



[CHINA] National Report to the Scientific Committee of the Indian Ocean Tuna Commission, 2024

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INFORMATION ON FISHERIES, RESEARCH AND STATISTICS

In accordance with IOTC Resolution 15/02 (and other data related CMMs as noted below), final scientific data for the previous year were provided to the IOTC Secretariat by 30 June of the current year, for all fleets other than longline [e.g., for a National Report submitted to the IOTC Secretariat in 2024, final data for the 2023 calendar year must be provided to the Secretariat by 30 June 2024)	Not applicable
In accordance with IOTC Resolution 15/02, provisional longline data for the previous year was	YES
provided to the IOTC Secretariat by 30 June of the current year [e.g., for a National Report submitted to the IOTC Secretariat in 2024, preliminary data for the 2023 calendar year were provided to the IOTC Secretariat by 30 June 2024).	30/06/2023
REMINDER: Final longline data for the previous	
the current year [e.g., for a National Report submitted to the IOTC Secretariat by 30 Dec of submitted to the IOTC Secretariat in 2024, final data for the 2023 calendar year must be provided to the Secretariat by 30 December 2024).	
If no, please indicate the reason(s) and intended ac	tions:





Executive Summary

The Longline (LL) is the only fishing gear used by Chinese fleets to catch tuna and tuna-like species in the Indian Ocean Tuna Commission (IOTC) Area of Competence. In 2023, there were 74 Chinese LL fleets operating in this area, a reduction of four LLs compared to 2022. The tropical tuna catch (Bigeye and Yellowfin tuna) of Chinese LL fleets in 2023 was at 10,499MT, which was 3,008 MT higher than that in 2022 (7,491MT). The temperate tuna catch (Albacore) of Chinese LL fleets in 2023 was 3,859 MT, which was 2,071MT lower than that in 2022 (5,930MT). Both the logbook and observer programs are being implemented for the Chinese LL fleets. In 2023, five scientific observers were deployed on board LL fleets to collect data for both target and bycatch species as required.

1. BACKGROUND/GENERAL FISHERY INFORMATION

The LL is the only fishing gear for the China mainland fleet in the IOTC Area of Competence since 1995. One hundred-twenty LL fishing vessels were recorded at the peak time in 1998, which mainly consisted of small non-professional fishing vessels reconstructed from trawlers or gill-netters originally operated along China coastal waters. After 1998 the number of fishing vessels began to reduce due to poor management, low economic performance, and the shift of fishing grounds to other oceans. The total number of tuna fishing vessels registered with the IOTC Secretariat was reduced to 93 in 2001 and further cut down to 63 in 2002. The number of active fishing vessels was reduced from 46 in 2008 to 32 in 2009 due to piracy in the relevant areas. Before 2008 the LL fishing vessels usually operated in waters between 40 °E ~ 90°E and 20°N ~ 40°S. Since 2009, most of the fishing efforts shifted to the southern Indian Ocean due to piracy. Since 2012 some longliners began to return to the tropical western Indian Ocean. In 2023, there were 74 Chinese LL fleets operating in this area, a reduction of four fleets compared to 2022 (**Table 1**).

2. FLEET STRUCTURE

The Chinese LL vessels consisted of longliners targeting tropical tuna and longliners targeting albacore in the Indian Ocean. All Chinese LL vessels operating in the Indian Ocean have been the distant water category (250-700GT). The number of vessels is shown in **Table 1**.

Table 1: Number of vessels operating in the IOTC area of competence, by size class

Year	2019	2020	2021	2022	2023
Number of vessels	88	80	78	78	74

3. CATCH AND EFFORT (BY SPECIES AND FISHERY)

Annual catch by species and effort of the Chinese fleet by gear and primary species in the IOTC area of competence were shown in **Table 2**. The LL effort (hooks deployed) in 2023 was 20.2% less than that in 2022.

