

Green Darner (*Anax junius*)

Green Darners are an important member of the New York/New Jersey Harbor Estuary's food chain.

They provide food for fish, turtles, frogs and birds and eat insects, most notably the mosquito. They

make their one way migration into the Estuary at the same time that the region's migrating bird populations do and are an important source of food for these birds during a critical time. They also eat

copious amounts of mosquitoes, making them natural controllers of this seasonal pest.

This quality has earned the Green Darner the alternate name of "mosquito hawk."



The Green Darner is the largest, most abundant, and widespread of the 200 dragonfly and damselfly species documented in the area of the Harbor Estuary. World-wide, about 6,500 dragonfly and damselfly species are known to exist. Fully grown, the Green Darner measures about 3 inches long with a 4½ inch wingspan. They are best known for their iridescent green head and thorax. The abdomen is yellow and brown on the female and long, slender, and bluish on the male. Both have clear wings with a yellowish tint towards the back. The wings are strongly veined in a net-like pattern. They have strong jaws, spiny legs, and large compound eyes which give them a nearly 360° range of vision. Most of the Green Darner's brain is dedicated to processing and responding to what they see.

Green Darners can spend several years in the larval form and live only about four to seven weeks as winged adults. As larvae they eat fish eggs, tadpoles and other small aquatic animals. As adults they eat wasps, butterflies and flying insects including mosquitoes and other dragonflies. During their larval stage they are called nymphs. This stage can last for 2 to 3 years. During that time, the nymph will go through 11 to 12 larval stages before metamorphosing into a dragonfly. Once they emerge from the water they are adults and able to reproduce. The females will lay one egg at a time in little slits in submerged aquatic plants.

In the Harbor Estuary, they are most likely to be seen, depending on the weather, from April to early December with a preference for the Estuary's wetland, salt marsh and coastal dune areas.

The Estuary's Green Darner population is fairly abundant and they seem to face only one threat, the loss of the freshwater habitats in which they breed.



This entry was researched and written by Claire Antonucci, Rosemary Higgins and Cathy Yuhas of the New Jersey Sea Grant Consortium Extension Program. It is part of a larger project, "The Key Species of New York/New Jersey Harbor Estuary" produced with funding from the New York/New Jersey Harbor Estuary Program.