

Driving Improvements in Fisheries Governance Globally:

Impact of the EU IUU Carding Scheme on Belize, Guinea, Solomon Islands and Thailand

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EU IUU FISHING COALITION



OCEANA

The Nature Conservancy 



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The Environmental Justice Foundation (EJF), Oceana, The Nature Conservancy, The Pew Charitable Trusts and WWF are working together to promote EU leadership in improving global fisheries transparency and governance to end illegal, unreported and unregulated (IUU) fishing.

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Executive Summary

The European Union's Regulation establishing a Community system to prevent, deter and eliminate illegal, unreported and unregulated (IUU) fishing is a world-leading legal instrument designed to stop the flow of IUU-caught fish entering the EU market.

One key component of the so-called 'IUU Regulation' is the EU's cooperation and ongoing dialogues with third countries, through which a formal warning (or 'yellow card') may be issued to non-EU countries pre-identified by the EU as non-cooperating countries in the fight against IUU fishing. This warning commences a formal engagement between the EU and the yellow-carded country, in which the EU seeks to provide assistance in tackling the shortcomings that have been identified. If sufficient action is not taken to improve performance, the third country further risks being identified as a non-cooperating country pursuant to the IUU Regulation ('red card') – excluding fish caught by the carded country's vessels from being exported to the EU, and preventing EU vessels operating in their waters, amongst other restrictions. Yellow and red cards may be removed once the EU deems sufficient efforts have been made by the carded country to address identified shortcomings. One of the desired outcomes of the carding scheme is to engender lasting, positive country-level changes in the fisheries governance and anti-IUU fishing measures in non-EU countries.

Now, over ten years since the Regulation came into force, this report builds on prior research to highlight instances in which the EU carding scheme has prompted positive changes in fisheries governance in four case study countries: Belize, Guinea, Solomon Islands and Thailand. Through interviews with key informants, and extensive desk-based research, improvements in fisheries governance are measured across three key indicators:

1. Legislation and regulation,
2. Compliance and enforcement, and
3. Prevalence.

Fisheries governance in all four of the case studies has demonstrably changed following carding from the EU. Improvements are being made and indicators point to real, tangible progress; with the EU carding scheme appearing particularly effective at improving legislative arrangements in non-cooperating countries. In addition, there were also improvements in relation to compliance and enforcement, and reducing the prevalence of IUU fishing, which are believed to be at least partially attributable to the carding scheme – notably through efforts to strengthen monitoring, control and surveillance (MCS) measures, as well as participation in relevant international agreements and initiatives designed to reduce IUU fishing and associated issues. The report also suggests that there are social, economic and environmental benefits that have, or are likely to, arise following these improvements – however the relatively short time period that has passed since the governance improvements make these difficult to quantify.

Whilst the carding study is believed to have brought about fisheries governance improvements in the case study countries, there remains scope for both further research into its effectiveness and shortcomings through additional case studies and alternative methodologies. In addition, this report also makes a series of recommendations regarding the carding scheme and how it can be improved. First, it recommends that relevant teams within the EU are resourced and funded adequately so as to ensure the continued effectiveness of the carding scheme. Second, it is recommended that the EU explores the possibility of expanding the scheme, particularly to other key market States, to reduce the likelihood of IUU-caught fish being diverted to alternate markets. Third, it is recommended that the technical support and development assistance provided by the EU to third countries involved in the carding process should be expanded. Fourth, the report recognises that when the carding scheme was introduced it was criticised for being insufficiently transparent and therefore recommends that updates on dialogues continue to be made to Advisory Councils, which include NGOs and industry. Finally, recognising the importance of transparency in identifying and resolving issues related to IUU fishing, it is recommended that the EU uses all available fora, including those outside the carding process, to encourage third countries to adopt transparency reforms.



Introduction

Illegal, Unreported and Unregulated (IUU) fishing imperils the sustainability of the world's fisheries, depletes fish populations, costs the global economy billions every year, skews scientific stock assessments, and deprives communities that rely on healthy fish populations for their livelihoods.¹

In 2008, the European Union (EU) adopted a world-leading piece of legislation to prevent, deter and eliminate IUU fishing – the EU IUU Regulation² (herein the Regulation), which came into force on 1 January 2010. The Regulation consists of three core pillars: cooperation and dialogues with third countries (the carding system being a tool associated to it), the EU Catch Documentation Scheme (CDS),³ and the ability to penalise EU nationals who support, engage in, or profit from IUU fishing anywhere in the world, under any flag. The following case studies highlight instances of positive change that have arisen in fisheries governance following a country's engagement with the EU carding scheme.