Table 2. Annual catch and effort by fishery and primary species in the IOTC area of competence

Table 2a	Albacore caught by longliners		
Year	Effort (1000 hooks)	Catch (MT)	
2019	26381	2489	
2020	27858	3763	
2021	34044	2360	
2022	38273	5930	
2023	30536	3859	





Table 2b	Bigeye tuna caught by longl	iners
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	1837
2020	27858	3587
2021	34044	4632
2022	38273	3815
2023	30536	6202
Table 2c	Yellowfin tuna caught by lor	ngliners
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	3213
2020	27858	3707
2021	34044	2702
2022	38273	3676
2023	30536	4297
Table 2d	Swordfish caught by longlin	ers
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	1005
2020	27858	1320
2021	34044	1383
2022	38273	1300
2023	30536	1795
Table 2e	Blue marlin caught by long	iners
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	336
2020	27858	295
2021	34044	279
2022	38273	192
2023	30536	362
Table 2f	Striped marlin caught by lon	gliners
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	76
2020	27858	54
2021	34044	88
2022	38273	50
2023	30536	209
Table 2g	Black marlin caught by long	liners
Year	Effort (1000 hooks)	Catch (MT)
2019	26381	9
2020	27858	35
2021	34044	72
2022	38273	78
2023	30536	44
2023		··-







Figure 1. Historical annual catch for the national fisheries by primary species, for the IOTC area of competence for the entire history of the fisheries



Figure 2a. Distribution of LL fishing effort (hooks) in 2023



Figure 2b. Distribution of LL average fishing effort (hooks) of 2019-2023







Figure 3a. Distribution of LL catch (kg) by species in 2023



BET 2019-2023







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Figure 3b. Distribution of LL catch by species in the IOTC area of competence (average of 2019-2023)

4. **RECREATIONAL FISHERY**

Not applicable. China is not operating recreational fishing in the Indian Ocean.

5. **ECOSYSTEM AND BYCATCH ISSUES**

China is making efforts to contribute to data collection for ecosystem and bycatch issues in the Indian Ocean, based on our observer and logbook programs. China pays close attention to the sustainable development of bycatch species related to the target species, emphasizes the assessment and monitoring of bycatch species resources, and encourages and participates in information collection and scientific research. It actively implements the FAO International Plan of Action for Conservation and Management of Sharks, and strictly abides by the conservation and management measures of IOTC on sharks and other species.

China has formulated and implemented the Action Plan of Sea Turtle Conservation (2019-2033), and has prepared an overall plan of sea turtle conservation and management at the national level. In 2024, China has issued relevant government documents and circulars to further strengthens conservation and management of marine mammals, requiring distant-water fishing vessels to strictly comply with the conservation and management measures of IOTC, and to make sure safe release, data collection, information reporting, scientific research, and supervision and management of marine mammals and other bycatch species are wellconducted. [The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements [Nongyu Yuanhan (2024) No.18].

Scientists and researchers from the Shanghai Ocean University (SHOU) take responsibility for China's tuna fishery and bycatch research in the Indian Ocean. The researchers are also working on using ecosystem models to evaluate the population dynamics and fisheries stock assessment and adaptive management based on nonstationary population dynamics. China has provided scientific data from its observer program, which was used for biological study and ecological risk analysis for sharks.

5.1 Sharks

China attaches great importance to the implementation of fishing vessels operating in the Indian Ocean. In the newly revised Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements [Nongyu Yuanhan (2024) No.18, which are corresponding regulations on the filling of logbooks and the protection of bycatch sharks. China does not approve distant water fishery projects that target sharks and requests all distant water fishery companies and fishing vessels to take effective measures to avoid or reduce shark bycatch as much as possible.





5.1.1. NPOA sharks

The separate National Plan of Action for Conservation and Management of Sharks has yet to be developed. However, as early as in February 2006, the State Council of China promulgated *Program of Action on the Conservation of Living Aquatic Resources of China (attached),* that treats sharks as protected species for management and conservation.

5.1.2. Blue shark

Blue shark catches are being routinely recorded based on the catch statistics program and observer program. All observers were required to collect catch, effort, size, and discard data of blue sharks and submitted the data to the IOTC secretariat. China is collecting blue shark biological and ecological information based on LL observer program. Species-specific catch and effort data are recorded in the logbook.

