

Paralichthys tropicus (Tropical Flounder)

Family: Paralichthyidae (Large-tooth Flounders)

Order: Pleuronectiformes (Flatfish)

Class: Actinopterygii (Ray-finned Fish)



Fig. 1. Tropical flounder, *Paralichthys tropicus*.

[<http://www.fishbase.org/photos/PicturesSummary.php?ID=982&what=species>, downloaded 19 November 2016]

TRAITS. The tropical flounder *Paralichthys tropicus* has an oval body shape, length 2.1-2.3 times the depth, a pointed head and a large slanted mouth with an extending lower jaw. The anterior teeth are large and canine-like (Fig. 1). The dorsal fin originates near the upper eye, and the pectoral fin nearly reaches the anterior end of the lateral line. The caudal fin has a pointed shape. Tropical flounders come in colours ranging from brown to grey with large round dark spots on the head, body and fins, and smaller dark and pale spots, to assist them in camouflage.

DISTRIBUTION. *P. tropicus* is distributed widely in the western Atlantic (Fig. 2), including Trinidad and Tobago (Uyeno et al., 1983; Cervigon et al., 1992; Munroe, 2002).

HABITAT AND ECOLOGY. The tropical flounder can be located over sandy or muddy bottoms from inshore waters to a depth of 180m. This fish can grow to a maximum of 57cm but is commonly less than 30cm. They feed on crabs, fish and polychaetes (Rosas et al., 1999). These fish have two reproductive peaks: the first peak is between July and August and the second peak is from December to March. When it is time for them to spawn they migrate to shallow waters. Tropical flounders use camouflage to hide from their predators (Fig. 3). These fish are carnivorous and also use camouflage to attack prey. They hunt independently.

REPRODUCTION. The *P. tropicus* mating season occurs during the warmest months. The females produce approximately 100,000 eggs; older females produce more eggs. The eggs are released into the water where the male can release his sperm to fertilize them externally. The fertilized egg hatches into a free-swimming larva. The larva consumes plankton and tiny crustaceans, and after a few weeks morphs into a juvenile fish. The juvenile fish has a flattened body, and the swim bladder which gave it buoyancy is lost. One eye moves to the other side of its head, which forms the upper side of the fish. *P. tropicus* has a life span of 3-10 years.

REFERENCES

- ADW (2016). *Paralichthys tropicus* (Tropical flounder). Animal Diversity Web. http://animaldiversity.org/accounts/Paralichthys_tropicus/classification/, downloaded 23 October 2016
- Cervigon, F. (1992). Sheets FAO species identification for fishery purposes. FAO, Rome: Field guide commercial species of marine and brackish water of the northern coast of South America.
- IUCN (2015). *Paralichthys tropicus* (Tropical Flounder). IUCN Red List. <http://www.iucnredlist.org/details/16778116/0>, downloaded 23 October 2016.
- Munroe, T. (2002). The living marine resources of the Western Central Atlantic, volume 3: Bony fishes part 2 (opistognathidae to Molidae), sea turtles and marine mammals. Rome: FAO Species Identification Guide For Fishery Purposes and American Society of Ichthyologists and Herpetologists Special publication no. 5.
- Rosas, J. (1999). The potential use of the Caribbean flounder *Paralichthys tropicus* as an aquaculture species. Aquaculture.
- Uyeno, T. (1983). Fishes trawled of Suriname and French Guiana. Tokyo Japan: Japan Marine Fishery Resource Research Center.

Author: T'keyah Dennis

Posted online: 2016

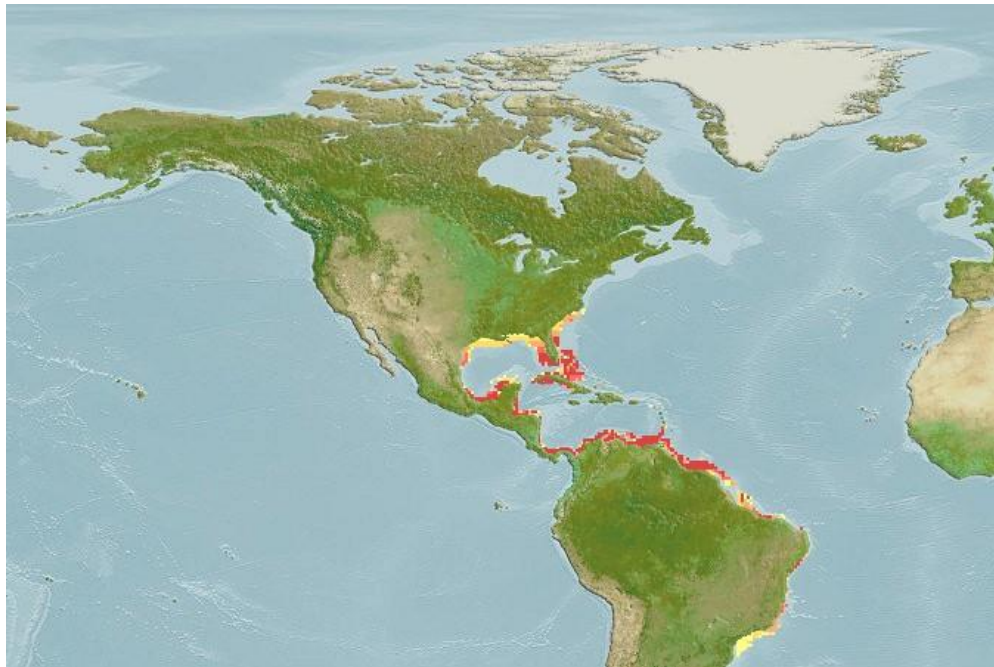


Fig. 2. Tropical flounder geographic distribution.

[http://www.aquamaps.org/receive.php?type_of_map=regular, downloaded 31 October 2016]



Fig. 3. Tropical flounder camouflaging into its surroundings.

[<http://www.ryanphotographic.com/bothidae.htm>, downloaded 19 November 2016]

For educational use only - copyright of images remains with original source