# United Kingdom National Report to the Scientific Committee of the Indian Ocean Tuna Commission, 2019

#### Matt Elliott

#### **Marine Management Organisation**

### INFORMATION ON FISHERIES, RESEARCH AND STATISTICS

	<del>,</del>
In accordance with IOTC Resolution 15/02, final	Not applicable
scientific data for the previous year was 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 2018, final data for the 2017 calendar year must	
be provided to the Secretariat by 30 June 2019)	
In accordance with IOTC Resolution 15/02,	YES
provisional <b>longline data</b> for the previous year was	
provided to the IOTC Secretariat by 30 June of the	02/07/2020 amended on 24/08/2020
current year [e.g. for a National Report submitted	
to the IOTC Secretariat in 2019, preliminary data	NB – data supplied on 24 August 2020 can be
for the 2018 calendar year was provided to the	considered to be final for 2019
IOTC Secretariat by 30 June 2019).	
<b>REMINDER:</b> Final longline data for the previous	
year is due to the IOTC Secretariat by 30 Dec of the	
current year [e.g. for a National Report submitted	
to the IOTC Secretariat in 2019, final data for the	
2018 calendar year must be provided to the	
Secretariat by 30 December 2019).	
If no, please indicate the reason(s) and intended acti	ons:
, ,	

#### **Executive Summary**

The UK had just two drifting longliners operating in the IOTC Convention area in 2019. The vessels were between 39 and 45 metres and operated mostly in the south western area of the Indian Ocean on high seas, targeting large pelagic species (blue shark, swordfish and tunas). The UK's scientific observer programme started in mid-2017 and the first full year of sampling data, covering around 11 percent of fishing days, was reported in 2019.

#### 1. BACKGROUND/GENERAL FISHERY INFORMATION

The UK (European Union) fishing vessels operating in the IOTC area of competence consist of only pelagic longliners. The number of vessels licences has remained fairly consistent since 2014 (2/3 vessels). The active vessels follow a similar trend (1/2 vessels since 2014). The vessels have ranged in size from 39 metres to 47 metres in length and operated mostly in the south western area of the Indian Ocean.

#### 2. FLEET STRUCTURE

The UK has licensed two pelagic longline vessels for fishing in the IOTC area of between 39 and 45 metres overall length. One of the vessels is administered in Scotland and the other in England. Fishing voyages are of three to four months duration and vessels are actively fishing for most of that time.

Table 1: Number of vessels operating in the IOTC area of competence, by gear type and size: 2014–2018

Year	Number of Vessels	Number of Vessels Active	Length
	Licensed		
2019	2	2 (drifting longliners)	39 metres – 45 metres
2018	2	2 (drifting longliners)	39 metres – 45 metres
2017	2	2 (drifting longliners)	40 metres – 47 metres
2016	2	1 (drifting longliners)	47 metres
2015	3	2 (drifting longliners)	40 metres – 47 metres
2014	3	2 (drifting longliners)	40 metres – 47 metres

#### 3. CATCH AND EFFORT (BY SPECIES AND GEAR)

The overall catch peaked in in 2009 (1334.4 tonnes). In recent years a decreasing trend has been observed. In 2019, a total of 881.8 tonnes were caught in the IOTC area by the two longliners. This figure includes 383.2 tonnes of swordfish, 371.8 tonnes of blue shark, 72 tonnes of shortfin mako, 16.6 tonnes of snake mackerel, 12.3 tonnes of black marlin and 17.4 tonnes of tuna species (yellowfin, albacore, bigeye).

