



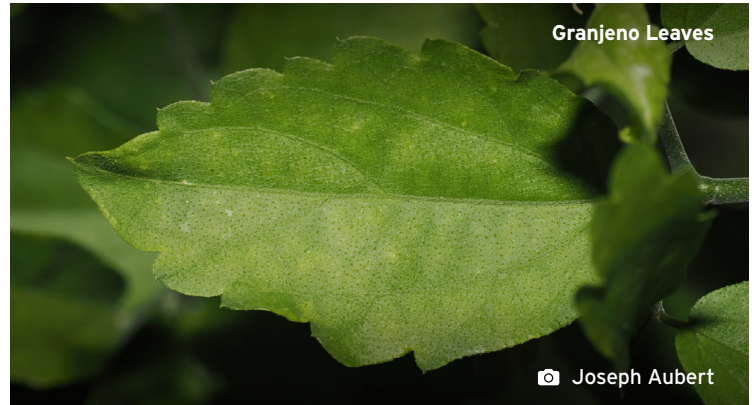
CRITTER CONNECTIONS



**SOUTH TEXAS
PLAINS
ECOREGION**



GRANJENO



The South Texas Plains ecoregion is home to many brush species, each with their own unique benefits. One native species is the granjeno, scientific name *Celtis ehrenbergiana*. This shrub, also called the spiny hackberry or desert hackberry, can reach heights from four to 15 feet tall. It has smooth branches covered with sharp, pointy thorns and rough, sandpaper-like leaves. Its small greenish-white flowers bloom in the spring, eventually giving way to bright, red-orange berries in the summer.

This plant is well adapted to the hot, dry area it grows in. Its thorns act as a defense and zigzag stems protect it from wind damage. Like other native plants in the area, it is drought tolerant, meaning it can survive long dry spells with intense heat.

📷 Cover photo courtesy of Rosario Douglas

Granjeno is a very important plant in the South Texas Plains ecoregion. Its flowers are a valuable food source for pollinators. Deer, caterpillars, and even cattle will eat the leaves of this plant. Its bright berries arrive later than most, providing food for wildlife like birds and raccoons when other food sources may be hard to find. In return, wildlife spread the seeds of this plant through their excrement, or feces.

The granjeno provides more than food to the critters of this ecoregion. Many birds, insects, and small mammals will use this plant for nesting and as cover from predators or the weather. Even more, the granjeno acts as a host plant for the American snout butterflies to lay their eggs. What a neat native Texas plant!

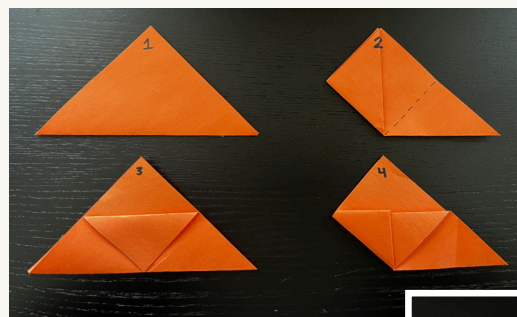
Source: *A Photographic Guide to the Vegetation of the South Texas Sand Sheet* by Dexter Peacock and Forrest S. Smith

TEXAS TORTOISE BOOKMARK

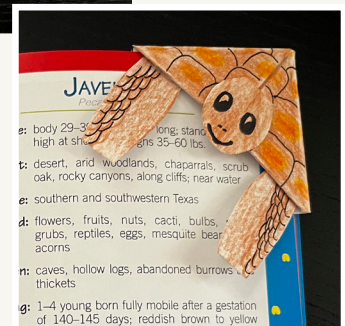
For this craft you will need: a square piece of paper, markers or crayons, scissors, construction paper, and glue. We will begin by creating an origami corner bookmark.

(photo instructions provided in the link below)

1. Fold the square piece of paper in half, making a triangle.
2. Take both corners of the triangle, bring them to the top, fold, then open again. This will form a square in the center of the triangle.
3. Fold the top of the triangle down (first layer).
4. Fold the pieces from step 2 again, and tuck. Now you have a corner bookmark!
5. Turn your bookmark into a Texas tortoise! Use markers or crayons to color the bookmark like a Texas tortoise's shell. Carefully cut construction paper to create two legs and a head. Glue them onto the bookmark.



