

Biodiversity Record: New Singapore record of the bumpnose trevally, *Atropus hedlandensis*

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Subjects: Bumpnose trevally, *Atropus hedlandensis* (Teleostei: Carangiformes: Carangidae).

Subjects identified by: Jiayuan Lin.

Location, date and time: Singapore Strait, Singapore Strait, East Coast Park, White Jetty and Bedok Jetty; 14 February 2023 and 9 July 2023; afternoon.

Habitat: Marine. Shallow coastal sea of around 2m depth with sandy substrate.

Observer: Jiayuan Lin.

Observations: One example (Fig. 1) of 9.1 cm standard length (tip of snout to base of caudal fin) and 13 cm total length (tip of snout to tip of caudal fin) was caught with hook and line, on a soft plastic squid-mimic lure, at White Jetty on 14 February 2023 at 1557 hrs. It has been donated to the Lee Kong Chian Natural History Museum at the National University of Singapore, where it is preserved in the Zoological Reference Collection under the catalogue number ZRC 64489.



Fig. 1. Lateral view of *Atropus hedlandensis* (ZRC 64489) of 9.1 cm standard length, freshly landed and alive (Photograph by: Jiayuan Lin).

A second and larger specimen (Fig. 2) of 12 cm standard length was landed at Bedok Jetty by hook-and line baited with shrimp (*Litopenaeus vannamei*) on 9 July 2023 at 1617 hrs. Also donated to the museum, it bears the catalogue number ZRC 64521.

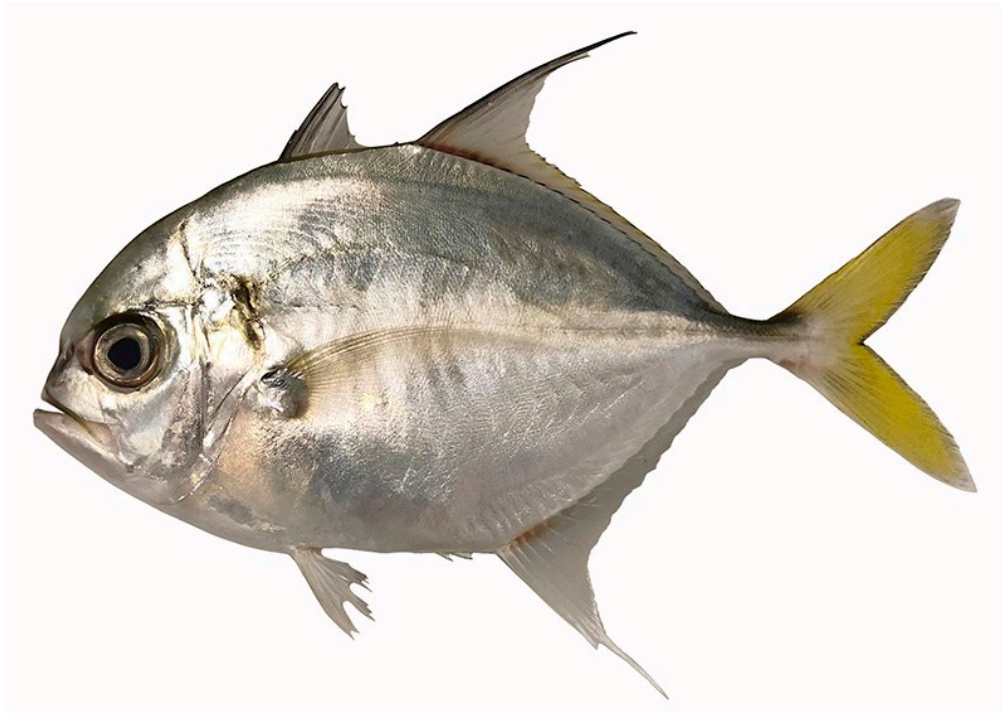


Fig. 2. Lateral view of freshly dead *Atropus hedlandensis* of 12 cm standard length (ZRC 64521) (Photograph by: Kelvin K. P. Lim).

Remarks: This is apparently the first record of *Atropus hedlandensis* in Singapore waters (see Fowler, 1938; Tweedie, 1940; Ng et al., 2015). Its occurrence there is not surprising as it ranges widely across the Indo-Pacific (Smith-Vaniz, 1999). *Atropus hedlandensis* is morphologically similar to and may have previously been misidentified as the longfin trevally, *Atropus armatus*, which is known to occur in Singapore (LeMare & Tham, 1954, as *Caranx armatus*) and is common there (personal observations). *Atropus hedlandensis* may be distinguished from *Atropus armatus* by having 20 to 27 total gillrakers on the first gill arch, while *Atropus armatus* has 31–37 (Smith-Vaniz, 1999, as *Carangoides hedlandensis* and *Carangoides armatus*). In adults, the presence of a bump on the head profile in the interorbital region also distinguishes *Atropus hedlandensis* from other trevally species (Lin & Shao, 1999, as *Carangoides hedlandensis*; Smith-Vaniz, 1999, as *Carangoides hedlandensis*). Additionally, it is known that the caudal fin of *Atropus hedlandensis* is yellowish (Lim et al, 2010, as *Carangoides hedlandensis*; Smith-Vaniz, 1986, as *Carangoides hedlandensis*). The author has noted that in Singapore waters, this yellow tail color is consistently observable in juvenile *Atropus hedlandensis* below 15cm SL while *Atropus armatus* have dusky greyish to translucent caudal fins. This may possibly serve as a more easily observable difference between juveniles of the two species in the field.

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