STEPS TO REPLACING YOUR LAWN

with Colorful and Water-Efficient Alternatives

Congratulations! You've made a smart decision to begin the lawn removal process. This information is designed to help anyone who is interested in taking the next steps to change their landscape and improve their irrigation practices.

In the Santa Clarita Valley, up to 70% of our water is used outdoors, and in many cases 50% of that is wasted. Many residents are taking steps to ditch the lawn and replace it with beautiful drought tolerant and low maintenance alternatives. Grass has water needs that are twice that of any other plants you'll see in a Santa Clarita landscape, so removing your lawn and replacing it with water-efficient plants will save water.

OVERVIEW

STEP 1: IDENTIFY GRASS TO REMOVE

Before you start, you will want to ask yourself the following questions: Do I want my grass? Do I use my grass? If you answered "no" to one or both questions, you may want to consider lawn replacement.

WHY SHOULD I REMOVE MY GRASS?

Grass uses twice as much water as other ornamental plants used in the landscape. Grass also requires frequent maintenance in terms of mowing, edging, and fertilizing in order to look its best. Using the Santa Clarita Gardens Website (**SantaClaritaGardens.com**), you can find many plants that require less maintenance and water than grass.

WHAT AREAS OF GRASS DO I WANT TO REMOVE?

As you think of your yard, you'll want to separate your grass into two categories: aesthetic and practical. Think of "aesthetic" grass as grass that is attractive, but doesn't really serve a purpose. Think of "practical" grass as grass that is used for kids to play on or dogs to run around on. Leave grass in the areas that are frequently used by children or pets. Other areas that look good, but may be hard to maintain are great candidates for removal. Frequently, residents find that parkways and side yards are excellent candidates for removing grass. These are areas that most likely have aesthetic grass, but no real practical purpose and could be replaced with drought-tolerant plants. Also, prioritize by efficient versus less efficient grass areas. Slopes or any grass that is less than five feet wide, or located next to a driveway or sidewalk should be replaced because it is difficult to water efficiently.

WHEN SHOULD I REMOVE MY GRASS?

You can remove your grass at any time, but the methods described in the Kill and Remove Grass section work best in the warm months.

STEP 2: PLAN & DESIGN NEW LANDSCAPE

A plan will allow you to envision the new landscape as well as tackle any potential challenges in the yard. Below is a checklist to help design your landscape:

1

PERFORM A SITE ANALYSIS

- Identify site elements – house, windows, doors, and walks
- Describe site topography
- Identify existing plants and irrigation
- Describe views – both positive and negative
- Identify negative elements to conceal or screen (electrical /telephone boxes)

2

DRAW A PLOT PLAN

- Make a bird's eye view of the site including the basic measurements, hardscape and plants that will remain

3

MAKE A NEW LANDSCAPE DESIGN PLAN

- Use the Plot Plan as the base drawing (make copies)
- Add your new landscape ideas, including plants, hardscape and irrigation

Beware the desire to "overplant" – remember most of your plants are going to expand in size. Make sure plants have room to grow. Pruning is not the solution to make plants fit into a landscape.

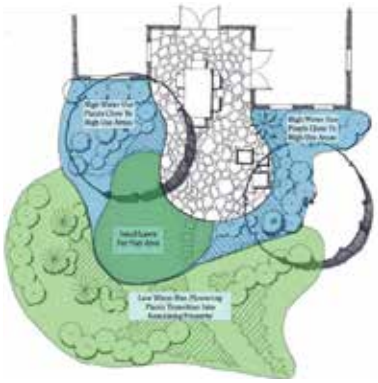
Check out the example below – in the photo on the left, you can see how the landscape looks when it is newly planted. There is a lot of mulch visible, which might be unappealing at first. But in the photo on the right, three months later, the plants are beginning to fill in the landscape.