Total 2019UK (EU) catches in the IOTC area by composition

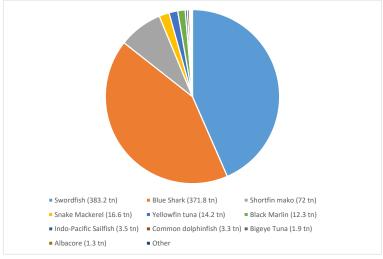


Table 2 Historical total catches (tonnes) and effort (No. of hooks x no. of sets x days fished) by UK (EU) in IOTC area

Year	Total Effort	<b>Total Catch</b>
2019	621600	881.8
2018	498100	989.3
2017	500300	579.8
2016	271700	469.4
2015	388300	745.5
2014	579700	1004
2013	502700	931.1
2012	577900	1224.9
2011	690800	1165
2010	566000	1064.6
2009	800900	1295.9

Figure 1. Historical annual catch for the national fleet, by gear and primary species\*, for the IOTC area of competence 2009-2019

Species code	2009	2010	2011	2012	2013	2014	2015	2016	2017	2018	2019
ALB	8.7	5.1	4.0	6.6	7.0	7.9	8.5	2.1	3.1	1.0	1.3
AMX	0.0	5.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
BAZ	0.0	0.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
BET	0.0	3.5	3.2	3.3	0.0	0.0	0.0	0.0	2.5	2.3	1.9
BIL	21.7	24.4	4.6	1.7	0.0	0.0	0.0	0.0	3.3	3.9	0.8
BLM	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.8	13.1	12.3
BON	5.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
BSH	427.1	379.3	333.0	326.4	193.4	251.8	215.3	172.4	195.7	369.5	371.8
BUM	0.0	1.3	9.3	20.4	16.5	11.7	7.9	3.5	4.1	0.0	0.0
COD	0.0	0.0	0.0	9.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0
DOL	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	2.6	2.9	3.3
FAL	0.4	2.5	1.3	1.5	0.0	0.0	0.0	0.0	2.0	0.0	0.0
GRO	1.0	0.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
HAD	0.0	0.0	0.0	55.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
LEC	4.5	46.1	35.0	50.0	47.0	41.3	30.5	19.6	17.6	31.6	16.6
LMA	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.3	0.3	0.0
MAK	44.3	52.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
OIL	32.7	4.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1
SFA	0.9	5.5	3.0	7.5	5.7	2.8	1.2	1.7	1.2	7.3	3.5
SKH	0.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SMA	16.7	17.0	62.1	70.2	46.5	54.0	26.1	22.8	68.2	87.4	72.0
SPL	0.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
SWO	646.3	684.0	679.6	687.3	558.9	527.2	365.0	203.7	284.2	523.0	383.2
TUX	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
WAH	0.0	1.8	1.5	3.5	2.1	2.8	1.7	0.4	0.7	1.6	0.8
YFT	120.4	51.6	42.7	56.8	53.9	85.9	85.4	41.8	20.6	9.1	14.2
YTC	3.8	10.0	20.8	10.5	8.3	18.7	4.0	1.4	7.2	0.5	0.0

<sup>\*</sup>FAO code used

Figure 2a. Distribution of longline fishing effort (No. of hooks x no. of sets x days fished,) UK vessels in the IOTC area of competence (2019)

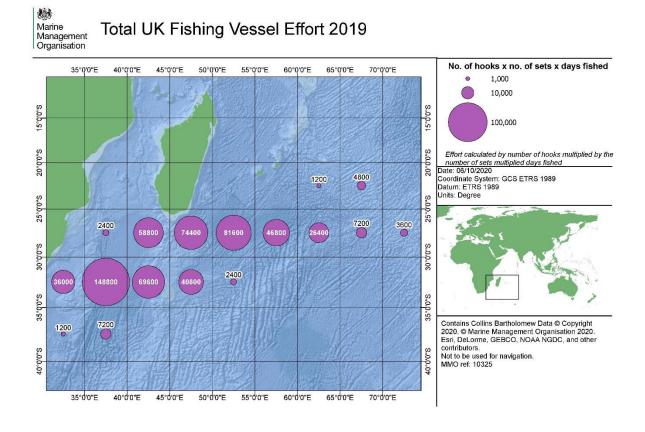
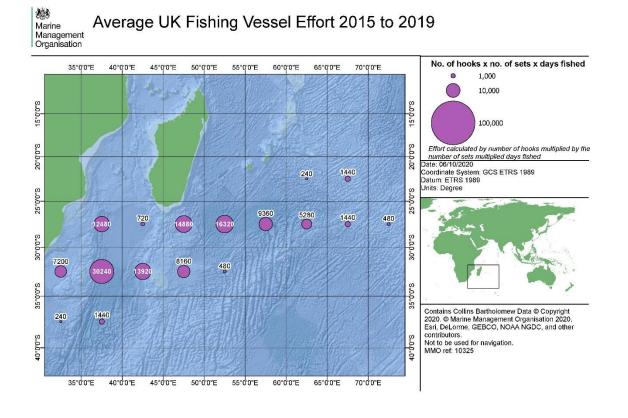


