

Dragons and Damsels are Here!

If it is summertime in North Central Texas, then it is dragonfly season. Chances are you have seen dozens of these amazing insects in your gardens, backyards, and fields. They are important to the environment and the natural control of insect pests. Of the 5952 different species of dragonflies and damselflies in North America, 147 dragonflies and 74 damselflies are found in Texas. As with many of nature's creatures, as we learn more about these insects, we truly appreciate how fascinating and important they are.

Dragonflies and damselflies play an important role in aquatic and terrestrial habitats. Their nymphs eat mosquitoes and midge larvae, as well as small fish and tadpoles, and serve as food for fish and amphibians. Adults are eaten by birds, bats, lizards, and spiders. Dragonflies and damselflies provide information about the health and diversity of a habitat.

Dragonflies and their "cousins", damselflies, belong to the scientific order Odonata. While there are similarities between the two, there are also several differences.



DRAGONFLIES

- wider abdomen
- eyes touch (or nearly so)
- hindwings broader than forewings
- wings held horizontal when perched



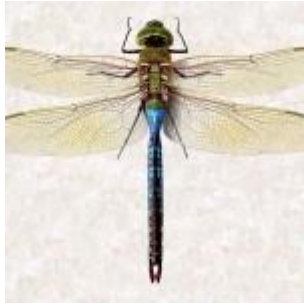
DAMSELFLIES

- slender abdomen
- eyes separated
- equal sized wings
- wings folded above or along body when perched

Dragonflies and damselflies begin their lives in aquatic habitats, such as ponds, lakes, rivers, and streams. The eggs hatch into nymphs who spend their lives as voracious predators. As the nymph nears the end of this life stage, it crawls out of the water onto a plant or rock to emerge from its exoskeleton as a young adult. Once the adult has matured, it begins its life stage that includes hunting for insects and reproducing.

Dragonflies are skilled flyers. Their four wings move independently of one another, allowing the insect to hover, shoot up, zigzag, or even fly backwards for short distances. The dragonfly can fly up to 30 mph, rivaling some small songbirds. Dragonflies' compound eyes also give them an incredible advantage as a hunter. With 30,000 separate lenses, the dragonfly has an almost 360-degree field of vision and can see color, movement, shape, and ultraviolet and polarized light. These characteristics help the dragonfly as it hunts for insects. In fact, one dragonfly can eat hundreds of mosquitoes in a day!

Scientists have identified five species of dragonflies who migrate from northern regions of North America to the southern United States, Mexico, and possibly Central America in response to seasonal changes. These five are also among the dragonflies you may see in Texas. Migrating dragonflies include the Common Green Darner, the Black Saddlebags, the Variegated Meadowhawk, the Wandering Glider, and the Spot-winged Glider.



Common Green Darner



Black Saddlebags



Variegated Meadowhawk



Wandering Glider



Spot-winged Glider

Species photos from Digital Dragonflies, Texas AgriLife Research, <https://agrilife.org/dragonfly>

Want to see more dragonflies in your backyard? Creating a dragonfly habitat is a great way to attract these beneficial insects. Successful dragonfly habitats include:

- freshwater – flowing or standing, dependent on the species
- emergent, submerged, and floating plants for perching, roosting, and laying eggs
- shallow water margins
- upland vegetation for adult shelter
- shelter from wind, as well as sunny areas for perching

The Migratory Dragonfly Partnership, <http://www.migratorydragonflypartnership.org/>, has an online booklet with more information about creating and managing backyard habitats for dragonflies and damselflies.

Observing dragonflies is one of the many gifts of nature we are fortunate to enjoy in North Central Texas. Protecting the natural habitats of these amazing creatures is one way we can contribute to their conservation.

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