



Advice to Grow by...Ask Us! Master Gardener Program

University of California Cooperative Extension 



February News

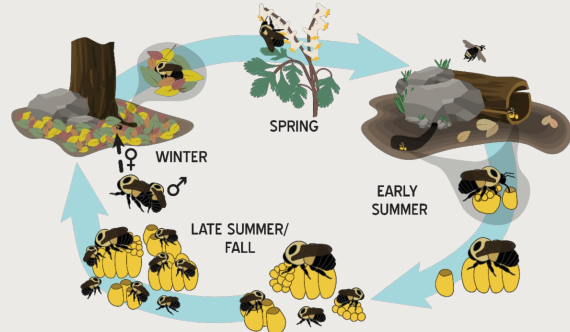


Chart courtesy of Jeremy Hemberger

Greetings Tahoe Gardeners!

This winter has blessed us with a lot of precipitation so far and some really cold temperatures. While you are enjoying the snow, we have a few articles to keep you informed on bumblebees, the white fir, and a special garden in Palm Springs, as the Traveling Gardener takes you to the Moorten Botanical Garden. We also have a few tips on keeping your houseplants healthy. If you want to try winter seed sowing, check out some links which show how to create tiny greenhouses out of one gallon containers, which plants benefit from winter sowing and why winter sowing may produce healthier plants. **We are working on our 2023 schedule of events, check back next month as we complete our planning.**

We are always looking for ideas for news; please email us at LTMGardeners@gmail.com with your ideas and feedback! Thank you.

Kevin Kamp, (kkamp@ucanr.edu)

Bumblebees: A Strategic Gardening Partner

Danielle Rutkowski
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In early spring in the Sierra Nevada, bumble bees are hard to miss. They are among the earliest insects to emerge from their winter dormancy, and are distinguishable from other bees by their large body size and colorful yellow and orange hair patterns. Bumble bees are charismatic and charming insects in their own right, but they are also particularly important pollinators in these montane habitats. Of the 50 bumble bee species in the United States, 22 of them occur in the Sierra Nevada. Their diversity in the mountains is a result of their size and dense hair, which allow them to maintain a high body temperature even on cold days when few other pollinators are active. These adaptations make them crucial pollinators in cold environments where few other insects are active, such as early in the spring or at high elevations.

Tips on Houseplant Care

by Sandy Gainza UC Master Gardener



When you can't garden outside, your attention may turn to your indoor plants. A few tips to keep them

healthy:

Most houseplants are tropical natives; they grow best in warm and humid conditions. You can simulate a warm climate by keeping daytime temperatures around 60-70 degrees. Keeping humidity high enough can be difficult in our dry climate. A couple of ways to do this: fill a saucer with pebbles and add water. Set your plant on top of the pebbles and keep an eye on the water level. You don't want the plant sitting in water, but the evaporation will help raise the humidity level for that plant. You can also use a mister daily to mist the plant's leaves. Do mist the undersides of the leaves as well. If the plant is small enough, take it in the shower with you and let it enjoy a steamy respite from the dry house. Again, don't flood the plant with water! Most house plants require good drainage to simulate their tropical soil which is rich in humus. Yellowing leaves are one indication that the plant is being overwatered.

I generally do not feed my houseplants during the winter, but if

Early spring is a particularly important time for bumble bees. While most bee species are solitary, bumble bees are one of the few groups that live in large colonies. In many ways, these colonies resemble honeybee colonies. They consist mainly of sterile female worker bees living together with one reproductive queen bee. However, bumble bee colonies do not last year-round as honeybee colonies do. Instead, males and new queens are produced in the fall and the rest of the colony dies soon after. Only newly-produced queens survive to hibernate through the winter until the next spring. When they emerge, these queens face the challenge of finding a new suitable nest, foraging for food, and raising the first generation of workers by themselves. This is a particularly vulnerable time for the queen, but if she is successful, the colony can grow to include hundreds of workers in a few months.

Unfortunately, bumble bees' preference for cold habitats can be a detriment in a warming world. For many species, already restricted habitats are becoming even smaller as human activity and global warming change the landscape. Currently, 6 bumble bee species in the United States are listed as endangered by [IUCN](#), and other species are declining. Loss of these bees could have cascading effects on the rest of the environment, but there are a number of ways to get involved and help support these important pollinators. Planting flowers for bees to forage on like lupins, California poppy, and phacelia can help ensure they have the resources they need, particularly early in the season. Nesting and hibernation habitats are other important resources particularly for queen bees.

