



**Common Name:** GOLDLINE DARTER

**Scientific Name:** *Percina aurolineata* Suttkus and Ramsey

**Other Commonly Used Names:** none

**Previously Used Scientific Names:** none

**Family:** Percidae

**Rarity Ranks:** G2/S1

**State Legal Status:** Endangered

**Federal Legal Status:** Threatened

**Description:** The goldline darter is slender-bodied and can reach 9 cm (3.5 in) total length. This darter has a brown or amber wavy stripe above 8-9 oval blotches along the sides. The fins are lightly banded, and three vertically-aligned spots are found at the base of the caudal fin. Juveniles have dorsal blotches that usually become indistinct in adults. Breeding males develop bright yellow coloration dorsally, including a yellow or orange submarginal band on the dorsal fins, and bluish coloration ventrally.

**Similar Species:** Goldline darters may be distinguished from blackbanded darters (*P. nigrofasciata*) by having 8-9 oval-shaped lateral blotches (vs. 12-15 vertically elongate blotches in the blackbanded darter). The bronze darter (*Percina palmaris*) is commonly collected with the goldline darter and may also have some irregular dorso-lateral markings. The bronze darter differs in having two rounded pale marks at the base of the caudal fin, bright male breeding coloration, and more vertically oriented lateral blotches. The goldline darter could be confused with the bridled darter (*Percina kusha*) in the Talking Rock Creek system. In contrast to the bridled darter, the goldline darter usually has a serrated preopercle margin and 1-3 pored lateral line scales extending onto the caudal fin base (vs. no serrations on preopercle and 1 or no pored lateral line scales extending onto the caudal fin in the bridled darter). Furthermore, the dorsum of the bridled darter lacks the distinctive dorso-lateral markings that are characteristic of the goldline darter.

**Habitat:** Goldline darters occupy medium-sized rivers and large tributary streams. Their preferred habitat comprises riffles and runs with swift current over gravel, cobble,

bedrock and boulder substrate, often with patches of sand and riverweed.

**Diet:** Aquatic invertebrates.

**Life History:** Spawning probably occurs in spring and early summer, with spawning pairs burying eggs in gravel substrata. Other aspects of the life history of the goldline darter are undocumented.

**Survey Recommendations:** Goldline darters can be collected using a seine, with or without the use of a backpack electrofisher. They may also be observed by snorkeling, but poor water clarity often limits this survey technique in many streams within its range.

**Range:** The goldline darter is known only from two widely separated localities, the Coosawattee River system in Georgia and the Cahaba River system in central Alabama. In Georgia, this species is historically known from the Cartecay and Ellijay Rivers, Mountaintown Creek, the mainstem Coosawattee River, and Talking Rock Creek (a tributary to the Coosawattee River downstream of Carters Reservoir). Check the [Fishes of Georgia Webpage](#) for a watershed-level distribution map.

**Threats:** Increasing urbanization and residential development in the Coosawattee River system, resulting in deleterious effects on water quality and stream habitat, pose the major threat in Georgia. Stream bank trampling and nutrient enrichment associated with cattle grazing is also a significant threat to the population in the Ellijay River. Water quality degradation has significantly reduced the goldline darter's range in the Cahaba River in Alabama, and further deterioration in water quality (from urbanization, sewage, and mining activities) continues to threaten the species.

**Georgia Conservation Status:** Goldline darters are typically found in low abundance (fewer than 5 individuals). Occasions where greater numbers of individuals were collected mostly date back to the late 1970s. Nonetheless, the population in Georgia may be stronger than that in Alabama, where the range of the goldline darter has contracted. Steve Powers sampled 16 sites in the Coosawattee River system in 2008 and detected goldline darters at 7 sites located in the Cartecay River, Ellijay River, Mountaintown Creek and the Coosawattee River upstream of Carters Lake.

**Conservation and Management Recommendations:** Conserving populations of the goldline darter depends on maintaining and improving habitat quality in the Coosawattee River system. There are many [technical assistance and cost-sharing programs](#) that can help farmers implement best management practices, such as restricting cattle access to streams. It is essential to eliminate sediment runoff from land-disturbing activities, such as roadway and housing construction. Although it was developed for a different river system, appropriate technical guidance on how to minimize the impacts of development on sensitive fishes is available through the [Etowah HCP website](#). [Forested buffers](#) should be maintained along the banks of the river and tributary streams and there are many to re-plant native vegetation where buffers have been impacted by home construction or past agricultural activities. Maintaining natural streamflow patterns by preventing excessive

water withdrawal or unnaturally flashy runoff (such as from urban stormwater runoff) is also an essential element of protecting riverine habitat quality.

### **Selected References:**

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- U.S. Fish and Wildlife Service. 1991. Endangered and threatened wildlife and plants; proposed threatened status for the fish the goldline darter (*Percina aurolineata*) and blue shiner (*Cyprinella caerulea*). Fed. Reg. 56(76):16054-16059.

**Author of Account:** Byron J. Freeman

### **Date Compiled or Updated:**

- B. Freeman, 1999: Original Account: 1999
- K. Owers, Jan 2009: Updated status and ranks, added fish atlas link, converted to new format, minor edits to text.
- M. Hagler, July 2009: general update of account
- B. Freeman, July 2009: added photo July 2009
- B. Albanese, August 2009: Incorporated Powers citation, additional photo, and minor editing.
- Z. Abouhamdan, April 2016: updated links



Goldline darter (*Percina aurolineata*) collected from the Cartecay River, Gilmer Co., GA.