5.2 Seabirds

China attaches great importance to the implementation of fishing vessels operating in the Indian Ocean. In the Notification on Strengthening the Protection of Bycatch Species in Distant Water Fisheries, [Nongbanyu (2021) No.116] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements [Nongyu Yuanhan (2024) No.18], which are corresponding regulations on the protection of seabirds.

Chinese LL vessels operating in areas south of 25°S shall use at least two mitigation measures, including equipping tori lines, night setting and weighted branch lines. Fishing vessels operating in the area south of 25°S may use hook-shielding devices to replace the above three measures. Most of China's tuna LL fleets are operating in the tropical areas of IOTC waters and there are no interactions with seabirds. No seabird mortality in the tropical water was observed by LL observers onboard. The longliners operating in the water south of 25°S might interact with seabirds, as observed by observers in previous years. In 2023, no seabird was observed by five Chinese observers in the Indian Ocean area.

5.3 Marine Turtles

China attaches great importance to the implementation of fishing vessels operating in the Indian Ocean. In the Indian Ocean. In the Notification on Strengthening the Protection of Bycatch Species in Distant Water Fisheries [Nongbanyu (2021) No.116] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements [Nongyu Yuanhan (2024) No.18], which are corresponding regulations on the protection of sea turtles.

All LL fishing vessels shall equip de-hooks, and use circle hooks whenever possible, to minimum the harm to possible bycaught sea turtles. Vessels are encouraged to use finfish as bait, using squid as bait is not encouraged. When a turtle is caught incidentally, it shall take practicable measures to safely release the turtle in accordance with relevant requirements. The enterprise shall record incidents involving sea turtles during fishing operations and report such incidents timely to China Distant Water Fisheries Data Centre according to regulations. The information submitted includes the date of the incidental catch, location (latitude, longitude), type of gear, sea turtle species identification, size (curved or straight carapace length) and weight; capture and release condition (e.g., live/dead), bait type, hook type and size, target fishing depth, anatomical hooking location (e.g., flipper, mouth/jaw, swallowed, entangled), amount of gear left on the animal, and any associated photographs.

Since 2008, the China Overseas Fisheries Association has provided free turtle release tools, such as de-hooks, line cutters, and dip nets for all LL fishing vessels. Also, teach the officers and crews how to safely release sea turtles at sea. China's fishery authorities organize training to explain how to identify





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bycatch species and the relevant treatment requirements for reducing the mortality of bycatch species for fishery companies every year. All LL fishing vessels are equipped with turtle identification guides and map posters. Observers are responsible for recording species-specific interactions of marine turtles in LL fisheries, including the number of turtles caught, their fates, and release status. In 2023, one turtle was recorded by Chinese observers in the Indian Ocean area.

5.4 Other ecologically related species (e.g., cetaceans, mobulid rays, whale sharks)

China attaches great importance to the implementation of fishing vessels operating in the Indian Ocean. In the Notification on Strengthening the Protection of Bycatch Species in Distant Water Fisheries [Nongbanyu (2021) No.116] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements, [Nongyu Yuanhan (2024) No.18], which are corresponding regulations on the protection of marine mammals and whale sharks. It is prohibited from retaining on board of fishing vessels, transhipping and landing whale sharks. Vessels are required to report information about the incidental caught cetacean species (if known), the number of individuals, a brief description of the incidental catch (including how and why it was caught incidentally), the location of entanglement, measures taken to ensure safe release, and an assessment of the life condition of the released cetaceans (e.g. live release, but subsequent death). In 2023, one mobulid ray and eight cetaceans interaction were recorded by five Chinese observers in the Indian Ocean area.