Under the Regulation, a non-EU country "may be identified as a non-cooperating third country if it fails to discharge the duties incumbent upon it under international law as flag, port, coastal or market State, to take action to prevent, deter and eliminate IUU fishing".⁴ If the EU deems this to be the case, and initial informal discussions between the two parties fail to yield sufficient progress, the non-EU country will be engaged in the carding process – commencing formal bilateral discussions. The issuing of a yellow card (or pre-identification) indicates an official warning that the EU considers a country to be failing in its efforts to take sufficient action against IUU fishing, and lets countries know that they are at risk of being formally identified as a non-cooperating country pursuant to the IUU Regulation (identification or red card). If a yellow carded country is deemed by the EU to take sufficient action to address concerns around non-cooperation, it will have its card revoked. However, should the yellow carded country still fail to take the necessary steps, a red card can be issued. Moreover, upon approval by EU Member States, as consequence of the red card, a country will be officially 'listed', excluding fish caught by its registered vessels from the EU market and preventing EU fishing vessels from operating in its waters, among other restrictions.⁵ One of the desired outcomes of the carding scheme is to engender lasting, positive national-level changes to fisheries governance and anti-IUU fishing measures in non-EU countries.

The informal discussions previous to the carding process, as well as the carding process and associated dialogues, have involved contact between the EU and more than 60 non-EU countries regarding IUU fishing since the implementation of the Regulation.⁶ To date, this has led to 27 countries being yellow carded, 6 of which moved on to a red. A previous study⁷ outlines the most frequent shortcomings that have led to non-EU countries receiving a card from the EU:

1. Weak (outdated or not in line with international instruments) national legal framework to prevent IUU fishing;
2. Inability of flag State to control the activities of its flagged vessels;
3. Lack of effective conservation and management measures in fisheries activities carried out in areas under national jurisdiction;
4. Weak bilateral and multilateral (including at regional level) cooperation in fisheries management, control and enforcement;
5. Insufficient market State measures and product traceability.

In several countries, the process has brought about tangible improvements in national fisheries governance. For example, both the Philippines and South Korea received yellow cards from the EU, which were lifted in April 2015

1 Sumaila, U. R. et al. (2020). Illicit trade in marine fish catch and its effects on ecosystems and people worldwide. *Science Advances*. 6 (9).

2 Council Regulation (EC) No 1005/2008 of 29 September 2008 establishing a Community system to prevent, deter and eliminate illegal, unreported and unregulated fishing. Available at: <https://eur-lex.europa.eu/eli/reg/2008/1005/oj>

3 As part of the CDS, all exports to, and imports from, the EU must be accompanied by a certificate that verifies them as legal by the competent flag State so as to ensure that products entering the EU market have been caught and processed in line with international commitments.

4 Article 31 of Council Regulation (EC) No. 1005/2008 establishing a Community system to prevent, deter and eliminate illegal, unreported and unregulated fishing, amending Regulations (EEC) No 2847/93, (EC) No 1936/2001 and (EC) No 601/2004 and repealing Regulations (EC) No 1093/94 and (EC) No 1447/1999.

5 Article 38 of the Regulation provides of additional measures such as 'non-acceptance of catch certificates; prohibition to purchase fishing vessels; prohibition to flag EU fishing vessels; no chartering agreements; prohibition to export EU fishing vessels; prohibition of private trade agreements with EU nationals; prohibition of joint fishing operations with EU; possible denunciation of standing bilateral fisheries agreements or partnerships; and/or no further negotiations to conclude bilateral fisheries agreements or partnerships'.

6 Sinkevicius, V. (2020). Fighting for the ocean: the story of tackling IUU.

Available at: <https://www.euractiv.com/section/energy-environment/opinion/fighting-for-the-ocean-the-story-of-tackling-iuu/>

7 EJF, Oceana, The Pew Charitable Trusts and WWF. (2016). Improving performance in the fight against illegal, unreported and unregulated (IUU) fishing. Available at: http://www.iuuwatch.eu/wp-content/uploads/2015/06/3rdCountryCardingGuidelinesReport_FINAL.LOW_.pdf

following a series of positive reforms to their respective legal frameworks and control systems. These changes were documented in case studies published in October 2015.⁸

Now, over ten years after the Regulation came into force, this report builds on prior research to highlight instances in which the EU carding scheme has prompted positive changes in fisheries governance for a further four carded countries: Belize, Guinea, the Solomon Islands and Thailand (Table 1). These countries were selected to ensure a good geographic coverage and an assessment of both flag and coastal State actors, including Small Island Developing States (SIDS) which are often left out of IUU discussions.