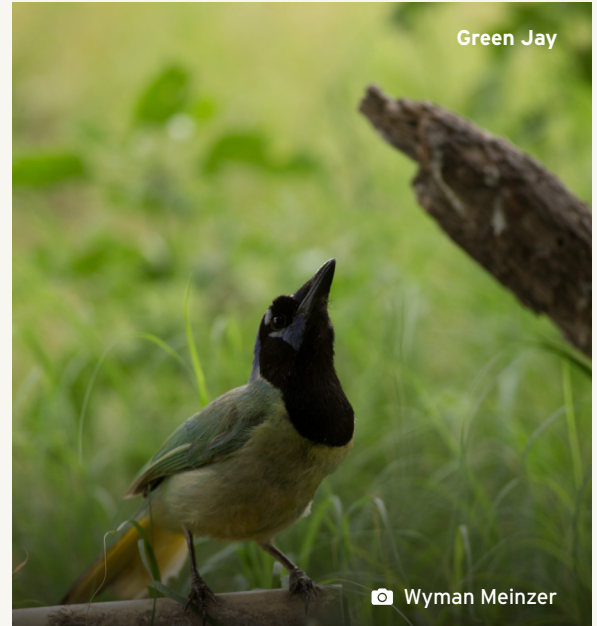
Read the feature article to learn more about the Texas tortoise and other critters found in the South Texas Plains ecoregion.



Activity Source: <https://www.redtedart.com/origami-bookmark/>

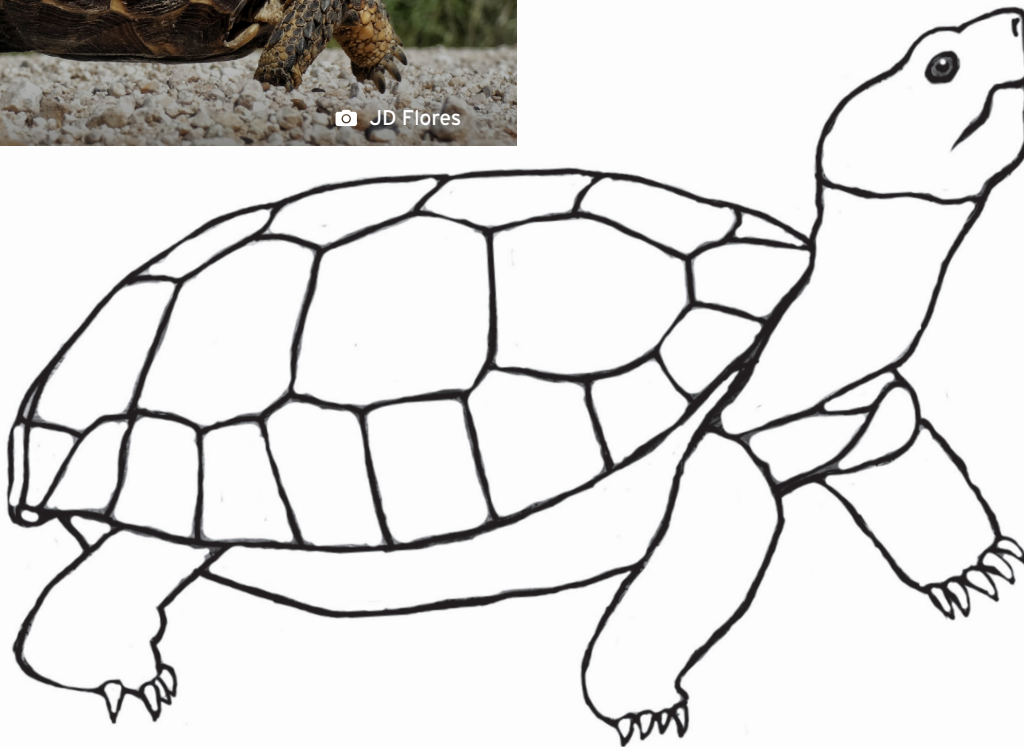
DID YOU KNOW...

- ... that Texas is home to 10 different ecoregions?
- ... that the South Texas Plains ecoregion covers over 20 million acres?
- ... that the South Texas Plains ecoregion is also called the Last Great Habitat?
- ... that the ocelot is endangered?
- ... that ocelots are carnivores?
- ... that the Texas tortoise is our state's only native tortoise species?
- ... that Green Jays move in family groups?
- ... that Green Jays use sticks to lift bark when looking for food?
- ... that the Texas unicorn mantis undergoes incomplete metamorphosis?
- ... that ecotourism is the responsible travel to visit natural areas?