6. NATIONAL DATA COLLECTION AND PROCESSING SYSTEMS

6.1. Logbook data collection and verification (including date commenced and status of implementation)

China started the pilot logbook data submission system in 2005 to obtain more detailed information about catch and fishing efforts as required by the IOTC. In 2006 the Bureau of Fisheries, Ministry of Agriculture and Rural Affairs, required all tuna fishing vessels to fill out logbooks and return them to the Bureau of Fisheries. The Bureau also announced that the implementation of the logbook program would be considered as one of the main factors for renewing fishing permission and licenses. With the support of the China Overseas Fisheries Association (COFA) and the cooperation of the tuna fishing companies, China's logbook system has been developed and implemented smoothly as a regular monitoring program. Since 2009, 100% logbook coverage for the LL fishery has been achieved. In 2023, 100% of the logbooks have been returned to the SHOU for data checking. All the information in those logbooks has been entered into the national tuna fishery database at SHOU and is being processed. Preliminary analyses showed that the data quality of logbooks has improved than before. As indicated above, records for bycatch species, low-value species, in particular, are developing higher quality. In July 2022, the Chinese government issued administrative measures for electronic reporting, and the full implementation of the system as from January 2024 for all China-approved fishing vessels on the high seas.

6.2. Observer scheme (including date commenced and status; number of observer, include percentage of coverage by fishery. Also, a description of the protocols supporting the observer programs and sampling schemes mentioned in paragraphs 3, 5, 7 and 8 of Res [22-04])

Under authorization by the Bureau of Fisheries, Ministry of Agriculture and Rural Affairs, the SHOU has been in charge of the national tuna observer program in the Pacific Ocean, Atlantic Ocean, and Indian Ocean. China began to implement the Scientific Observer program for tuna fishery in IOTC in 2002. So far, the program has been implemented successfully with the support of COFA. Observers have been dispatched each year since then, except the year 2011 due to the piracy activity (even though the observer had been selected and trained). In 2016, to further promote the normalization and institutionalization of the national distant water fisheries observers' program, the Ministry of Agriculture and Rural Affairs formulated the implementation rules for national distant-water fisheries observer management. Since then, the government of China has provided more funding to support





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the observer program and a series of reforms have taken place in recruitment, training, dispatching, and management for observers. The development of national observer database and recruitment of observers from the general public guarantee the numbers required to meet the coverage. There were five observer trips conducted in 2023, details were described in the observer trip report submitted to the Secretariat.

Table 3. Annual observer coverage by LL hooks from 2019 to 20)23
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Year	Hooks deployed	Number of observers	Hooks observed	Coverage
2019	26,380,951	4	1,814,426	6.88%
2020	27,860,364	3	1,420,779	5.09%
2021	34,043,659	4	1,702,418	5.00%
2022	38,273,218	5	2,013,450	5.26%
2023	30,536,496	5	1,789,179	5.86%



Figure 4. Map showing the spatial distribution of observer coverage

6.3. Port sampling programme

China set up a port sampling program in early 2012. The program was designed for vessels that return and unload catch in domestic ports in China. Size and species composition are the main information to be collected from the program. The challenge is the lack of detailed capture information (e.g., catch date and position) for the pooled catch unloaded in port. In 2023, 16 vessels were in the port sampling program (Table 4), and about 376 individuals were measured from port sampling (Table 5).

Table 4. Number of vessel trips or vessels active monitored, by species and fishery

Species	Number Vessels (observed)	Fishing gear
Albacore	7	Deep-frozen LL
Bigeye tuna	6	Deep-frozen LL
Yellowfin tuna	3	Deep-frozen LL

Table 5. Number of fish measured, by species and fishery

Species	Number of individuals measured	Fishing gear
Albacore	121	Deep-frozen LL
Bigeye tuna	183	Deep-frozen LL





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Yellowfin tuna	73	Deep-frozen LL
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6.4. Actions taken to monitor catches & manage fisheries for Striped Marlin, Black Marlin, Blue Marlin and Indo-pacific Sailfish

China has been monitoring marlin catch by logbooks daily on trial basis (and from 2024, on mandatory basis) and observer programs. As marlins are not the main target species of Chinese LL fisheries, the catch level is low especially in recent years (see Table 2d-2g).