Table 1 | Table of EU carding dates for the case study countries.

Country	Pre-identification Date	Pre-identification Revoked Date	Identification Date	Listing Date	Delisting Date
Belize	November 2012	-	November 2013	March 2014	December 2014
Republic of Guinea	November 2012	-	November 2013	March 2014	October 2016
Solomon Islands	December 2014	February 2017	-	-	-
Thailand	April 2015	January 2019	-	-	-

The findings presented in these case studies were compiled by undertaking a rigorous desk-based analysis (a full list of data sources is available in Appendix 1), coupled with key informant interviews (including academics, fishing companies, national fisheries officials, NGO workers and regional fisheries experts). The findings are presented with a focus on three key areas of governance: Legislation and Regulation, Compliance and Enforcement and Prevalence. An explanation of these criteria can be found in Appendix 2. Following the presentation of the case studies, a series of recommendations are made both around the potential expansion of carding schemes across major seafood markets, and the strengthening of the EU Carding Scheme through increasing transparency.

The case studies below present changes in fisheries governance that have occurred post-carding, which can be feasibly linked with the EU Carding Scheme. The extent to which each change is directly attributable to the EU's system of cooperation with third countries however varies, and they do not necessarily reflect the multitude of contextual factors that may shape national fisheries governance.

⁸ EJF, Oceana, The Pew Charitable Trusts and WWF. (2015). EU Regulation to combat illegal fishing. Third country carding process: Success for South Korea and the Philippines. Available at: http://www.iuuwatch.eu/wp-content/uploads/2015/06/Case-Study2.FINAL_EN_.pdf



CASE STUDY

Belize

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The Central American State of Belize has a high proportion of vessels flying its flag that are owned or operated by non-Belizean nationals.⁹ Such registries are often referred to as ‘flags of convenience’, defined by the International Transport Workers’ Federation (ITF) as registries “Where the beneficial ownership of a vessel is found to be elsewhere than in the country of the flag the vessel is flying”.¹⁰ Flags of convenience are associated with low levels of scrutiny by flag State authorities, often resulting in reduced operating standards.¹¹ This was deemed to be the case for Belize, and in November 2012 the country was issued a yellow card after the EU warned it as a possible non-cooperating country pursuant to the IUU Regulation. It was deemed by the EU that there were recurring IUU vessels and IUU trade flows linked to the country, and that Belize had failed to implement international rules, amongst other concerns.¹²

Following bilateral discussions between the EU and Belize, and in light of Belize’s perceived failures to address IUU fishing under the yellow carding, the EU issued a red card to the country in November 2013. It was noted that in this time the number of flagged vessels appearing on Regional Fisheries Management Organisation (RFMO) IUU lists had risen from six to eight, and that there were continued issues around the country’s adherence to RFMO conservation and management measures (CMMs) and reporting obligations.¹³

Belize had its red card removed in December 2014, having been deemed to have significantly improved its fisheries governance framework so as to meet its international obligations as a flag State. When explaining the reasons for Belize’s delisting, the EU described the country as having undertaken a number of positive steps, including the introduction of an adequate and efficient monitoring, control and surveillance (MCS) scheme, the creation of a deterrent sanctioning system and the establishment of a new system for registering vessels.¹⁴

9 Petrossian, G. A. et al. (2020). Flags for sale: An empirical assessment of flags of convenience desirability to foreign vessels. *Marine Policy*. 116, (103937).

10 International Transport Workers’ Federation. (2011). Mexico City Policy: ITF policy on minimum conditions on merchant ships. Available at: <https://www.itfglobal.org/en/reports-publications/mexico-city-policy-edition-2>

11 Ford, J. H. and Wilcox, C. (2019). Shedding light on the dark side of maritime trade – A new approach for identifying countries as flags of convenience. *Marine Policy*. 99. 298-303.

12 The full list of reasons for Belize’s yellow card can be found here: <https://op.europa.eu/en/publication-detail/-/publication/2b030b76-2ffc-11e2-9b72-01aa75ed71a1/language-en>

13 The full list of reasons for Belize’s red card can be found here: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2013:346:0002:0025:EN:PDF>.

14 The full list of reasons for Belize’s de-listing can be found here: <https://eur-lex.europa.eu/legal-content/en/TXT/?uri=CELEX%3A32014D0914>.

