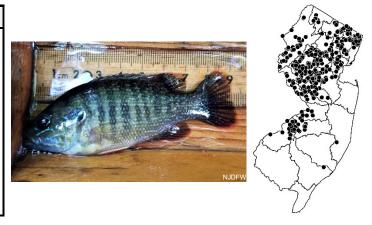
## Green Sunfish (Lepomis cyanellus)

<b>Historical Presence</b>	Abundance	Life History	Management
Non-Native	Common	Freshwater	Invasive

## **General Information**

A moderate sized sunfish species with dark coloration and large mouth. Key identifying features are yellow/orange edges on its 2<sup>nd</sup> dorsal, caudal and anal fins; a wide pale margin on its earflap; and short rounded pectoral fins. This invasive species has quickly established throughout NJ and replaces native species because of its aggressive nature, wide habitat and water quality tolerance, and large gape to consume larger prey than its native competitors. Considered a potentially dangerous species, its possession or release is prohibited.



Geographic Range Native to Great Lakes, Hudson Bay, and Mississippi R. basins from NY and ON to MN, and south to Gulf; Gulf Slope drainages from Escambia R., FL, and Mobile Bay, GA and AL, to Pecos R., NM. Also n. Mexico. Introduced over much of the U.S.

## **Habitat Description**

Quite pools and backwaters of sluggish streams; lakes and ponds. Often found near shorelines around cover such as vegetation, rocks, or woody debris.

Optimum Habitat Requirements				
Dissolved Oxygen	> 5 mg/L			
Temperature	18 – 28.2 °C			
рН	6.5 – 8.5			
Turbidity	25 – 100 JTU			
Current	< 0.10 m/s			

Diet			
Fry	Zooplankton		
Juveniles	Insects, crayfish, and fish		
Adults	Fish eggs, snails, frogs, mollusks, insects, crayfish, small fish		
<b>Notes:</b> Terrestrial and aquatic insects appear to be its most important food items.			

Reproduction					
Time of Year	June – August	Age Males Mature	1 – 3		
Temperature Range	20 – 27 °C	Age Females Mature	1 – 3		
Water Depth	0.04 – 0.35 m	Nest	Circular depressions		
Substrate	Sand/gravel near cover	Egg Type	Demersal (adhesive)		
Time of Day		Parental Care	Male guards		
Critical pH		Days to Hatching	3 – 5		
Velocity Range	Slow	Oxygen Level			
Notes: Ago at maturity varies by geographic location. Males are highly territorial and construct posts in					

**Notes:** Age at maturity varies by geographic location. Males are highly territorial and construct nests in colonies. Green Sunfish hybridize naturally with Bluegill, Pumpkinseed, Redbreast Sunfish, Longear Sunfish, Redear Sunfish, and Warmouth.

## Size and Growth

Adults typically 70-180 mm up to a maximum of 310 mm. Maximum age 10 years.

References

(Carlander 1977; Stuber et al. 1982; Johnston 1994)

- Carlander, K. D. 1977. Handbook of Freshwater Fishery Biology, Volume Two; Life History Data on Centrarchid Fishes of the United States and Canada. Wiley-Blackwell.
- Johnston, C. E. 1994. Nest association in fishes: evidence for mutualism. Behavioral Ecology and Sociobiology 35(6):379–383.
- Stuber, R. J., G. Gebhart, and O. E. Maughan. 1982. Habitat suitability index models: Green sunfish. Pages 0–28. U.S. Dept. Int. Fish Wildl. Serv., FWS/OBS 82/10.15.