Figure 2b. Distribution of longline fishing effort (No. of hooks x no. of sets x days fished,) UK vessels in the IOTC area of competence (average of 2015–2019)



### Figure 3a. Distribution of fishing catch, by species for the national fleet, in the IOTC area of competence in 2018

Figure 3a (1): Distribution of UK (EU) catch of albacore (tonnes) in 2019 by 5° area

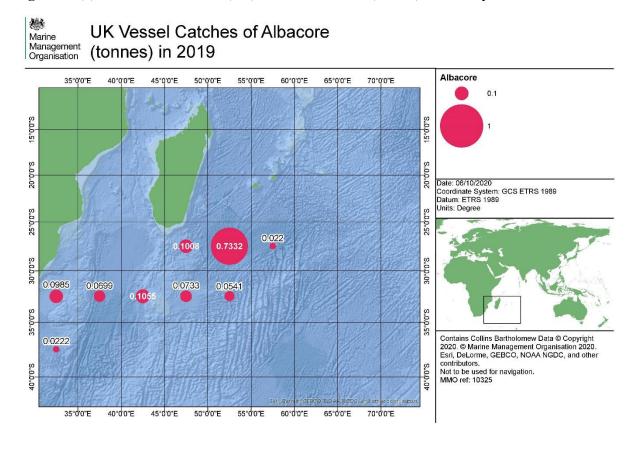


Figure 3a (2): Distribution of UK (EU) catch of blue shark (tonnes) in 2019 by 5° area

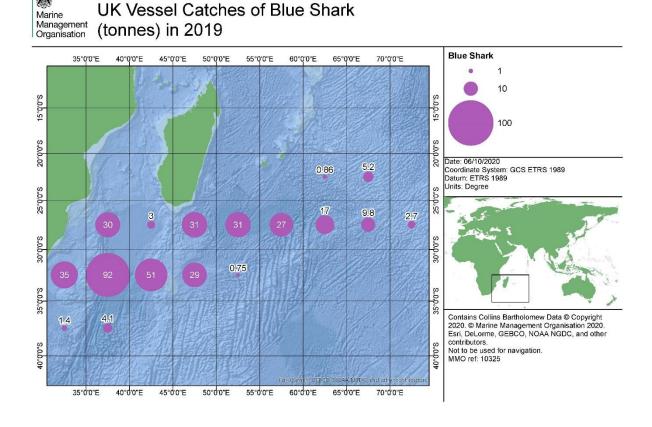


Figure 3a (3): Distribution of UK (EU) catch of shortfin make (tonnes) in 2019 by 5° area