Improvements in fisheries governance

Legislation and Regulation

Institutional and legal framework changes

Significant changes in fisheries governance took place in Belize during 2013, in the time between its yellow card and its red carding. Notably, the repeal of its High Seas Fisheries Act, 2003 and subsequent replacement with the High Seas Fishing Act, 2013, provided a dramatic overhaul of the regulatory framework, extending and strengthening its scope.¹⁵ A government agency was established to ensure the effective implementation of this Act, the Belize High Seas Fisheries Unit (BHSFU). This authority is “responsible for the regulation and control of Belize-flagged vessels which engage in fishing or related activities on the high seas pursuant to the High Seas Fishing Act, 2013”.¹⁶ This Act made significant changes to how Belize regulated its distant water fleet, such as establishing mandatory vessel monitoring systems, better records of fishing vessels, and stronger regulation around CMMs.

Another significant event was the nationalisation of the registry that provided Belizean flags to vessels (International Merchant Marine of Belize or IMMARBE),¹⁷ which became positioned within the Ministry of Finance. Prior to this nationalisation, the registry was under the ownership of the private company ‘Belize International Services Limited’, co-owned by a Panamanian law firm and ‘Waterloo Investment Holdings Limited’, a company based in the British Virgin Islands within which a British-Belizean businessman owned a 77% stake.¹⁸ Under private ownership, the registry’s controls were reportedly lax, meaning that for a fishing vessel to possess the Belizean flag was potentially an opportunity to engage in unscrupulous and illegal activity.¹⁹ The renationalisation of the registry was clearly attributable to the carding scheme. Quoted in the Belizean media, the Prime Minister, when asked about the carding, commented “...we are prepared, and have been prepared for a while, to give up that ship’s registry, if it were to come to that, in order to ensure the continued ability to export”.²⁰ By taking over the registry, the government of Belize was able to exert more direct control and monitoring on high seas fishing vessels, punishing and removing those vessels engaging in IUU activity from their registry (see ‘Prevalence’ section below).

Participation in relevant international agreements and initiatives

Indicator 14.6.1 of the Sustainable Development Goals (SDG) measures country-level progress according to “the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing”.²¹ In 2020, Belize scored a 3 (out of 5) for this indicator,²² which equates to a ‘medium implementation of applicable instruments to combat IUU fishing’.²³

15 Belize High Seas Fisheries Unit (BHSFU). High Seas Fishing Act, 2013. Available at: <https://www.bhsfu.gov.bz/wp-content/uploads/2014/05/High-Seas-Fishing-Act-2013-No-26-of-2013.pdf>

16 BHSFU. (2014). Available at: <http://www.bhsfu.gov.bz/about-us/>

17 IMMARBE. (2014). Newsletter of the Int’l Merchant Marine Registry of Belize – Issue 1, 2014. Available at: http://www.immarbe.com/IMMARBELIB/newsletters/IMMnewsHR_Issue_1_2014.pdf

18 The Guardian. (2013). Lord Ashcroft in dispute with Belize over control of offshore register. Available at: <https://www.theguardian.com/uk-news/2013/aug/04/lord-ashcroft-dispute-belize-offshore-register>

19 International Confederation of Free Trade Unions, Trade Union Advisory Committee to the OECD, International Transport Workers’ Federation and Greenpeace International. (2002). More trouble waters. Fishing, pollution and FOCs. Available at: <http://omk.org.pl/fopen.php?fid=c7b1888254c>

20 Amandala. (2013). GOB assumes control of IBC and IMMARBE. Available at: <https://amandala.com.bz/news/gob-assumes-control-ibc-immarbe/>

21 UNSTATS. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing. Available at: <http://www.fao.org/sustainable-development-goals/indicators/1461/en/>

22 *ibid.*

23 World Bank Group. (2021) SDG Metadata Translation Project: Indicator: 14.6.1. Available at: <https://worldbank.github.io/sdg-metadata/metadata/en/14-6-1/>

Since its engagement in the carding process, Belize has participated in the following relevant international agreements and initiatives (date in brackets):

- The Food and Agriculture Organization of the UN (FAO) International Plan of Action on IUU Fishing (2001),²⁴ leading to the establishment of a National Plan of Action (NPOA) on IUU Fishing (2014).²⁵
- In 2005, deposited its instrument of acceptance of the FAO 'Agreement to promote compliance with international conservation and management measures by fishing vessels on the high seas', Article VI of which requires state parties to exchange information on vessels authorised to fish on the high seas.²⁶ This information is shared in the FAO High Seas Vessels Authorization Record. Belize last updated its authorised vessel data in September 2018.²⁷
- Signed the Torremolinos Declaration, indicating an intention to ratify the International Maritime Organization (IMO) 2012 Cape Town Agreement (2019).²⁸

Compliance and Enforcement

Engagement and compliance with RFMOs

In its indicator for flag State engagement with RFMOs, the IUU Fishing Index 2019 ranks Belize in the highest category (1 out of 5),²⁹ suggesting Belize is fully engaged with RFMOs as either a member or non-contracting party, according to the platform's scoring system.