SELECT IRRIGATION

When choosing an irrigation type for a landscape zone (remember you need the same irrigation type for the entire zone), it is important to consider a few factors:

- type of plant (groundcover, shrub, or tree)
- terrain (flat or slope)
- soil type (clay or sandy)

With any irrigation type, it is important that it is installed and maintained according to the manufacturer's recommendations. Pay particular attention to recommended operating pressure, drip spacing, and bubbler adjustment.



IDENTIFY HYDROZONES

Using hydrozones is an approach to irrigation and planting design in which plants with similar water needs are grouped together in an effort to irrigate efficiently and conserve water (e.g. grass with grass, shrubs with shrubs, etc.).

To improve efficiency and avoid overwatering, customize irrigation schedules for each hydrozone's need.

NOTE: Mixing plants with different water needs can result in over-watering of water-thrifty plants or under-watering of plants requiring regular moisture.

MAXIMIZE WATER SAVINGS

If you are removing grass, you most likely have spray irrigation installed. Spray irrigation typically is measured in gallons per minute with most spray irrigation putting out multiple gallons per minute. In order to maximize your water savings, you will need to convert your spray irrigation to drip irrigation, which puts out gallons per hour directly to the plant. If you keep spray irrigation, it is entirely possible not to save any water and to kill your new plants by overwatering them, because you're watering a large area versus just the plant.

Drip irrigation is used for individual plants with open space between them and is ideal for shrubs and trees. With drip irrigation, water is applied very slowly – typically 1 to 2 gallons per hour. Like all types of irrigation, you need to maintain your drip irrigation system and make sure to remove clogs. A drip system should have both a pressure regulator to keep the pressure low as well as a filter to prevent clogging.

Bubblers are designed to apply a large volume of water in a relatively small area. The flow is measured in gallons per minute, but be on the lookout for ones that apply water in gallons per hour. Many are designed to have an adjustable flow. Depending on the style of bubbler, they can produce a flood of water or stream water in a pattern (i.e., in a half circle), but it is applied over an area that is usually less than five feet in diameter. This makes them perfect for watering large trees and shrubs but, it also necessitates the use of berms or basins around each plant to hold the water and eliminate excess runoff.

SELECT PLANTS

Selecting plants can be the best part of planning a new landscape!

Here are a few things to get you thinking about what plants to select:

- What do I like (in terms of colors, textures, and flowers)?
- How much room do I have?
- What are the water requirements?

If you're not sure what to plant, check out our SCV's Hosttest Plants, a guide which includes the top trees, groundcover and shrubs for the SCV, or visit **SantaClaritaGardens.com** for a wealth of plant and landscape ideas.

SantaClaritaGardens.com

KNOW YOUR SOIL

Successful landscaping requires properly managing your soil! Clay is the predominant soil in the Santa Clarita Valley. It is characterized by being compact, tends to stay wet (the surface cracks as it dries, but the soil is still very wet 4" to 6" deep), water pools on the surface quickly and runs off very easily when the sprinklers run or it rains, and plants can suffer from root problems if over watered. Clay soil absorbs water at a rate of 0.1" – 0.2" per hour. Make sure to cycle and soak irrigate to obtain optimal saturation and minimize runoff.

STEP 3: KILL & REMOVE GRASS

Before you get started, there are a few things to know about grass:

- Grass is a very sturdy plant. It is not easy to kill.
- You will have to continue to kill and remove it over time. New blades of grass may continue to emerge.
- Young grass plants are easier to control than mature plants.
- Don't give up when grass comes back.

There are a few different ways to kill and/or remove existing lawn. We will discuss the three most common methods: **herbicide**, **sod cutter** and **compost in place**. They all have advantages and disadvantages, so choosing one over another is strictly a personal preference.

HERBICIDE

Herbicide is a chemical that is used to destroy unwanted vegetation including grass. It typically provides a faster, more thorough control than other grass removal options. Herbicide will often be applied to kill the grass before the physical removal methods are used.

