

Madera Canyon Species Spotlight:

Scarlet Morning Glory

With an astounding 2021 monsoon season re-starting the creek, greening up the canyon trees and producing a riot of understory summer vegetation, it seems only fitting to shine the 'species spotlight' into this verdant Madera Canyon productivity.

It is mid-August. Many canyon trails now, particularly at low to mid-elevations, are hemmed in by a dense tangle of shrub and twining vine. The riot of vines is dominated by species of Morning Glory, their large heart or lobed, ivy-shaped leaves easy to spot. There are 10 species of Morning Glory, in the genus *Ipomoea*, in the Santa Rita Range. Eight species grow in Madera Canyon. Most are annuals; all respond and flourish with ample warm summer precipitation. They grow rapidly, flower and set seed quickly before desiccating away in the dry heat of fall. Seeds drop from capsules to the ground, lying dormant until the next warm summer rains to sprout.

Most of our canyon Morning Glory species have similarly shaped leaves. Their showy, funnel-shaped flowers, typically white, pink, blue or purple, open in the evening or early morning, then wilt with the first rays of direct sunlight. The notable exception is Scarlet Morning Glory- its leaves are typical of the group, but trumpet-shaped scarlet red flowers stay open all day and easily distinguish this plant from all the others!

Scarlet Morning Glory, *Ipomoea cristulata*, is a summer annual vine that climbs other plants for support. It grows on hillsides and canyons primarily in the mountains of central & southeast Arizona from 2400 to 9100 feet. Its range extends through the Sierra Madre of Mexico well into Central America. The large, bright-green leaves are usually deeply divided into 3 to 5 long, angular lobes, but sometimes complete and heart-shaped.

The most notable feature of Scarlet Morning Glory is bright scarlet-red flowers, blooming August to October. Rather small for a Morning Glory, the narrow, tubular flowers are about 1¼ inches long and flare into a ¾ inch, pentagonal corolla- a classic trumpet shape! The flowers usually have a yellow throat. Staying open all day, the flowers attract hummingbirds and a variety of insects, particularly Sulphur butterflies, as pollinators. Despite the small size, the bright scarlet color is strikingly visible amongst green foliage and easily seen from some distance away. Scarlet Morning Glory flowers provide an important summer nectar source in the canyon, along with Smooth Bouvardia and Beardlip Penstemon.

Morning Glory as a group are important plants in the canyon food web. Many insects, like grasshoppers and leaf beetles relish the seasonal foliage. They are also the sole larval food plants of the Pink-spotted Sphinx Moth. Large, attractive flowers supply nectar.

Walking the canyon trails this time of year, take a few minutes to look for the distinctive leaves of Morning Glory vines and the bright Scarlet Morning Glory flowers mixed into the tangle. You may also see feeding hummingbirds and discover some very cool insects! Have fun!



Scarlet Morning Glory flowers and leaves



Pink-Spotted Sphinx Moth caterpillar on Morning Glory leaf