6.5. Gillnet observer coverage and monitoring

Not applicable. China is not operating gillnet fishery in the Indian Ocean.

6.6 Sampling plans for mobulid rays

Not applicable. China is not operating subsistence and artisanal fisheries in the Indian Ocean.

7. NATIONAL RESEARCH PROGRAMS

China has launched several domestic research projects regarding tuna fisheries and the stock status of key species in the Indian Ocean, which are funded by different sources (e.g., Shanghai Municipal Education Commission, and Ministry of Agriculture and Rural Affairs). Scientists from SHOU are collecting and analysing biological and size composition data based on the national LL observer program. Some of the results have been presented to relevant IOTC working parties.

7.1. National research programs on blue shark

7.2. National research programs on Striped Marlin, Black Marlin, Blue Marlin and Indo-pacific Sailfish

- 7.3. National research programs on sharks
- 7.4. National research programs on oceanic whitetip sharks
- 7.5. National research programs on marine turtles
- 7.6. National research programs on thresher sharks

No information is prepared for 7.1-7.6.

Table 6. Summary table of national research programs, including dates.

No information is prepared for Table 6.

8. IMPLEMENTATION OF SCIENTIFIC COMMITTEE RECOMMENDATIONS AND RESOLUTIONS OF THE IOTC RELEVANT TO THE SC. [Mandatory]

Table 7. Scientific requirements contained in Resolutions of the Commission, adopted between 2012 and 2023.

Res. No.	Resolution	Scientific requirement	CPC progress
12/04	On the conservation of marine turtles	Paragraphs 3, 4, 6–10	China has complied with the requirements under the Resolution.





Res. No.	Resolution	Scientific requirement	CPC progress
			Paragraphs 3, 4. Interactions with marine turtles have been recorded and reported by observers. Detailed data of each observer trip has been submitted to the IOTC secretariat by 30 June.
			Paragraph 6. Fishermen are required to help recover marine turtles captured and released. De-hooking techniques and guidelines have been equipped onboard fishing vessels.
			Paragraph 7. Not applicable, no corresponding fishery.
			Paragraph 8. All Chinese LL vessels shall equip de-hooks, and use circle hooks whenever possible, to minimum the harm to possible bycaught sea turtles. Vessels are encouraged to use finfish as bait, using squid as bait is not encouraged. When a turtle is caught incidentally, it shall take practicable measures to safely release the turtle in accordance with relevant requirements. The enterprise shall record incidents involving sea turtles during fishing operations and report such incidents timely to China Distant Water Fisheries Data Center according to regulations. The information submitted includes the date of the incidental catch, location (latitude, longitude), type of gear, sea turtle species identification, size (curved or straight carapace length) and weight; capture and release condition (e.g., live/dead), bait type, hook type and size, target fishing depth, anatomical hooking location (e.g., flipper, mouth/jaw, swallowed, entangled), amount of gear left on the animal, and any associated photographs. Paragraph 9. Not applicable, no corresponding fishery.
12/09	On the conservation of thresher sharks	Paragraphs 4–8	China has complied with the requirements under the
	(<i>family dioplidae</i>) caught in association with fisheries in the IOTC area of competence		Paragraph 4. The incidental catch of thresher sharks was released directly onboard, and the fishermen are required to record and report incidental catches of thresher sharks in logbooks.
			Paragraph 5. Not applicable, no corresponding fishery.Paragraph 6. This information is required to be collected in the observer program.
			Paragraph 7. Specific projects or biological sampling for tissues (vertebrae, reproductive tracts, stomachs, etc.) has not been set up for thresher sharks.
			Paragraph 8. China has submitted partial catch data on sharks.
13/04	On the conservation of cetaceans	Paragraphs 7– 9	Not applicable. China is not operating purse seine fisheries in the Indian Ocean.
13/05	On the conservation of whale sharks (Rhincodon typus)	Paragraphs 7–9	Not applicable. China is not operating purse seine fisheries in the Indian Ocean.
13/06	On a scientific and management framework on the conservation of shark species caught in association with IOTC	Paragraph 5–6	China has complied with the requirements under the Resolution.
	managed fisheries		Paragraphs 5-6. China has complied with the requirements. Oceanic whitetip sharks were released onboard by fishermen. The fishermen made records of the incidental catch of oceanic whitetip sharks and the data have been submitted to IOTC.