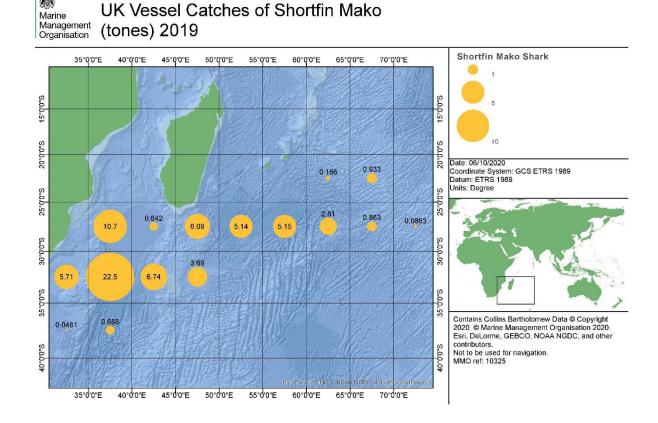


Figure 3a (4): Distribution of UK (EU) catch of swordfish (tonnes) in 2019 by 5° area

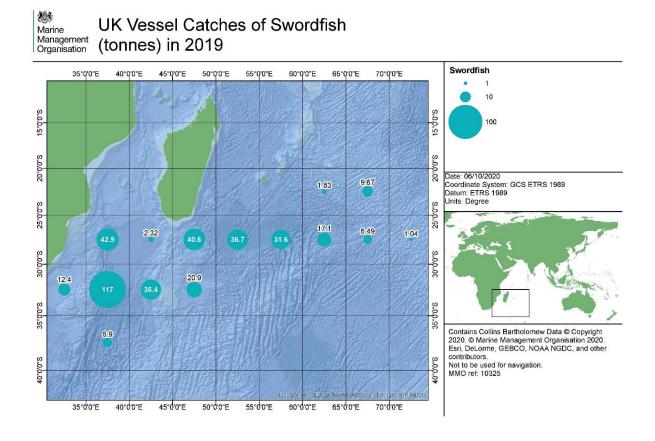


Figure 3a (5): Distribution of UK (EU) catch of yellowfin tuna (tonnes) in 2019 by 5° area

Marine UK Vessel Catches of Yellowfin Tuna Management (tonnes) in 2019

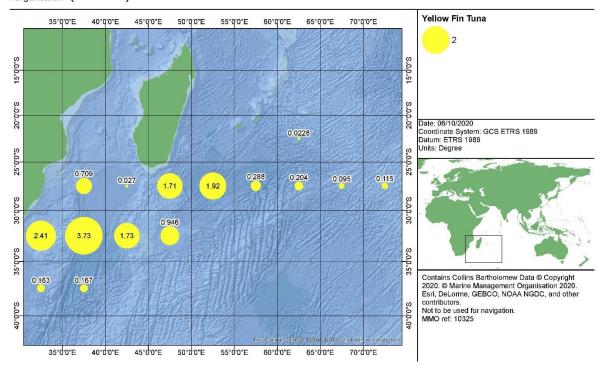


Figure 3a (6): Distribution of UK (EU) catch of other species (tonnes) in 2019 by  $5^{\circ}$  area

Marine **UK Vessel Catches of Other Species** (tonnes) in 2019 Other 35°0'0"E 40°0'0"E 45°0'0"E 50°0'0"E 55°0'0"E 60°0'0"E 70°0'0"E 5 10 20.0.02 20.0.02 Date: 06/10/2020 0.63 Coordinate System: GCS ETRS 1989
Datum: ETRS 1989
Units: Degree 0.079 25°0'0"S 0.48 0.19 0.2 30.0.0.8 1.8 Contains Collins Bartholomew Data © Copyright 2020. © Marine Management Organisation 2020. Esri, DeLome, GEBCO, NOAA NGDC, and other 0.057 Not to be used for navigation. MMO ref: 10325 35°0'0"E 40°0'0"E 45°0'0"E 50°0'0"E 55°0'0"E 60°0'0"E 65°0'0"E

## Figure 3b. Distribution of fishing catch, by species for the national fleet, in the IOTC area of competence (average of 2015–2019)

Figure 3b (1): Distribution of UK (EU) catch of albacore (tonnes) by 5° area (average 2015-2019)