There are two types of herbicide:

- Non-organic herbicide. Label terms to look for: "Non Selective" and "Systemic." This product will move to the roots to kill the grass.
- Organic herbicide. Typically a "contact" product that only works on the parts of the plant it touches – the blades of grass, not the roots.

If you choose herbicide as the method to kill your grass, consider using a pre-mixed, pre-packaged product and always apply according to the label.

SOD CUTTER

Using a sod cutter is another method to remove grass. A sod cutter is a small walk-behind machine with a gasoline engine with a horizontal blade that slices the grass roots and typically removes about 1/2 inch of soil along with the grass. As a result, grass can be removed in manageable pieces.

This method is most effective if the grass is dead before it is removed. Before using the sod cutter, be sure to mark all sprinkler heads. Do not run over sprinkler heads when operating this machine.

Locally, you can rent a sod cutter from equipment rental stores or hardware stores.

Be sure to follow all of the instructions that come with the machine.

COMPOST IN PLACE

Another option to kill your grass is to compost in place. It kills the existing grass naturally by blocking the sunlight. The process works best during the warm months and will take about 3 to 4 months to complete. You should expect some re-growth, but that can be controlled by using herbicide.

STEPS TO COMPOST IN PLACE

(Using compost, cardboard/newspaper and mulch)

1 **MOW GRASS** short and wet.	**2** **APPLY A LIGHT LAYER OF FINELY GROUND BAGGED COMPOST** under the newspaper/ cardboard.	**3** **APPLY CARDBOARD** or 10 layers of newspaper (overlap edges).
4 **SPREAD A LIGHT LAYER OF FINELY GROUND BAGGED COMPOST** over the newspaper/ cardboard.	**5** **APPLY 6"- 8" OF MULCH** over the top of the paper.	**6** **WET OCCASIONALLY** (don't soak) once every 10 to 14 days during the period required to compost the grass (typically 3 to 4 months).

NOTE: Compost does not need to be removed

COMPOST & MULCH TIPS

Compost Layer(s)

- Spread a light layer of finely ground bagged compost under the newspaper/cardboard AND over the newspaper/cardboard
- This "jumpstarts" the composting and helps speed the process

Mulch Layer

- The top layer (6"-8" thick) should be "chunky" mulch (wood chips are perfect)
- The topping material needs to be heavy and coarse so that it
  - won't wash away
  - won't blow away
  - allows air circulation

STEP 4: GET PLANTING

Before planting, there are a few basic preparation steps that can improve growing conditions.

1. Remove any debris and grade the area, adjusting drainage as necessary by minimizing steep slopes.
2. Dig the planting hole at least 2 times wider than the new plant's root ball, and slightly shallower than the root ball. Add a ½ gallon of water to the planting hole.
3. Install the new plant about one inch above the surrounding soil level.
4. Once the plant has been installed, backfill the hole with a mixture of 75% soil and 25% organic amendment.
5. Make sure the backfill soil is not piled around the trunk of the plant. Install a berm of soil around the outside of the planting hole so the plants can be deep watered without runoff. Apply a layer of mulch to the area outside the berm.

TIP: New plants need to sit an inch above the surrounding soil. That is "above," "not below". Yes, we're serious about this.

Once you've done your prep work and planted your plants, you will need to determine how much you should water to establish your new plants.

HOW TO ESTABLISH NEW PLANTS

How you water your new plants can make all the difference. Deeper, less frequent watering will grow plants whose roots are deeper and healthier, so they are more resilient to drier conditions and stress.

YEAR ONE

- **When Planting.** Water plants as soon as you get them in the ground. Allow the water to soak in and drain, and water again, until the soil is thoroughly moistened.
- **Spring through Fall, When Weather is Dry.** For the first week or so after planting, water just-planted plants more frequently – every other day – as the roots will not be able to access soil moisture from a very large area until they begin to grow. Check the soil moisture daily the first week. Keep it moist but not saturated.
- **After the first week or so…** Unless the weather is extremely hot and dry, you may be able to decrease watering frequency, perhaps to two or three times per week during the first summer.