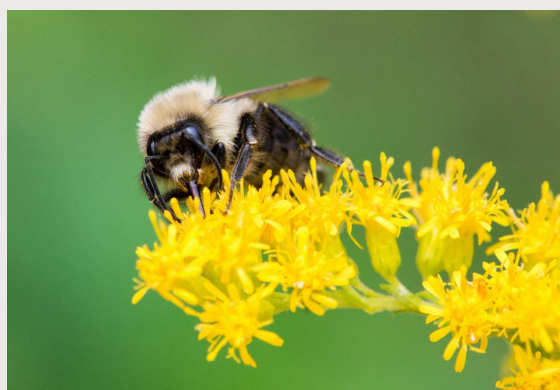
Bumble bees are cavity nesters and will start colonies in a variety of habitats including old rodent burrows, fallen logs, and piles of vegetation. By keeping vegetation piles and fallen leaves in your yard, you can provide additional habitat for them to take advantage of. Finally,

they do need nutrients, feed with half strength fertilizer when watering the plants. The best thing you can do is make sure they get the proper amount of light.

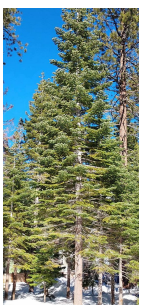
Every year or two, you should repot your houseplants with new planting medium. To do this, remove the plant from its container, and check to see if it is root bound; that is, are the roots coming through the bottom of the pot? Are they wrapped around inside the pot? If so, get one size larger pot, add a well draining houseplant potting mix, remove your your plant from its former home, loosen the bound roots, and gently tamp in the soil mixture. Set the plant in a dish tub with water, and let the soil absorb the water from the bottom for an hour or two. If you do re-use your pot, clean it well with soap and water, and if you can, soak for ten minutes in a diluted (10 to 1) bleach solution to kill any fungus. If there are accumulated salts on the pot, scrub those off before re-using the pot. Hopefully, your houseplants will reward your attentiveness with happy greenery for years to come!

one of the biggest hurdles to bumble bee conservation is a lack of information about the current status of many species. The California Bumble Bee Atlas is a community science program that aims to catalog current bumble bee diversity in California. Through this program, participants perform surveys in areas across California, catching, photographing, and releasing bumble bees. The program provides trainings on how to perform a survey, as well as workshops and resources on bumble bee identification. More information is available on the [Atlas website](#), where you can also sign up for the newsletter to receive updates.

Photo courtesy of Jeremy Hemberger

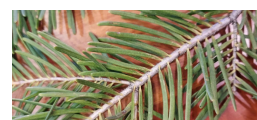


Tahoe Plants and Trees- The White Fir by Dave Long, UC Master Gardener



White Fir (*Abies concolor*)

One of the most abundant conifers in the Tahoe Basin (first or second depending on source), the White Fir (*Abies concolor*) is found from lake level to around 8500 ft where it is replaced by the Red Fir (*Abies magnifica*). The elevation ranges of these two firs overlap in the Basin. The bark of a young trees is smooth and light gray in color. Mature trees may have a fissured bark and a darker gray coloration with blackish furrows. The tree has single flattened needle like leaves that are 1-3 inches in length and have a blunt tip, often slightly notched. Leaves are a light green to a blue-green color. Leaves are spiraled on the stem but twisted, giving the stem the appearance of being upturned or simply 2 dimensional. The cones are held upright and are 2 ½ -6 inches in length and are found on the upper branches Cone development and seed dispersal can take up to 9



months. Crowns of mature White Fir are slightly flattened. The limbs of mature trees have a drooped appearance. The tree can grow over 150 ft. with trunk diameters up to 6 ft. White Firs over 150 years are rare throughout their range.

The white fir is part of the mixed conifer community. Its abundance in part is due to more rapid growth than Jeffery Pines and ability to grow in shaded areas beneath the tree canopy and often closely adjacent to other trees. Because of the faster growth the population grew dramatically following the logging in much of the Basin during and 19th and early 20th century.