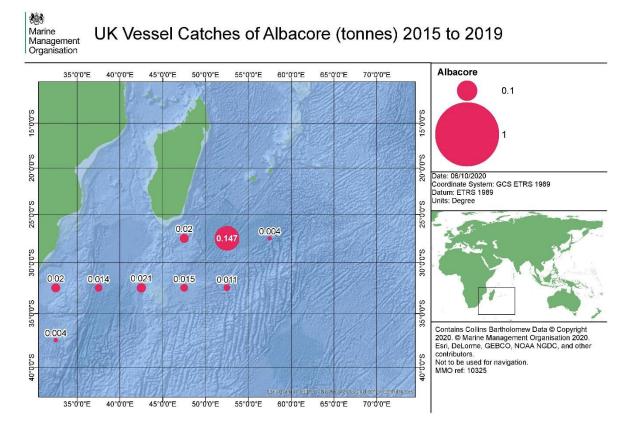


Figure 3b (2): Distribution of UK (EU) catch of blue shark (tonnes) in 2019 by 5° area (average 2015-2019)

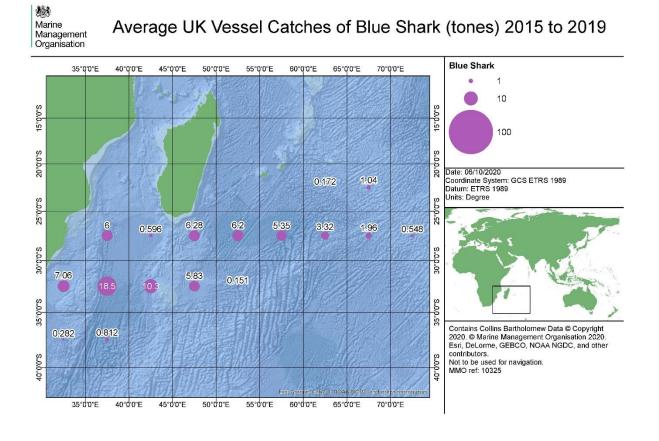


Figure 3b (3): Distribution of UK (EU) catch of shortfin make (tonnes) in 2015 by 5° area (average 2015-2019)

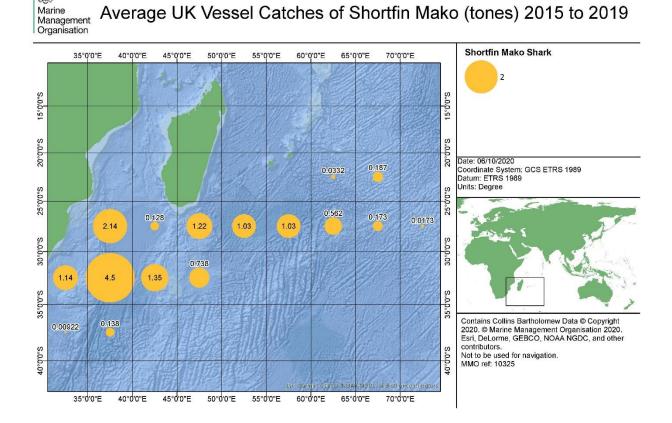


Figure 3b (4): Distribution of UK (EU) catch of swordfish (tonnes) in 2019 by 5° area (average 2015-2019)

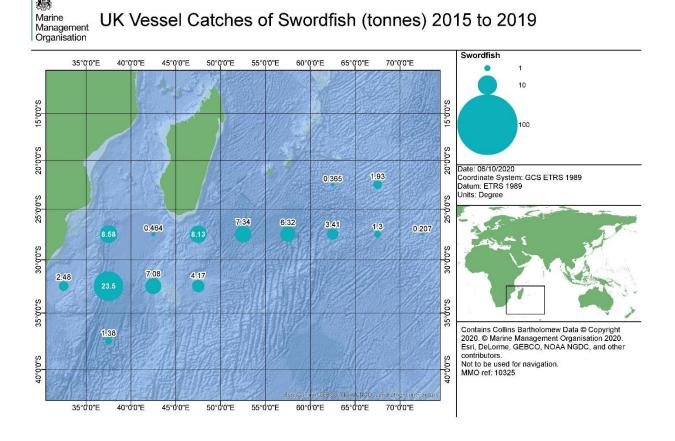


Figure 3b (5): Distribution of UK (EU) catch of yellowfin tuna (tonnes) in 2019 by 5° area (average 2015-2019)

