

Peacock Skate, *Pavoraja nitida*

Report Card assessment	Sustainable		
IUCN Red List Australian Assessment	Least Concern (Endemic to Australia)	IUCN Red List Global Assessment	Least Concern
Global Assessors	Kyne, P.M. & Treloar, M.A.		
Australian Assessors	Kyne, P.M., Heupel, M.R., White, W.T., Simpfendorfer, C.A. (Shark Action Plan) & Rigby, C.L.		
Report Card Remarks	Most abundant skate across its range, low risk from fisheries, and refuge in lightly fished areas.		

Summary

The Peacock Skate is a small continental shelf and upper slope species endemic to temperate waters in a wide range of southern Australia; New South Wales to the Great Australian Bight. It is the most abundant skate across its range. The species is a common incidental caught in the Commonwealth Southern and Eastern Scalefish Fishery and has possibly undergone population decline due to the historically high levels of fishing pressure in the SESSF, however, fishing pressure has declined significantly, and it is now assessed as at low risk from the fishery. It has refuge in lightly fished areas and in Bass Strait and its vulnerability was assessed as low for both fishing and climate change. Therefore, the Peacock Skate is assessed as Least Concern (IUCN) (Kyne et al. 2021) and Sustainable (SAFS).



Distribution

The Peacock Skate is endemic to Australia (Last et al. 2016). It has a wide range in mainly temperate waters of southern Australia where it occurs from Clarence River (New South Wales) to Eyre in the Great Australian Bight (Western Australia) (Last and Stevens 2009, Kyne et al. 2021).

Stock structure and status

There is currently no information on population size or structure for the species. However, it is the most abundant skate across its range and catches in the Southern and Eastern Scalefish Fishery were stable between 2000–2006 (Walker and Gason 2007, Last and Stevens 2009).

Fisheries

The Peacock Skate is a common incidental catch of trawl fisheries. It is taken in the Commonwealth Southern and Eastern Scalefish Fishery (SESSF) with an estimated average annual catch of 70 tonnes

between 2000–2006; over that period there were fluctuations in catch-per-unit effort but no overall trend (Walker and Gason 2007). It is taken in the Commonwealth Trawl (CTS), Great Australian Bight Trawl (GABT), and Danish Seine (DS) Sectors and all catch was released as it has no commercial value, though post-release mortality is unknown (Walker and Gason 2007, Kyne et al. 2021). In 2021, a very minimal catch of 10 kg was observed in a survey of the GABT (Knuckey et al. 2021). There was a decline of 73–88% in mean catch rates of deepwater skates in the CTS sector over 20 years from 1977–1997, though this species was not recorded, possibly as it is more of a shelf species (Graham et al. 2001, Kyne et al. 2021). The species has possibly gone undergone population decline due to the historically high levels of fishing pressure in the CTS, however, fishing pressure has declined significantly, and it is now assessed as at low risk from the CTS and DS Sectors and was not noted in the risk assessment of the GABT (Patterson et al. 2022, Sporcic et al. 2021a,b,c), likely as catches were negligible. It has also been noted as a catch of the New South Wales Ocean Trawl Fishery, and although there is no species-specific catch data, catches are likely minimal as softnose skates (Arhynchobatidae) and skates (Rajidae) undifferentiated and combined, were noted in only 4% of observed shots over two years (2017/18–2018/19) (DPI 2004, Johnson and Barnes 2023). It has refuge in lightly fished areas and in Bass Strait where there is no trawling (Kyne et al. 2021). The species vulnerability to fishing and climate change was assessed as low (Walker et al. 2021).

Habitat and biology

The Peacock Skate is demersal on the continental shelf and upper slope at depths of 30–450 m (Last et al. 2016). Maximum size is at least 37 cm total length (TL) with both sexes mature at approximately 30–33 cm TL (Last et al. 2016). Little else is known of its biology.

Longevity and maximum size	Longevity: unknown Max size: at least 37 cm TL
Age and/or size at maturity (50%)	Both sexes: ~30–33 cm TL

CAAB Code: 37 031009

Link to IUCN Page: <https://www.iucnredlist.org/species/161370/68640573>

Link to page at Shark References: <https://shark-references.com/species/view/Pavoraja-nitida>

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