Res. No.	Resolution	Scientific requirement	CPC progress
15/01	15/01 On the recording of catch and effort by fishing vessels in the IOTC area of	Paragraphs 1–10	China has complied with the requirements under the Resolution.
	competence		Paragraphs 1-10. China has complied with the requirements. Detailed data on the vessel, trip, gear configuration, operations, catch & effort have been submitted to the IOTC secretariat by 30 June (forms 1RC, 3CE, 4SF, 1D1, 1DR).
15/02	Mandatory statistical reporting requirements for IOTC Contracting Parties	Paragraphs 1–7	China has complied with the requirements under the Resolution.
	and Cooperating Non-Contracting Parties (CPCs)		Paragraphs 1-7. China has complied with the requirements. Detailed data on the total catch, catch, and effort data, bycatch, and size data have been submitted to the IOTC secretariat by 30 June (forms 1RC, 3CE, 4SF, 1D1, 1DR).
17/05	On the conservation of sharks caught in association with fisheries managed by IOTC	Paragraphs 6, 9, 11	China has complied with the requirements under the Resolution.
			Paragraphs 6. China has complied with the requirements. Detailed data on the catch, catch, and effort data, discards, and size frequency have been submitted to the IOTC secretariat by 30 June (forms 1RC, 3CE, 4SF, 1D1, 1DR).
			Paragraphs 9,11. China is making its effort in making a contribution to data collection for ecosystem and bycatch issues in the Indian Ocean, based on our observer and logbook programs. Scientists and analysts from the SHOU take major responsibility for China's tuna fishery and bycatch research in the Indian Ocean. China is also working on stock assessments using data-poor approaches for sharks. In 2024, SHOU researchers presented a study Demographic analysis for silky shark (<i>Carcharhinus falciformis</i>) on WPEB20 meeting. China has also provided scientific data from its observer program, which was used for biological study and ecological risk analysis for sharks. In accordance with various management resolutions, China is enhancing its implementation of management and conservation measures for important bycatch species (i.e., sharks, seabirds, and marine turtles), and is involved in bycatch mitigation initiatives from various programs.
18/02	On management measures for the conservation of blue shark caught in association with IOTC fisheries	Paragraphs 2-5	Paragraph 2. China has complied with the requirements. Blue shark catches are being routinely recorded based on the catch statistics program and observer program.
			Paragraph 3. All observers were required to collect catch, effort, size, and discard data of blue sharks and submitted the data to the IOTC secretariat by 30 June.
			Paragraphs 4-5. China is collecting blue shark biological and ecological information based on LL observer program. Species-specific catch and effort data are recorded in the logbook.
18/05	On management measures for the conservation of the Billfishes: Striped marlin, black marlin, blue marlin and Indo- Pacific sailfish	Paragraphs 7 – 11	Paragraphs 7-8. China has complied with the requirements. China has submitted the catch and effort data of Striped Marlin, Black Marlin, Blue Marlin, and Indopacific Sailfish to the IOTC secretariat by 30 June.
			Paragraphs 9-11. National plan of action for sustainable exploitation and conservation of Striped Marlin, Black Marlin, Blue Marlin and Indo-pacific Sailfish has yet to be developed. China manages such issues through regulations that cover the conservation of Striped Marlin, Black Marlin, Blue Marlin and Indo-pacific Sailfish. In the newly revised the Notification by General Office of Ministry of Agriculture and Rural Affairs on Completely Comply with International