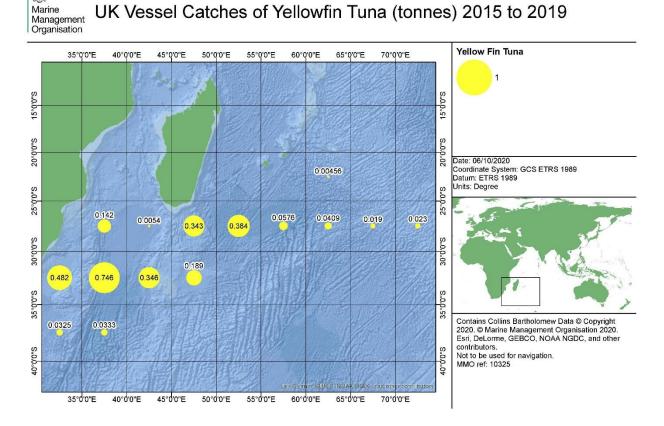
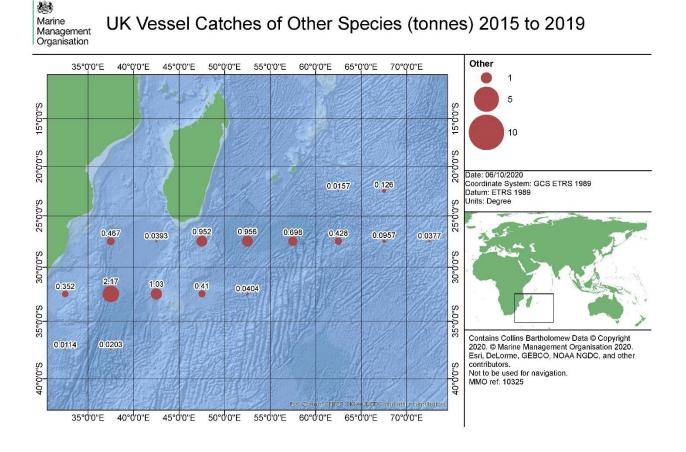


Figure 3b (6): Distribution of UK (EU) catch of other species (tonnes) in 2019 by 5° area (average 2015-2019)



#### RECREATIONAL FISHERY

No recreational fishing activities have been carried out in the IOTC Convention area.

#### 4. ECOSYSTEM AND BYCATCH ISSUES

#### 4.1 Sharks

Shark catches are reported by species and the vessels are encouraged to release bycatch species that are caught alive. Table 3 details the total weight of sharks retained by the UK fleet in the IOTC area of competence. In 2010 the UK revoked the permits allowing for fins to be removed from sharks therefore all sharks retained must have their fins still naturally attached.

Table 3: Total weight of sharks, by species, retained by the national fleet in the IOTC area of competence: 2014–2019

Species name	2014	2015	2016	2017	2018	2019
Blue Shark	251.8	215.3	172.4	195.7	369.5	371.8
Longfin mako	0.0	0.0	0.0	0.3	0.3	0.0
Shortfin mako	54.0	26.1	22.8	68.2	87.4	72.0

#### 4.2 Seabirds

No incidents reported this year.

All longline fishing vessels are aware of the need to use mitigation measures when fishing south of 25 degrees south or whenever interaction with seabirds is expected. Additional information has been sent to vessels to ensure that they are complying with their obligations and whilst one of the two vessels was noted as carrying mitigation measures, this was not deployed during observations.