COLOR ME TEXAS TORTOISE

(*Gopherus berlandieri*)

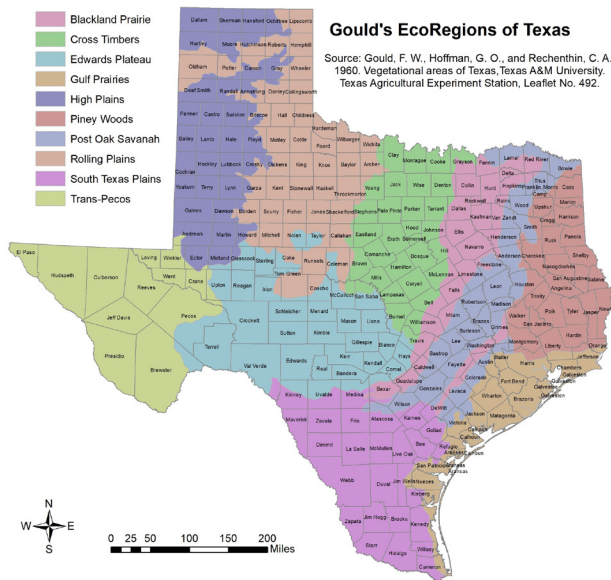


Activity Source: Sheri Amsel, exploringnature.org

SOUTH TEXAS PLAINS ECOREGION

By Amber Brown
Conservation Education Specialist, Texas Wildlife Association

📷 Ty Higginbotham



Texas is home to 10 different Gould's ecoregions as seen on the map above. Ecoregions are areas of land that share similar climate, **topography**, and soils. In this series, we will dive into each of Texas' 10 ecoregions one *Critter Connections* issue at a time. Next up - the South Texas Plains!

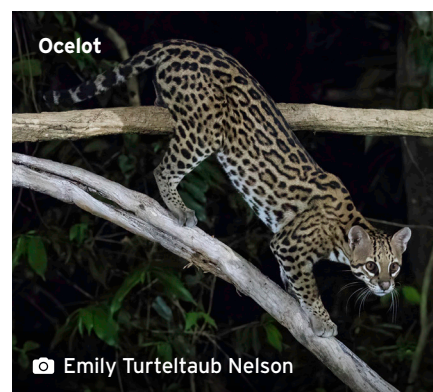
The South Texas Plains ecoregion, sometimes called the Brush Country, Tamaulipan Thornscrub, or South Texas Brushland, covers over 20 million acres of southwestern Texas. Beginning at the edge of the Hill Country, this region runs south to the Lower Rio Grande Valley and stretches eastward from the United States-Mexico border to the Gulf Prairies. The South Texas Plains ecoregion includes the cities of Brownsville, McAllen, Laredo, and even some parts of San Antonio. This area is known for unpredictable rainfall, high temperatures, and frequent droughts that can last between two to five years.

Historically, this region was a grassland with scattered clumps of mesquite trees and prickly pear cacti. Naturally occurring wildfires kept the brush at bay and cycled nutrients back into the soil. Over time, overgrazing and fewer naturally occurring fires lead to the once open grasslands giving way to brush. Still, many different types of ecosystems can be found in this area. Aside from brushlands and the remaining grasslands, you can find subtropical woodlands, wetlands, and the South Texas sand sheet, to name a few. This creates a lot of **biodiversity**, giving the ecoregion another nickname - the Last Great Habitat. This biodiversity, in addition to climate and location on migratory pathways, attracts hundreds of bird species. Some tropical birds found here do not occur anywhere else in the United States! In addition to birds, a

wide variety of butterflies pass through the area as well. About half of all North American butterfly species have been spotted at the Santa Ana National Wildlife Refuge! People visit this area to see the incredible plants and animals. This creates **ecotourism**, an important part of this ecoregion's economy. The migratory species are not the only unique critters to call the South Texas Plains ecoregion home. This area's resident wildlife is just as extraordinary!



