Gobiesox punctulatus (Stippled clingfish)

Family: Gobiesocidae (Clingfish) Order: Gobiesociformes (Clingfish) Class: Actinopterygii (Ray-finned Fish)



Fig. 1. Stippled clingfish, Gobiesox punctulatus.

[http://www.reeflex.net/tiere/4220 Gobiesox punctulatus.htm, downloaded 10 October 2016]

TRAITS. A species of fish which has a suction disc which enables it to cling to surfaces such as rocks (Fig. 1). Head flattened and broad, with poorly developed sensory papillae (small projections); front nostril with a flap; top lip broad, wider to the front than the sides; top jaw with patch of conical teeth; lower jaw with incisor teeth to the front, canines along the side; one dorsal fin, at the rear; anal fin under the dorsal fin; suction disc large, with papillae at the front, centre and rear, formed from the pelvic fin and part of the pectoral fin, disc is covered with tiny projections; anus about halfway between the sucker disc and the anal fin; no scales; numerous small dark spots; sometimes pale bars along the body; length about 8cm. Colour light-brown to pale-grey (Snyder and Burgess, 2016).

DISTRIBUTION. Widely distributed along coastlines of the western Atlantic (Fig. 2). Locations in which this species is found include various Caribbean islands such as: Barbados, Grenada, Jamaica, St Kitts and Nevis, St Lucia, St Vincent and the Grenadines, Trinidad and Tobago and Venezuela (IUCN, 2015).

HABITAT AND ECOLOGY. Found in clear shallow water in tropical marine areas (Fig. 3). They reside in water of depth ranging from 0.3-10m and temperature ranging 24-28°C. This species is most common on limestone rocks and ledges in clear shallow water. This specie lives

in shoreline habitats with large number of boulders. They also sometimes inhabit coral that is covered by algae (IUCN, 2015). This species is used in the aquarium trade (IUCN, 2015); in the aquarium environment these clingfish similarly use rocks to cling to.

REPRODUCTION. When this species spawns a large number of eggs are laid, these eggs are clear and the clingfish embryo can be seen developing inside it. The eggs develop into larvae and then the larvae develop into the clingfish. The peak spawning time for these clingfish can be observed during April and May (Dovel, 1963).

BEHAVIOUR. This species spends its time clinging to surfaces and rocks and ledges (Ray and Robins, 2016) while they wag their white-edged paddled-shaped tails. Clingfish are carnivorous as they feed on small crustaceans such as shrimps, worms, and small fish (Snyder and Burgess, 2016). These clingfish are semi-aggressive in captivity and generally reside peacefully in the aquarium environment (Fig. 4). They live peacefully with various aquatic organisms such as filefish and small gobies, but they can be territorial with other clingfish. When it is time to feed they move from their usual position of clinging to rocky surfaces to compete amongst themselves for food (Snyder and Burgess, 2016).

APPLIED BIOLOGY. This clingfish is listed as of Least Concern on the IUCN Red List and therefore this specie is not endangered (IUCN, 2015). Since this is a shallow water species it may be impacted by coastal development and pollution (IUCN, 2015). However, since there is no current evidence that this constitutes a major threat for this species and accordingly it is listed as least concern in the IUCN Red List.

REFERENCES

Dovel, W. L. (1963). Larval development of clingfish, *Gobiesox strumosus*. Chesapeake Science. **4:** 161-166. IUCN (2015). Stippled clingfish. IUCN Red List. http://www.iucnredlist.org/details/full/186003, downloaded 20 October 2016.

Ray, C. and Robins, R. (2016). A Field Guide to Atlantic Coast Fishes: North America. Houghton Mifflin Harcourt. Reeflex. (2015). *Gobiesox punctulatus*. http://www.reeflex.net/tiere/4220 Gobiesox punctulatus.htm, downloaded 10 October 2016.

Synder and Burgess (2016). Marine Fishes of Florida. JHU Press.

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Fig. 2. Stippled clingfish geographic distribution.

[http://dx.doi.org/10.2305/IUCN.UK.2015-2.RLTS.T186003A1802373.en,downloaded, downloaded 20 October 2016]



Fig. 3. Stippled clingfish in its natural environment of shallow clear water. [http://www.reeflex.net/img/16882_p8eB8JRXF1.jpg, downloaded 20 October 2016]



Fig. 4. Stippled clingfish residing peacefully in an aquarium.

 $[\underline{http://reefbuilders.com/wp-content/blogs.dir/1/files/captive-bred-clingfish/sustainable-aquatics-stippled-clingfish-2.jpg, \\ downloaded~20~October~2016]$

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