Res. No.	Resolution	Scientific requirement	CPC progress
			Tuna Measures, [Nongbanyu (2024) No.3] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements, [Nongyu Yuanhan (2024) No.18], which are corresponding regulations on the protection of Striped Marlin, Black Marlin, Blue Marlin and Indo-pacific Sailfish.
18/07	On measures applicable in case of non- fulfilment of reporting obligations in the IOTC	Paragraphs 1, 4	China has complied with the requirements under the Resolution. Paragraphs 1, 4. China has included information in its
			Annual Reports on actions taken to implement its reporting obligations for all IOTC fisheries.
19/01	On an Interim Plan for Rebuilding the Indian Ocean Yellowfin Tuna Stock in the IOTC Area of Competence (<i>If not provided</i> <i>under Res 21/01 below</i>)	Paragraph 22	China has complied with the requirements under the Resolution.
			Paragraph 22, Not applicable. China is not operating gillnet fisheries in the Indian Ocean.
19/03	On the Conservation of Mobulid Rays Caught in Association with Fisheries in the	Paragraph 11	China has complied with the requirements under the Resolution.
	IOTC Area of Competence		Paragraph 11, In the Notification on Strengthening the Protection of Bycatch Species in Distant Water Fisheries, [Nongbanyu (2021) No.116] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements, [Nongyu Yuanhan (2024) No.18], which are corresponding regulations on the protection of marine mammals and whale sharks. It is prohibited from retaining on board of fishing vessels, transshipping and landing whale sharks. Vessels are required to report information about the incidental caught cetacean species (if known), the number of individuals, a brief description of the incidental catch (including how and why it was caught incidentally), the location of entanglement, measures taken to ensure safe release, and an assessment of the life condition of the released cetaceans (e.g. live release, but subsequent death). In 2023, one Mobulid ray was recorded by Chinese observers in the Indian Ocean area.
21/01	On an Interim Plan for Rebuilding the Indian Ocean Yellowfin Tuna Stock in the IOTC Area of Competence (<i>If not provided</i> <i>under Res 19/01 above</i>)	Paragraph 23	Paragraph 23, Not applicable. China is not operating gillnet fisheries in the Indian Ocean.
22/04	On a regional observer scheme	Paragraph 12	China has complied with the requirements under the Resolution. Paragraph 12, China provided 5 observers' data to the IOTC secretariat which detailed the number of fishing vessels and fishing effort sampled, as well as the coverage achieved by gear type by the provisions of this Resolution.
23/07	On reducing the incidental bycatch of seabirds in longline fisheries.	Paragraphs 3–7	China has complied with the requirements under the Resolution. Paragraphs 3-7. In the Notification on Strengthening the Protection of Bycatch Species in Distant Water Fisheries, [Nongbanyu (2021) No.116] and the Bureau of Fisheries of Ministry of Agriculture and Rural Affairs published The Notification on the Issuance of Indian Ocean Tuna Fisheries Compliance Elements, [Nongyu Yuanhan (2024)] No.18, which are corresponding regulations on the protection of seabirds. In 2023, no seabird was observed by five Chinese observers in the Indian Ocean area.





9. LITERATURE CITED

IOTC-2023-SC26-NR03. [China] National Report to the Scientific Committee of the Indian Ocean Tuna Commission. (Yanan Li, Shiyu Yang, Feng Wu, Jiangfeng Zhu)

IOTC-2024-WPB22-11. Introduction to the gonadal staging standards of Chinese scientific observers for billfish and estimation of maturity size. (Cheng Zhou, Jie Cao, Xuefang Wang, Feng Wu, Jiangfeng Zhu)

IOTC-2024-WPEB20-28. Demographic analysis for silky shark (*Carcharhinus falciformis*) in the Indian Ocean. (Jizhang Zhu, Zhe geng, Yanan Li, Jiangfeng Zhu, Xuefang Wang)

IOTC-2024-WPTT26-12. Preliminary stock assessment for Indian Ocean Yellowfin tuna using Bayesian surplus production model (JABBA). (Yanan Li, Shiyu Yang, Jiangfeng Zhu)

IOTC-2024-WPTT26-13. Preliminary stock assessment for yellowfin tuna in the Indian Ocean using age structured assessment program (ASAP). (Yang Wang, Zhe Geng, Jiangfeng Zhu)