White skate (*Rostroraja alba*) in subareas 1–10, 12, and 14 (the Northeast Atlantic and adjacent waters)

ICES advice on fishing opportunities

ICES advises that when the precautionary approach is applied, there should be zero catches in each of the years 2020–2023.

Stock development over time

This species has disappeared from most areas of former habitat in the Northeast Atlantic. There are very few recent, authenticated records of white skate in this area; these isolated records are from the English Channel, western Irish waters, and Portuguese waters. According to historical literature it appears to have occurred more frequently in previous decades. ICES therefore considers this stock to be depleted.

Stock and exploitation status

ICES cannot assess the stock and exploitation status relative to maximum sustainable yield (MSY) and precautionary (PA) reference points, because the reference points are undefined.

Table 1   White skate in the Northeast Atlantic. State of the stock and fishery relative to reference points.

		Fishing pressure					Stock size		
		2016	2017	2018			2016	2017	2018
Maximum sustainable yield	F_{MSY}	?	?	? Unknown		MSY $B_{trigger}$	?	?	? Unknown
Precautionary approach	F_{pa}, F_{lim}	?	?	? Unknown		B_{pa}, B_{lim}	?	?	? Unknown
Management plan	F_{MGT}	—	—	— Not applicable		B_{MGT}	—	—	— Not applicable
Qualitative evaluation	-	?	?	? Unknown		-	✖	✖	✖ Depleted

Catch scenarios

The ICES framework for category 6 stocks was applied (ICES, 2012). For stocks without information on abundance or exploitation, ICES considers that a precautionary reduction of catches should be implemented where there is no ancillary information clearly indicating that the current level of exploitation is appropriate for the stock.

Discarding is known to take place, but ICES cannot quantify the corresponding catch. Discard survival, which is likely to occur, has also not been estimated.

Table 2   White skate in the Northeast Atlantic.The basis for the catch scenario.

Recent advised catch for 2017–2019 (issued in 2016)		0 tonnes
Discard rate		Unknown
Precautionary buffer	Not applied	-
Landings advice		0 tonnes
% Advice change *		0%

* Advice value 2020 relative to advice value 2017–2019.

The advice for 2020–2023 has not changed from the previous advice.

Basis of the advice

Table 3   White skate in the Northeast Atlantic. The basis of the advice.

Advice basis	Precautionary approach.
Management plan	ICES is not aware of any agreed precautionary management plan for white skate in this area.

Quality of the assessment

There is no assessment of this stock.

Catches of white skate are now rare, both in surveys and commercially. Reported landings of white skate in official data from outside the known biogeographical range were reallocated to other stocks (ICES, 2016). ICES estimates include data from within the biogeographical range of white skate, but are still considered to be overestimated due to reporting errors.

Issues relevant for the advice

The perception of the stock is based on the lack of recent records of this species in comparison with historical accounts, which documented a more widespread occurrence and localized abundance in parts of the Northeast Atlantic. Historical information indicates that white skate has formerly been targeted in fisheries in the English Channel and around Brittany (Ellis *et al.*, 2010), but present records show only a few isolated instances in scientific surveys.

White skate has been listed as a prohibited species since 2010 (EU, 2019) for EU waters in ICES subareas 6–10. This is a long-term conservation strategy aimed at very depleted and vulnerable species. ICES supports this listing, having reviewed it in 2010.

Whilst listed in some official landings data, these include records from outside the biogeographical range and are assumed to reflect coding errors or misidentifications.

Given the depleted nature of the stock, many fishers and sea-going staff are unfamiliar with this species. Improved identification and educational material should be developed and circulated to fishers, in order to aid in data collection and highlight the need for releasing prohibited species.

Reference points

No reference points are defined for this stock.

Basis of the assessment

Table 4   White skate in the Northeast Atlantic. The basis of the assessment.

ICES stock data category	6 (ICES, 2018).
Assessment type	No assessment (ICES, 2019).
Input data	None.
Discards and bycatch	Discards are known to take place but cannot be quantified.
Indicators	None.
Other information	Historical accounts, life-history information, and contemporary/historical survey catches.
Working group	Working Group on Elasmobranch Fishes (WGEF).

Information from stakeholders

There is no additional available information.

History of the advice, catch, and management

Table 5   White skate in the Northeast Atlantic. History of ICES advice and ICES estimates of landings. Weights in tonnes. As a prohibited species in EU waters of ICES subareas 6–10, there is no TAC.

Year	ICES advice	Landings corresp. to advice	Reported landings *
2009	ICES (2008) advised that "White skate has a localized and patchy distribution, and is extirpated from most parts of the Celtic Seas ecoregion. It should receive the highest possible protection. Any incidental bycatch should not be landed, but returned, to the sea, as they are likely to have a high survival rate"	0	9
2010	-	0	5
2011	Retain on the prohibited species list	0	10
2012	Biennial advice	0	2
2013	Retains on the prohibited species list	0	3
2014	Biennial advice	0	4
2015	No catches of this species. Measures should be taken to minimize bycatch to the lowest level. Retain on the prohibited species list	0	8
2016	Biennial advice	0	4
2017	Zero catch, retain on the prohibited species list	0	4
2018	Same advice as for 2017	0	8
2019	Same advice as for 2017	0	
2020	Precautionary approach	0	
2021	Same advice as for 2020	0	
2022	Same advice as for 2020	0	
2023	Same advice as for 2020	0	

* In WKSHARK2 (ICES, 2016) elasmobranch landings were revised, and the many reported landings of white skate in official data that were from outside the known biogeographical range were reallocated to other stocks. The data presented here were within the biogeographical range of white skate, but are still considered to be overestimated due to reporting errors.

History of catch and landings

The distribution of this stock does not extend into the NEAFC regulatory area.

Table 6   White skate in the Northeast Atlantic. Catch distribution by fleet in 2018 as estimated by ICES.

Total catch (2018)	Commercial landings	Discards
Unknown	8 tonnes	Discarding is known to take place but cannot be quantified.

Table 7   White skate in the Northeast Atlantic. Reported landings by country. All weights are in tonnes.

Country	France	Ireland	UK	Total *
2007	1.1			1.1
2008	0.2		0.9	1.1
2009	9.1		0.1	9.2
2010	4.7			4.7
2011	10.0			10.0
2012	2.0		0.2	2.2
2013	2.7			2.7
2014	4.0	0.3	0.1	4.4
2015	0.7	0.0	0.1	0.8
2016	4.0		0.1	4.1
2017	4.3	0.1		4.4
2018	7.1	0.4		7.5

* In WKSHARK2 (ICES, 2016) elasmobranch landings were revised, and the many reported landings of white skate in official data that were from outside the known biogeographical range were reallocated to other stocks. The data presented here were within the biogeographical range of white skate, but are still considered to be overestimated due to reporting errors.

Summary of the assessment

There is no assessment for this stock.

Sources and references

Ellis, J. R., Silva, J. F., McCully, S. R., Evans, M., and Catchpole, T. 2010. UK fisheries for skates (Rajidae): History and development of the fishery, recent management actions and survivorship of discards. ICES CM 2010/E:10. 38 pp. www.ices.dk/sites/pub/CM%20Doccuments/CM-2010/E/E1010.pdf.

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