In the dense brush of this ecoregion hides one of Texas' most rare critters, the ocelot. Ocelots are medium-sized cats with reddish-brown, white, and tan fur. Each cat has unique markings made up of dark spots, bars, and rings. The markings act as camouflage, helping the ocelot blend into its surroundings. These native mammals are nocturnal, meaning they are active at night. During the day, they rest under thick brush, relying on it to keep them hidden. They are carnivores, meaning they eat only meat, and will prey on birds, reptiles, and small mammals like mice or rabbits. Ocelots need large and connected areas of very thick and dense brush to survive. Only about one percent of South Texas has the habitat they need, most of which is too small or scattered to be used. In Texas, the ocelot population has declined due to



habitat loss through urban development, agriculture, and **habitat fragmentation**. A growing issue is roadways. Within the last 20 years, about half of the ocelot deaths in Texas were due to vehicle strikes. Because there are fewer than 100 of these beautiful

cats left in Texas, they are listed as endangered, meaning they are at risk of disappearing from our state entirely.

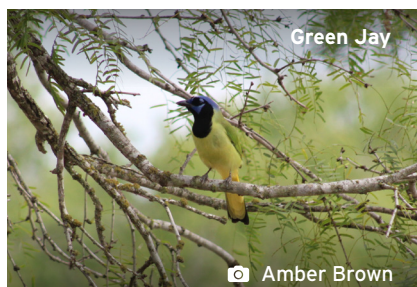
Another rare sight in the South Texas Plains ecoregion is the Texas tortoise, found only in southern Texas and northeastern Mexico. Measuring about one and a half inches long after hatching, these critters can grow up to 10 inches long, making them the smallest tortoise species in North America. These reptiles are identified by their brown, high-domed shells, yellow-orange **scutes**, and thick, sturdy legs. Texas tortoises



are well adapted to their environment. Their shells provide protection and camouflage, the scales on their legs protect them from thorns, and their diet of plants like grass and flowers

keeps them hydrated. These **herbivores** especially enjoy the sweet, juicy fruit (tuna) of the prickly pear cactus. Over the years, their population has declined due to pet trade, habitat loss, and low reproductive rates. Due to this decline, the Texas tortoise, Texas' only native tortoise species, is listed as threatened in our state. This listing protects it from being captured, sold, or kept as a pet without special permits.

One critter that you have likely seen in the South Texas Plains ecoregion is the Green Jay. These native Texas birds are one of the ecoregions' most colorful and charismatic animals. While their bright green, yellow, and blue feathers may seem out of place, it actually helps them blend in with nearby brush and trees. They are known for their loud calls, especially when danger is near. When Green Jays spot a predator, they will call to warn others and will swoop at, dive towards, or chase the threat. Green Jays are omnivores, meaning they will eat both plant and animal material like fruits, seeds, insects, and small lizards or frogs. They are often found in family groups and will



move from area to area together as they search for food. They are incredibly smart too; these resourceful birds have been known to use sticks to lift loose tree bark while looking for insects! Once restricted to South Texas, the Green Jays' **range** has slowly expanded northward. Similarly, the Blue Jays' range has expanded westward, leading to a new overlap between the two species. The first reported case of a Green Jay and Blue Jay **hybrid** was documented recently, when a bird resembling both species was found in a San Antonio backyard.

Even the insects in the South Texas Plains ecoregion are diverse. So diverse, in fact, that you can find a unicorn - the Texas unicorn mantis, that is! Like a praying mantis, the Texas unicorn mantis will position its two front legs near its head to capture prey. The Texas unicorn mantis can be identified by its brown stripes, bright green wings, and namesake horn-like structure on its head. These native insects go through incomplete metamorphosis, a three-stage life cycle that includes egg, nymph, and adult stages. Like other critters that go through incomplete metamorphosis, the Texas unicorn mantis' nymphs look like smaller, wingless adults. As they mature, they will grow wings and begin eating larger insects like moths and butterflies, in addition to the smaller flies and aphids eaten in the nymph stage. Next time you see a praying mantis in South Texas, be sure to look closely; it may be a unicorn!



The South Texas Plains ecoregion has faced many challenges throughout the years. Changing plant communities, habitat loss, and urban development have made a lasting impact on the plants and wildlife that call this ecoregion home. Still, there is hope! The critters that live in this region are just as tough as their environment. With effort, education, continued research, and habitat restoration in addition to the combined work of conservation organizations, landowners, and citizens, the plants and wildlife of the South Texas Plains can thrive for years to come.