YEARS TWO TO THREE

You should need to water deeply only twice per week in dry weather if you have selected the right plant for the right place, prepared the soil and planted correctly, and mulched your plants. Exactly how often and how long you water will depend on your soil and other conditions. It is advisable to keep the wells around the plants and deep water with a hose once a month during the hot months even if you have drip irrigation.

AFTER YEAR THREE

Properly planted and watered, plants should be fairly well established by now, and can thrive with less watering than you may expect. Plants selected for drought tolerance may need water one or two times weekly. California natives and desert plants, when selected for the conditions in your yard and watered according to the above guidelines, may need watering only a couple times per month in dry weather.

"How to Establish Plants" information credit: City of Mercer Island, WA

OVERWATERING

Overwatering deprives the plant roots of oxygen. This section will help you understand and identify the symptoms of overwatering, what causes it and corrections you can make to plants that have been overwatered.

SYMPTOMS OF OVERWATERING

Plants & Leaves	Roots
• The plant appears limp. The leaves are wilted, dull and yellow. • Both young and old leaves fall from the plant prematurely and buds fail to open. • Dry, brown discoloration appears between the leaf veins and along the edges.	• More susceptible to pests, bacterial diseases and fungal infections. The root system may begin to rot due to fungal infection. • The stems and roots of the infected plant are soft, break easily and tips turn brown.

CAUSES

Poorly drained and compacted soils without air (anaerobic). Clay soil is compact and drains slowly, creating a saturated area.

CORRECTIONS TO OVERWATERING

1. Decrease the amount of water and let the soil dry out to normal levels. Begin an appropriate watering schedule based on the plant's needs. Calibrate the irrigation timer to match the system type (i.e. drip, bubblers, high-efficiency spray).
2. Dig up the overwatered plant and remove damaged root sections. Work dry compost into the garden bed and replant in the fresh soil.
3. Cut damaged stems from overwatered perennials that are mushy and rotten.
4. Apply fungicide that is safe for the specific type of plant. Read the fungicide label carefully.

LANDSCAPING RESOURCES

SCV Water is here to help! We have a variety of landscape resources to help you reimagine your landscape, as well as water-saving rebates, free home check-ups and other programs to help you save!

Visit **yourSCVwater.com** and click on **Save Water & Money** for more information.

FREE GARDENING CLASSES

bit.ly/SCVwaterGardeningClasses

We typically offer two classes per month – one Saturday morning and one Thursday evening. Learn directly from certified and experienced experts and get your questions answered.

SCV'S HOTTEST PLANTS

We'll let you in on a little secret – the 30 hottest plants of the SCV! These plants thrive through the hottest summers and survive the coldest winter nights. They're attractive, available at your local nursery, drought-tolerant once established, and easy to maintain over the long-term. Not to mention, they don't mind our clay soil!

SANTA CLARITA GARDEN WEBSITE

SantaClaritaGardens.com

Looking for plants for your landscape? Explore beautiful, sustainable, climate-appropriate, and drought tolerant plants, trees and grasses that thrive in the Santa Clarita Valley.

LANDSCAPE DESIGN ASSISTANCE

Landscape Design Assistance (up to $150 value) is a service offered to participants in SCV Water's Lawn Replacement Program who need help with design and plant selection. For more information about our Lawn Replacement Program, visit **conserve.yourSCVwater.com**

SCV WATER CONSERVATION GARDENS

Visit our water-smart demonstration gardens, thriving with varieties of drought-tolerant plants, flowers, and grasses. Take notes, take photos and get inspired!

- **27234 Bouquet Canyon Road**
  Weekdays 8 a.m. – 4 p.m.; Weekends 8 a.m. – 3 p.m.
- **24631 Ave Rockefeller**
  8 a.m. – 5 p.m., 7 days a week