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Sharks

Spotted Gully Shark *Triakis megalopterus* at Robben Island, Table Bay, South Africa

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Abstract

We report a sighting of a Spotted Gully Shark *Triakis megalopterus* at Robben Island, 7 km from the nearest mainland, in Table Bay, South Africa. The sighting was made on 18 February 2023 within an hour of high tide.

Introduction

Robben Island (33°48'S, 18°22'E) is located in Table Bay, c. 11 km north of Cape Town and 7 km west of the nearest mainland at Bloubergstrand (de Villiers 1971, Crawford & Dyer 2000). The island

has c 10 km of shoreline. Although for the most part it is rocky, there is a 200 m-long sandy beach on the east coast just south of Murrays Bay Harbour.

The spotted gully shark Triakis megalopterus is a medium-sized demersal houndshark belonging to the Triakidae family, and can reach a total length of c. 2 m (Ebert et al. 2021). It is endemic to southern Africa, and can be found from southern Angola to KwaZulu-Natal, South Africa, in the southeast Atlantic and western Indian Oceans (Ebert et al. 2021). It inhabits shallow sandy areas and rocky crevices on the continental shelf to a depth of 50 m, but usually found in waters less than 10m deep. Due to its late age-at-maturity, approximately 14 years old, and a long gestation period of 20 months, the species is vulnerable to overfishing (Booth et al. 2011); however, although this species is not targeted by commercial fisheries it is often taken as bycatch due to misidentification with other Triakidae species (e.g. common smoothhound *Mustelus mustelus* and soupfin shark *Galeorhinus* galeus). It is targeted by recreational anglers (da Silva et al. 2015). It is classified as a Least Concern species by the IUCN Red List (Pollom et al. 2020).

Observation

We observed a spotted gully shark, c 1.5 m in length, in the surf on the sandy beach section of the sandy beach on Robben Island between 14h57 and 15h35 on 18 February 2023. See the video at <u>https://www.youtube.com/watch?v=EJehAkO_Nnw;</u> Figure 1 is a link to three frames within the video. The species was identified based on the colour, the shape of the caudal fin, typical of the triakidae family, and the shape of the dorsal fin, bigger on spotted gully shark than on other species of the same family (e.g. Common smoothhound and Soupfin shark).

Hightide in Table Bay had been at 14h15 on the day, the weather was sunny with a south-south-west wind of 35 km/h with an air temperature 26°C measured at the Robben Island lighthouse. The water temperature of 13.6°C.

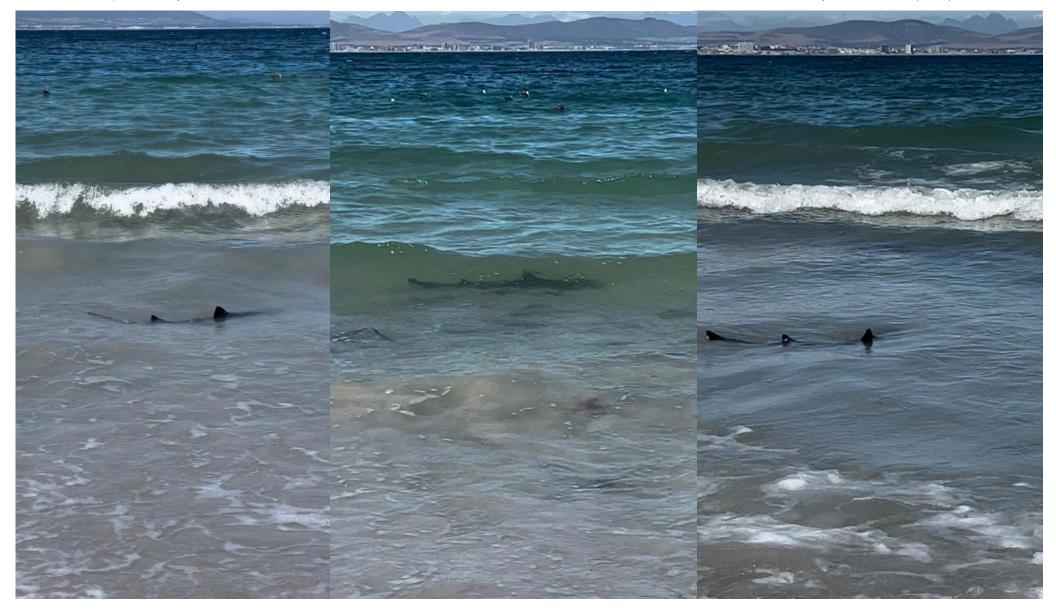


Figure 1: Frames from the video at https://www.youtube.com/watch?v=EJehAkO_Nnw, which show the key diagnostic features of the spotted gulley shark. The video was filmed from the sandy beach on Robben Island, Table Bay, on 18 February 2023.

Discussion

The observation was made while we were monitoring the breeding season of the African Ovstercatcher; this fieldwork started in 2001 (Quintana et al. 2021). Since then, several hundred round island circuits have been made, including walking along this section of beach. Although this species is known to inhabit the west coast of South Africa and numerous individuals have been caught and tagged as part of the Oceanographic Research Institute's Cooperative Fish Tagging Project (ORI-CFTP, G. Jordaan pers. comm.), this is the first recorded observation of this species of shark at Robben Island. Spotted gully sharks are often observed on sand during the day, in shallow waters close to the shore, especially by surfers (E. Cottrant pers. obs.), while it is known that this species actively feed at night. This behavior might be due to predator avoidance as if daylight time is a resting period for the animal, it is safer to stay in shallow areas around the shore where there is less chance of a predator occurring. Moreover, the shark was observed moments after high tide which can be a factor as the tide is going to push animals closer to shore. While Robben Island is located 7 km away from the closest shoreline, it is not surprising that spotted gully sharks can be observed in the area as Table Bay reaches a maximum depth of 25 m, therefore, the area fall within the depth range of the species. This is the first observation in the area but acoustically tagged individuals were previously detected on receivers around Robben Island (Cottrant et al. in review) suggesting that the island offers a suitable habitat for this species.

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