WORD BANK

Topography - an area's physical shape; for example rivers, hills, and valleys

Biodiversity - the variety of plant and animal life in an area

Ecotourism - travel to responsibly visit natural areas

Habitat fragmentation - breaking into smaller pieces

Scutes - bony plates

Herbivores - an animal that eats only plant materials

Range - area where a species occurs

Hybrid - a mixture of two different species

LEARN MORE ONLINE

www.texas-wildlife.org/critter-connections-library

Visit the **Critter Connections** library
for enrichment activities and resources
to take your learning to the next level.

Article Source:
The Natural History of Texas by
Brian R. Chapman and Eric G. Bolen



DOUBLE PUZZLE

Unscramble the words below to solve the final message.

A native rare mammal: COTOLE
 [] [] [] [] [] []
 10 5

Texas' only native tortoise: XESTA ETTOOIRS
 [] [] [] [] [] [] [] [] [] [] [] []
 7 11 14 4 12

A bright native bird: ENRGE YJA
 [] [] [] [] [] [] [] []
 6 13 8

A unique native insect: XSATE OCRNNIU NMAITS
 [] [] [] [] [] [] [] [] [] [] [] [] [] [] []
 9 3 1

An important native plant with red-orange berries: GENNOJAR
 [] [] [] [] [] [] [] []
 2

All of the above can be found in the: [] [] [] [] [] H [] [] [] [] [] [] P [] [] [] [] [] [] ECOREGION
 1 2 3 4 5 6 7 8 9 10 11 12 13 14

Visit the Critter Connections library at www.texas-wildlife.org/critter-connections-library to view the answer key.

NANCY'S CORNER

Ecotourism is the responsible travel to visit natural areas. This type of tourism encourages people to enjoy natural resources and respect local cultures while reducing waste, pollution, and disruption to wildlife and their habitats. Its many benefits include supporting local communities, creating jobs, and teaching people about natural resources. A very important part of ecotourism is supporting conservation efforts in the area.

In areas like the South Texas Plains ecoregion, where there are many threats to native plants and animals, ecotourism's impact on the economy gives leaders another reason to value and protect natural resources. Texas' first ecotourism center was created in Cameron County in the southern tip of the South Texas Plains. Some activities that create ecotourism in this ecoregion include birding, butterfly watching, moth nights, nature bingo, and more!

What kind of ecotourism can you find in your ecoregion? How does it benefit people? How does it help natural resources? What activities would you create to promote responsible ecotourism in your area? Grab a piece of paper or a nature journal to write down your ideas.





Youth Education

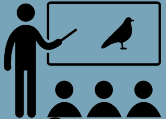
Texas Ecology | Natural Resources | Conservation | Stewardship

Classroom & outdoor experiences for educators & students (at no cost)



Discovery Trunks

Hands-on materials and lessons shipped statewide to schools and sites



Wildlife by Design Classroom Presentations

Classroom & outdoor TWA Educator-led interactive in-person presentations



Land, Water & Wildlife Expeditions

Middle & High School program series culminating with a day of outdoor studies focused on land, water, and wildlife



Distance Learning

Interactive youth video lessons



Online Lessons

Online compilation of lessons emphasizing the action component of conservation and stewardship



Critter Connections

Quarterly kids magazine focused on native plants and wildlife



Professional Development

Trainings which increase participant conservation and stewardship knowledge and provide information about classroom resources

Become part of the TWA Family!



Youth Education

Adult Education

Professional Development



Texas Youth Hunting Program

Adult Learn to Hunt Program

Texas Big Game Awards



**TWA is the leading voice for
wildlife conservation policy
in Texas.**

Membership Benefits

One-year subscription to *Texas Wildlife* magazine
TWA e-newsletters
Exclusive TWA Member decal
Networking and Volunteer Opportunities



Membership Levels

Friend of TWA* \$35 | Associate \$75 | Active \$150 | Family \$250 | Corporate/Ranch \$750

*digital-only copy

www.texas-wildlife.org



TEXAS WILDLIFE ASSOCIATION

FOUNDATION

Providing essential funding to the education programs of Texas Wildlife Association

Please consider making a tax-deductible investment to TWAF, and help us as we continue to change minds and lives, through natural resource education. Together, we can make sure that Texans understand the importance of wild things, wild places, and the stewards who care for them.



www.twafoundation.org