



Tree Watering Guidelines For San Diego County



Trees should be given a higher priority when cutting back on landscape watering. Unlike lawns and shrubs trees take many years to mature, and are expensive to remove and replace. Trees require relatively little water, provide shade, save energy, mitigate climate change, reduce stormwater runoff and erosion, and increase property values.

- These watering rates are for tree survival during drought and may not be optimal for long term tree health.
- SOILS: Estimates are based on clay soils. Split amounts into two waterings for sandy soils.
- Provide a layer of organic mulch 2" to 4" at least 4ft around trunk to keep soil cool and reduce evaporation.
- Increase watering during Santa Ana events.
- Always check the soil for moisture about four inches down before watering.
- Water slowly. When water stops soaking in, the soil has become saturated and reached its water-holding capacity.

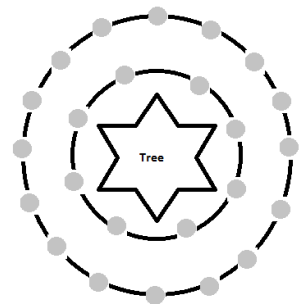
Tree watering frequency and application rates

Tree Size and Establishment Period	Cool Season (Nov-Apr)	Gallons to Apply	Warm Season or no rain	Gallons to apply
Newly Planted Trees	Monitor for moist soil	Depends on need	Weekly	2-5
LOW-WATER TREES				
Small established tree (10ft canopy)	No Water	0	Monthly	20-40
Medium tree (20ft canopy radius)	No Water	0	Monthly	100-140
Large/Mature tree (30+ft canopy radius)	No Water	0	Monthly	220-320
MODERATE-WATER TREES				
Small established tree (10ft canopy)	Monthly	30-60	Every 2 weeks	30-60
Medium tree (20ft canopy radius)	Monthly	110-250	Every 2 weeks	140-260
Large/Mature tree (30+ft canopy radius)	Monthly	270-570	Every 2 weeks	300-600
Very Large/Mature tree	Monthly	800-1000	Every 2 weeks	900-1700
ESTABLISHED HIGH-WATER TREES (Do not plant new high-water requiring trees)				
Large/Mature tree (30+ft canopy radius)	Every 2 weeks	250-350	Weekly	300-400
Very Large/Mature tree	Every 2 weeks	700-1000	Weekly	800-1000

How to water your tree

There are several methods to water your tree. Two examples are:

Soaker hose – New soaker hoses often have the gallons/hr/ft of hose on the packaging. Lay your hose in concentric circles around the drip line (edge of canopy) of the tree and at least one circle outside the canopy (roots go far beyond the drip line). For a 100ft hose with a soak rate of 1gal/hr/ft, you will need to water your tree for two hours to apply 200 gallons. *Soaker hoses often can get clogged or wear down with age which will affect the application rate.*



Drip irrigation – *More accurate method.* Set up at least two concentric rings of emitters similar to the soaker hose setup (example at right). To increase infiltration, use emitters that are 1gal/hr or less. Count the number of emitters, multiply by the gallons per hour the emitter provides to determine how long you need to water. For example 24 emitters x 1gal/hr/emitter = 24 gallons per hour. Water for 10 hours to irrigate 240 gallons.

Trees and Lawns - Trees in lawns generally have shallow roots, as lawns are irrigated for short durations. When lawns are removed or irrigation suspended, trees must be irrigated. *Increase* the duration and *decrease* frequency over time to train deeper and healthier root systems.

Published by the San Diego Regional Urban Forests Council

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