

Protected guitarfish released by fishermen of Uttara Kannada District, Karnataka

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The Widenose guitarfish (*Glaucostegus obtusus*) is a small elasmobranch species that typically inhabits shallow coastal waters and estuaries. These fish are frequently caught as bycatch in various fishing practices, including gillnets, single-day trawlers, hook and line, and shore seine fisheries. The largest recorded specimen of this species, measuring 114 cm, was found off the coast of Goa. In March 2024, during routine visits to fish landing centers, researchers from the ICAR-Central Marine Fisheries Research Institute (CMFRI) observed two instances of incidental entanglement of the Widenose guitarfish, a species protected under Schedule I of the Indian Wildlife (Protection) Act. These incidents highlight the ongoing challenges in conserving this vulnerable species and underscore the importance of raising awareness among local fishing communities. The first incident was recorded at the Gokarna fish landing center, where Dr. Mahesh V., scientist from the Karwar Regional

Station of ICAR-CMFRI, encountered a live mature male Widenose guitarfish measuring 65 cm caught in a gillnet. The fishermen, unaware of the species' protected status, were informed by Dr. Mahesh about the legal protections in place and the importance of releasing such specimens back into the sea. This intervention was crucial, as it led to the immediate release of the guitarfish and prompted the publication of an awareness article in the *Karavali Munjavu* newspaper. A week later, another accidental entanglement of a Widenose guitarfish occurred at Aligadda beach, Karwar. In this case, the fishermen, having been recently informed through the newspaper article, promptly identified the species and ensured its safe release. The specimen, a mature female measuring 74 cm, was reported to ICAR-CMFRI by the fishermen, who were motivated by their newfound awareness. Dr. Mahesh used this opportunity to reinforce the protection status of the species among other fishermen at the



Widenose guitarfish (*Glaucostegus obtusus*) entangled in gillnet



Release of Widenose guitarfish (*Glaucostegus obtusus*) by fisherman

beach, encouraging them to release any accidentally caught guitarfish in the future. The conservation of the Widenose guitarfish is part of a broader effort by ICAR-CMFRI to protect elasmobranchs along the Indian coastline. Previously, ten elasmobranch species, including four sharks (Gangetic Shark, Pondicherry Shark, Speartooth Shark, and Whale Shark), two rays (Ganges Stingray and Porcupine Whipray), three sawfishes (Green Sawfish, Largetooth Sawfish, and Knifetooth Sawfish), and one guitarfish (Giant Guitarfish), were listed under Schedule I of the Wildlife Protection Act of 1972. To enhance conservation efforts, ICAR-CMFRI has been actively creating awareness among coastal communities through a dedicated project titled "Developing management plans for sustainable exploitation and conservation of elasmobranchs in India." This initiative involves a diverse group of stakeholders, including fishermen engaged in mechanized and motorized fishing operations, fish trader associations, officials from the Department of Forests and Fisheries, coastal police, the Indian Navy, local government leaders, as well as professors and students from various educational institutions. The success of these awareness programs is evident in the rescue and release of numerous Whale sharks, an iconic elasmobranch species, that were accidentally entangled in fishing gear. The collective effort of local communities, informed and empowered by ICAR-CMFRI's initiatives, has been crucial in the conservation of these species. In response to the declining populations of

several elasmobranch species, an amendment to the Wildlife Protection Act in 2022 added nine more elasmobranchs to Schedule I. The newly listed species include Bottlenose wedgefish, Smoothnose wedgefish, Bowmouth guitarfish, Clubnose guitarfish, Widenose guitarfish, Giant manta ray, Reef manta ray, Giant freshwater whipray, and Dwarf sawfish. ICAR-CMFRI scientists emphasize the importance of continuous collaboration with the Fisheries Department and Forest Department to broaden awareness programs, particularly concerning the newly listed species. Fishermen are urged to be vigilant about the incidental catch of these protected species and to release them back into the sea if they are alive. In cases where the fish is dead, it is essential to report the incident to the nearest Forest or State Fisheries Department. Trading of these specimens is strictly prohibited, even if the fish dies after being landed, as it would contravene conservation laws and undermine efforts to protect these endangered species. The conservation of the Widenose guitarfish and other elasmobranchs is critical to preserving marine biodiversity. Through research, education, and active engagement with local communities, ICAR-CMFRI is leading the way in promoting sustainable and responsible marine resource management. The positive response from local fishermen in recent incidents underscores the importance of awareness and the potential for collective action in safeguarding our marine ecosystems.