#### **4.3** Marine Turtles

All vessels are aware of and use proper handling techniques and keep on board equipment needed for the release of live turtles. Additional information is being sent to vessels to ensure that they are complying with their obligations.

Just one turtle was observed as being caught in 2019 and was released alive.

#### 4.4 Other ecologically related species (e.g. marine mammals, whale sharks)

No reported incidents this year.

All fishers are encouraged to immediately and safely release them.

Table 5. Observed annual catches of species of special interest by species (seabirds, marine turtles and marine mammals) by gear for the national fleet, in the IOTC area of competence

NA – Only turtles observed as by-catch (see above)

#### 5. NATIONAL DATA COLLECTION AND PROCESSING SYSTEMS

#### 5.1. Log sheet data collection and verification

Council Regulations 1966/2006, 1006/2008 and 1224/2009 and Commission Regulations 1077/2008 and 201/2010, implemented by the Sea Fishing (EU Recording and Reporting Requirements) (Scotland) Order 2010 (SSI 2010/334), require Masters of fishing vessels of 12 metres' length overall or more to record and report catch data electronically EU and third country waters.

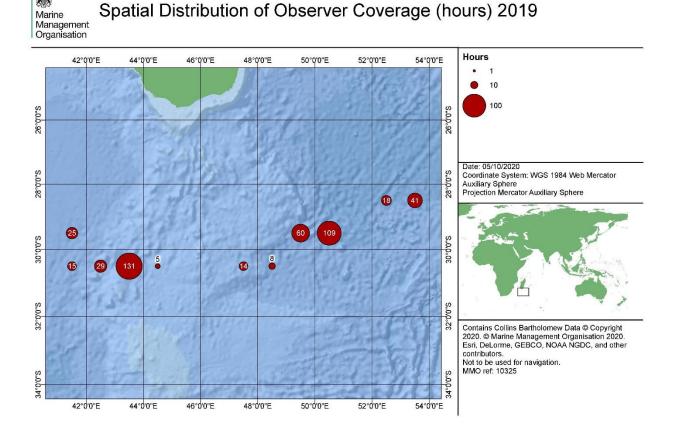
#### 5.2. Vessel Monitoring System

As of 2012, all EU vessels which exceed 12 metres overall length must be fitted with VMS units. This means that all UK vessels operating in the Indian Ocean are monitored by a satellite tracking system.

#### 5.3. Observer programme

An observer programme has now been put in place for UK vessels and routine sampling started from July 2017 with a single observer and the first report was received in October 2017. In 2019 the observer was present for just over 11 percent of the fishing days of the two UK vessels active in the IOTC area.

Figure 4. Distribution of observer coverage (hours) 2019



### **5.4. Port sampling programme** [including date commenced and status of implementation]

All UK vessels operating in the IOTC Convention area land their catches in third countries. The catches are usually loaded into containers and shipped to non-UK ports. The UK's port sampling programme does not cover these vessels but regular contact is made with the competent authorities of countries where we know that the vessels land. Port sampling is therefore carried out occasionally.

Table 4. Number of individuals measured, by species (longlines – 2019)

Species	Total number of individuals sampled	Nº measured	Nº weighed		Maturity stage recorded	Otolith collected	Other (Female with foetal sharks)	Carcass retained
ALB	3	3	0	0	0	0	0	3
BET	10	10	1	0	0	0	0	10
BLM	5	5	0	0	0	0	0	5
BSH	429	429	137	362	35	0	35	427
DOL	2	2	2	0	0	0	0	1
DOL	4	4	0	0	0	0	0	4
FAL	2	2	0	2	0	0	0	0
LAG	2	2	0	0	0	0	0	0
LEC	32	32	16	0	0	0	0	30
MOX	1	1	0	0	0	0	0	0
PSL	1	1	0	0	0	0	0	0
SFA	7	7	4	0	0	0	0	7
SMA	65	65	20	54	0	0	0	65
SSP	2	2	0	0	0	0	0	2
SWO	685	685	15	0	0	0	0	685
TTL	1	1	0	0	0	0	0	0
WAH	1	1	0	0	0	0	0	1
YFT	4	4	4	0	0	0	0	4
Total	1256	1256	199	418	35	0	35	1244

#### 6.4. Unloading/Transhipment

The UK authorities are informed when transhipment takes place though usually catches are landed in ports.

