Plants

It is far beyond the scope of this guide to describe all plants present in Vistoso Trails. Instead, the focus here is on the most visible and common plants out there - the ones a casual walker or bicyclist is likely to notice. All plants pictured are native, except those in the final section. Most of plants in the preserve are a part of the **desert scrub** community of the **Sonoran Desert**. Vistoso Trails is home to large stretches of beautiful and mostly untouched desert scrub with ancient saguaros and other native plants. There are also some tracts of **mesquite bosque** along the washes. However, in other areas of the preserve the landscape was heavily disturbed when the golf course was established. The former fairways, greens, and sand traps in particular are now mostly barren or being taken over by invasive tumbleweed. There are some encouraging signs as well, such as palo verde saplings emerging from the fairways.

Thank you to desert botanist and cholla specialist **Michelle Cloud-Hughes** for reviewing this section and for providing valuable insight and feedback on the text. Thank you also to independent botanist **Steve Jones**, both for reading through this section and also for providing countless identifications and explanations on iNaturalist. The help was invaluable!

The plants in this guide have been separated into six broad categories:

Cacti (Page 121) Trees (Page 133) Shrubs (Page 140) Wildflowers (Page 146) Others (Page 152) Introduced Plants (Page 157)

Cacti

Cacti are a hugely important part of the ecosystem of Vistoso Trails. Many varieties grow here and they are the most visible vegetation in places. Saguaros are, of course, an iconic Sonoran species, but they are just one example of the 10 or more cacti present. All of the cacti that grow in the preserve produce beautiful, varied, and showy flowers in the spring and summer. Many of them can also be dangerous, especially for young children. Pricklypears, with their tiny, irritating glochids, and chollas, with their easily detached segments, should be given a wide berth.

In this guidebook:

- Saguaro (Page 122)
- Chain-fruit Cholla (Page 123)
- Staghorn Cholla (Page 124)
- Walkingstick Cholla (Page 125)
- Christmas Cholla (Page 126)
- Engelmann's Hedgehog Cactus (Page 127)
- Fishhook Barrel Cactus (Page 128)
- Graham's Fishhook Cactus (Page 129)
- Engelmann's Pricklypear (Page 130)
- Santa Rita Pricklypear (Page 131)
- Hybrid Cacti (Page 132)





Scientific name: Carnegiea gigantea

Notes: Unmistakable and iconic. Saguaros grow all over the preserve, and both old ones and very young ones are present. Sadly, many older ones were damaged by golf balls in the preserve's past life. Look for white flowers in the late spring and open, red fruits in the early summer. Birds can frequently be seen snacking on the fruits. Many preserve birds, especially Gila woodpeckers, make their nests in these cacti.





Photo credit: Eliseu Cavalcante

Common name: Chain-fruit Cholla

Scientific name: *Cylindropuntia fulgida*

Notes: Also called the "jumping cholla" for the ease with which its segments detach from the plant and attach to passersby. Deer and javelina are often observed with cholla segments stuck to their fur. Some chain-fruit chollas are densely covered in spines. Others have fewer. Look for drooping chains of fruit. The hot pink flowers bloom in the late spring and early summer and open daily in the afternoons and evenings before closing back up by morning.

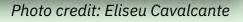




Common name: Staghorn Cholla

Scientific name: *Cylindropuntia thurberi subsp. versicolor*

Notes: A subspecies of Thurber's cholla. Very similar in appearance to the walkingstick cholla on the next page. Staghorn cholla branches are thinner and the spinebearing tubercles are less dense. The flowers can be red to yellow. Both species' branches can vary from purple to green in color.



Common name: Walkingstick Cholla

Scientific name: Cylindropuntia imbricata subsp. spinosior

Notes: A subspecies of the tree cholla. Very similar in appearance to the staghorn cholla on the preceding page, but the branches are thicker and the spines and tubercles denser. Walkingstick cholla flowers are typically magenta-purple.

Photo credit: Gordy Parkhill





Photo credit: Eliseu Cavalcante

Common name: Christmas Cholla

Scientific name: Cylindropuntia leptocaulis

Notes: Named for the festive appearance of its bright red fruits set against the green of its branches. These chollas have a lower, more sprawling habit than the other three in this guide. They have the thinnest stems of any cholla.

Common name: Engelmann's Hedgehog Cactus

Scientific name: *Echinocereus engelmannii subsp. fasciculatus*

Notes: These grow in clumps low to the ground. They are abundant in the undisturbed areas of the preserve. Their flowers are a spring highlight of the preserve. This cactus is also known as the "pinkflower hedgehog cactus."



Common name: Fishhook Barrel Cactus

Scientific name: Ferocactus wislizeni

Notes: Large and sometimes quite tall, these can be confused with young saguaros. They can be quickly distinguished by their distinctive fishhook-shaped spines. Younger plants are more round in shape. Older ones like the one at left often fall over.

Common name: Graham's Fishhook Cactus

Scientific name: Cochemiea grahamii

Notes: The smallest cactus in the preserve, this minuscule, distinctive plant produces gorgeous, comparatively large flowers and small, red fruits. The genus name was recently changed from *Mammillaria*.





Common name: Engelmann's Pricklypear

Scientific name: Opuntia engelmannii

Notes: These are the most common prickly pears in the preserve. They have green pads and yellow to orange flowers. Their fruits are bright red and edible. They have large spines and tiny glochids, which are extremely irritating and difficult to remove.



Common name: Santa Rita Pricklypear

Scientific name: Opuntia santa-rita

Notes: Ranging from bright purple to a mottled green-purple, these beautiful cacti have fewer spines than the Engelmann's but just as many irritating glochids. The purple color deepens with cold and drought, and the green emerges more when the weather is warm and wet. The flowers are typically bright yellow.





Hybrid Cacti

Many cacti readily hybridize, especially the chollas and prickly pears. There are a number of natural hybrids present in Vistoso Trails. The one pictured here is likely a cross between the Christmas cholla and the chain-fruit cholla (*C. leptocaulis x C. fulgida*). Its <u>extrafloral nectaries</u> produced impressive quantities of nectar in the spring and summer of 2022, attracting a host of insects. See this observation on iNaturalist for further details:

https://www.inaturalist.org/observations/114253187