasscycling can be practiced on almost any healthy lawn as long as the following turf management guidelines are followed.

Mowing Tips

Proper mowing is required for successful grasscycling. It is best to cut grass when the surface is dry, and keep mower blades sharp (dull blades can shred grass and create a potential entryway for disease).

• Mow the lawn often enough so that no more than 1/3 of the length of the grass blade is removed in any one mowing.

The benefits of grasscycling

- Mowing time is reduced since the bagging and disposal of clippings is eliminated.
- Grass clippings add beneficial organic matter to the soil, producing healthy, green lawns and reducing the need for turf grass fertilizer and irrigation.
- If a lawn is properly mowed, watered and fertilized, grasscycling can produce a healthierlooking lawn.
- Proper mowing will produce short clippings that will not cover up the grass surface.
- Mow the lawn more frequently when the lawn is growing fast in the spring and less frequently when the turf is growing slowly.
- If a lawn is not cut frequently enough and long clippings are left on the lawn, it may produce a "hay-like" look.
- Raising the mowing height in the summer encourages deeper roots and protects grass from drought and heat damage. See the chart to the right for recommended mowing heights.
- You can grasscycle with almost any mower. Refer to your owner's manual or contact a lawn mower dealer to learn if you can safely grasscycle with your existing mower or if you need to purchase a retrofit kit.
- Mulching or recycling mowers make grasscycling easy by cutting grass blades in to small pieces and forcing them into the soil. Consider using an electric mulching mower to reduce air pollution.

Grass Type	Mower Setting (inches)	Mow when grass is (inches)
Bentgrass	1/2 -1	3/4 - 11/2
Bermuda grass (common)	1 - 11/2	11/2 - 21/4
Bermuda grass (hybrid)	1/2 -1	3/4 - 11/2
Kentucky Bluegrass	11/2 - 21/2	2 1/4 - 3 3/4
Kikuyugrass	1-11/2	11/2 - 21/4
Perennial Ryegrass	11/2 - 21/2	2 1/4 - 3 3/4
St. Augustine	1-2	11/2 - 11/2
Tall Fescue	11/2 - 3	2 1/4 - 4 1/2
Zoysia	1/2 - 1 ½	11/2 - 21/4

It's important to mow frequently in order to produce small clippings that will fall between the standing blades of grass and decompose quickly.

Grasscycling and Thatch

Grasscycling does not cause thatch build-up on lawns. Research has shown that grass roots, stems, rhizomes, crowns and stolons are the primary cause of thatch, which contain large amounts of lignin and decompose slowly. Grass clippings are approximately 80-85% water with only small amounts of lignin, and decompose rapidly. A small amount of thatch (approximately 1/2 inch) is beneficial to a lawn, serving as a mulch to prevent excessive water evaporation and soil compaction.

Watering

Turf grasses vary in their need for water. Most grasses in California need about one inch of water every five to seven days in the growing season and much less during slow growth months. Lawns watered too frequently tend to develop shallow root systems that can make them more susceptible to stress and disease. Deep, infrequent watering produces a deeper, more extensive root system which enables turf to resist disease and stress. Overwatering is not only wasteful, it also causes lawns to grow faster and requires more mowing. The best time to water is early in the morning, as less water is lost due to evaporation. Try to avoid watering in the evening because prolonged damp conditions may encourage disease development.

Check your irrigation systems regularly to avoid water runoff and overspraying, especially if the lawn is on a slope. Look for broken, tilted or clogged sprinkler heads and adjust the sprinkler nozzles to ensure even coverage and avoid overspray. Remember to adjust your irrigation timer seasonally to match the water needs of the turf and turn off your irrigation system when it rains.

Grasscycling is not feasible in every situation.

If mowing is infrequent, grass clippings should be removed, as excessive volumes of clippings can damage the lawn. Grass clippings are an excellent addition to a backyard compost pile, can be used as mulch around trees and shrubs or can be placed in your organics cart for composting.

Fertilizing

Proper fertilization is essential in maintaining a healthy lawn. However, over-fertilization can weaken a lawn by causing excessive and succulent top growth. For moderate, even growth, use a combination of fast acting fertilizers (ammonium nitrate, ammonium sulfate, or urea) and slow release nitrogen sources, such as organic fertilizers. Avoid using large quantities of fast acting fertilizers since they produce very fast growth for short periods of time.

Regardless of the grass type and its fertility needs, your lawn will be healthier with smaller quantities of fertilizer applied more frequently rather than larger amounts applied less frequently.

Alternatives to Turf

If the only time you walk on it is when you mow it, consider converting your turf to low water-use landscaping. Low wateruse plants can be lower maintenance than turf and provide other benefits like pollinator and wildlife habitat (this is particularly true for native plants). See SaveDavisWater.org for options to go beyond the lawn.



Public Works Utilities and Operations PWWeb@CityofDavis.org | 530-757-5686 DavisRecycling.org Updated 12/2022