White Fir wood is used in construction as dimensional lumber,. It can also be chipped and used as a component in chip board and plywood. It is especially valuable in wooden box manufacture and pallet construction. Several types moths and butterflies utilize the White Fir as essential habitat. The trees are an important nesting tree for several types of birds. The tree is susceptible to dwarf mistletoe infestations as well as the white fir needle miner and bark beetles.

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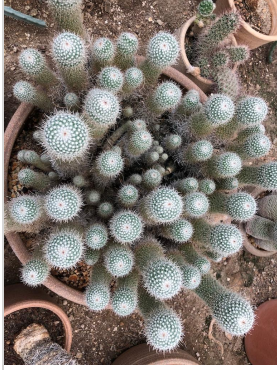
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The Traveling Gardener Moorten Botanical Garden Palm Springs, CA



By Dave Long

Every now and again we all want to get out of Tahoe during the winter and go somewhere warm. Some of us head south to the deserts of southern California. This is a great area if you are a gardener or bird watcher, as there are great landscaping displays, natural oases and gardens (public and private) that attract people and birds in almost equal amounts.



One of the more interesting gardens in the Palm Springs, California area is the Moorten Botanical Garden, an example of how a hobby turned into a commercial operation and tourist stop. The Moorten Botanical Garden specializes in desert plants from around the world, but especially cactuses. Often called the world's first cactarium, the current garden contains over 3000 different species of cactus, succulents and desert adapted plants.



The garden was started in 1938 by Palm Springs pioneers' "Cactus Slim" (Chester) and Patricia Moorten (both have a star on Palm Springs Walk of Fame) who had a hobby of collecting native cactuses from the area and planted them around the house in Palm Springs. Their travels took them to Mexico and South America where they also collected cactus and desert plants. Through exchanges, trades and outright purchases from collectors around the world the collection grew to over 3000 plant varieties. The original location for the Botanical Garden was in the middle of old Palm Springs. The Moortens moved to the existing 2 acre parcel in the 1950s which then was on the outskirts of Palm Springs with plantings installed along a winding path that fronts the ranch style home, which locals started referring to as the Cactus Castle. When the number of visitors and botanical experts wanting to see the many rare or unusual plants, became too much for western ranch hospitality to deal with, the Moortens decided to open the gardens to the public with a nominal fee to offset the cost of upkeep. Their son Clark Moorten and his wife Carolyn now operate the garden and have developed an associated retail business to sell cacti. They contract grow many types of cactuses for the local landscape trade. He still does much of the plant propagation work on-site with assistance from the kids and granddaughter.



Over the years Palm Spring has grown, so now Moorten's is the middle of The Mesa residential neighborhood. The garden and house occupy only a couple of acres, still with the winding walkway that allows visitors to leisurely tour the gardens. The garden is divided into sections generally representing the different deserts of the world, along with areas set aside for displays of rocks, minerals and old mining equipment. The gardens are much improved from years past with improved maintenance

and replacement of the quaint old hand-painted identification signs (which often seemed to walk away - according to Clark) with engraved sandstone signage. The fiberglass greenhouse was refurbished in 2022, with new retaining walls and irrigation installed. That required removal of many of the oldest plants that had overgrown many of their pots and areas. Some maintenance remains to be completed according to Clark. Still the place has an exotic feel, and takes you back to a time when road-side attractions were a fun part of any vacation.

On most days Clark Moorten is on site and is happy to show you many of the old pictures of the garden and his parents, as well as provide details on many of the cactuses onsite. The property can be rented for weddings or special events. There is a large variety of cactus and succulents for sale, with varieties changing with the season.

Moorten Botanical Garden – 1701 South Palm Canyon Drive Palm Springs, CA 92264. (760) 327-6555 **Moorten Botanical Garden Website** 10:00 – 4:00 daily. Closed Wednesday. Cost \$5.00/adult.

Finally: Winter Seed Sowing! Check out these ideas!

This month I came across two interesting articles on how to winter sow seeds outdoors. If you click on these links, you will see how to do it and which plants may benefit from being started this way. I plan to experiment with this technique this season as soon as I round up a few one gallon plastic jugs!

Garden Design on Winter Seed Sowing

Enchanted Garden Design Blog on Winter Sowing



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