#### 6. NATIONAL RESEARCH PROGRAMS

The UK currently has no research programmes relating to the activities of the Indian Ocean fleet.

# 7. IMPLEMENTATION OF SCIENTIFIC COMMITTEE RECOMMENDATIONS AND RESOLUTIONS OF THE IOTC RELEVANT TO THE SC

**Table 5**. Scientific requirements contained in Resolutions of the Commission, adopted between 2011 and 2018.

Res. No.	Resolution	Scientific requirement	CPC progress
15/01	On the recording of catch and effort by fishing vessels in the IOTC area of competence	Paragraphs 1–10	UK vessels operating in the IOTC area are equipped with electronic logbooks for recording catch and effort data.  Aggregate reports were supplied to the IOTC secretariat as required.
15/02	Mandatory statistical reporting requirements for IOTC Contracting Parties and Cooperating Non-Contracting Parties (CPCs)	Paragraphs 1–7	Catch, effort and size data for longline fisheries has been provided.
18/05	On management measures for the conservation of the billfishes: striped marlin, black marlin, blue marlin and Indo-Pacific sailfish	Paragraphs 7-9	Not applicable to the UK
13/04	On the conservation of cetaceans	Paragraphs 7– 9	Not applicable to the UK
13/05	On the conservation of whale sharks (Rhincodon typus)	Paragraphs 7– 9	Not applicable to the UK
13/06	On a scientific and management framework on the conservation of shark species caught in association with IOTC managed fisheries	Paragraph 5–6	Shark catches are reported by species and the vessels are encouraged to release bycatch species that are caught alive.

Res. No.	Resolution	Scientific requirement	CPC progress
12/09	On the conservation of thresher sharks (family alopiidae) caught in association with fisheries in the IOTC area of competence	Paragraphs 4–8	Shark catches are reported by species and the vessels are encouraged to release bycatch species that are caught alive.
12/06	On reducing the incidental bycatch of seabirds in longline fisheries.	Paragraphs 3–7	All longline fishing vessels are aware of the need to use mitigation measures when fishing south of 25 degrees south or whenever interaction with seabirds is expected. Additional information has been sent to vessels to ensure that they are complying with their obligations.
12/04	On the conservation of marine turtles	Paragraphs 3, 4, 6–10	All vessels are aware of and use proper handling techniques and keep on board equipment needed for the release of live turtles.
11/04	On a regional observer scheme	Paragraph 9	An observer programme has now been put in place for UK vessels and full observer coverage as required by the respective IOTC Resolutions has been adopted. Routine sampling started from July 2017.
17/05	On the conservation of sharks caught in association with fisheries managed by IOTC	Paragraphs 6, 9, 11	UK was compliant with reporting obligations under Resolutions 15/02 and 15/03
18/02	On management measures for the conservation of blue shark caught in association with IOTC fisheries	Paragraphs 2-5	Statistical data on catch and effort relating to blue shark have been reported in line with the provision of Resolution 15/01. Biological data - size and discard data have been provided in accordance with the Resolution 15/02 since 2017 when on board observers for the two UK vessels operating in the IOTC area were first deployed. Prior to that it was considered that the UK was exempt from biological sampling due to thresholds under the DCF Regulation
18/07	On measures applicable in case of non-fulfilment of reporting obligations in the IOTC	Paragraphs 1, 4	UK was compliant with reporting obligations under Resolutions 15/02 and 15/03