Since it became engaged with the carding process, Belize has left a number of RFMOs, namely the Western and Central Pacific Fisheries Commission (WCPFC) in 2015, and both the Indian Ocean Tuna Commission (IOTC) and the South Pacific Regional Fisheries Management Organisation (SPRFMO) in 2016. It is currently a member of the Inter-American Tropical Tuna Commission (IATTC) and the International Commission for the Conservation of Atlantic Tuna (ICCAT). According to the Scientific Advisory Committee of the IATTC, both the IATTC and ICCAT are RFMOs "whose areas of responsibility are closer to Belize and allow better management of the fleet".³⁰ As this statement indicates, it can be argued that reducing membership of RFMOs, with their often punishing schedule of meetings and obligations, to focus on those within which they can better manage their fleet can be seen as Belize trying to improve its IUU fishing regulatory capabilities and committing its finite resources to those RFMOs more closely associated with its interests.

Using RFMO documentation, it is possible to observe changes in Belize's compliance with these organisations' rules. ICCAT's biennial reports³¹ present 'Compliance Summary Tables' for each member, where issues of non-compliance are detailed in the following four categories: Annual Report/Statistics, Conservation and Management Measures, Quota and Catch Limits, and Other Issues. During the period of 2012-2015, three out of four years Belize registered an incidence for three categories of non-compliance. This is followed by 2016 and 2017, where there were no incidences noted. In 2018 and 2019, some incidences were noted in two categories, indicating a slight upturn in compliance following the carding process years.³²

24 Food and Agriculture Organization (FAO). (2001). International Plan of Action to Prevent, Deter and Eliminate Illegal, Unreported and Unregulated Fishing. Available at: <http://www.fao.org/publications/card/en/c/71be21c9-8406-5f66-ac68-1e74604464e7>

25 BHSFU. (2014). National Plan of Action to Prevent, Deter and Eliminate, Illegal, Unreported and Unregulated (IUU) Fishing On the High Seas. Available at: <https://www.bhsfu.gov.bz/wp-content/uploads/2014/05/NPOA-IUU-BELIZE-HIGH-SEAS-FLEET.pdf>

26 Food and Agriculture Organization (FAO). (1995) Agreement to promote compliance with international conservation and management measures by fishing vessels on the high seas. Available at: <http://www.fao.org/documents/card/en/c/8cb30770-3145-55ed-a0db-315cbbb722a6>

27 Food and Agriculture Organization (FAO). Fishery Records Collections: High Seas Vessels Authorization Record (HSVAR). Available at: <http://www.fao.org/fishery/collection/hsvar/2/en#table1>

28 IMO Torremolinos Declaration. (2019). Available at : <https://wwwcdn.imo.org/localresources/en/MediaCentre/Documents/Torremolinos%20Declaration.pdf>

29 Macfadyen, G., Hosch, G., Kaysser, N. and Tagziria, L. (2019). The IUU Fishing Index, 2019. Poseidon Aquatic Resource Management Limited and the Global Initiative Against Transnational Organized Crime. Available at: <http://www.iuufishingindex.net/report>

30 IATTC. (2016). Scientific Advisory Committee Seventh Meeting 2016. Available at: [http://www.iattc.org/Meetings/Meetings2016/SAC-07/PDFs/Docs/_English/SAC-07-06b\(ii\)_Results-of-FAO-GEF-shark%20project-1.pdf](http://www.iattc.org/Meetings/Meetings2016/SAC-07/PDFs/Docs/_English/SAC-07-06b(ii)_Results-of-FAO-GEF-shark%20project-1.pdf)

31 ICCAT. Biennial Reports. Available at: https://www.iccat.int/en/pubs_biennial.html

32 However, it is important to note this is only a simplistic overview, as it does not assess the seriousness of each non-compliance incidence.

Incidences of enforcement

There does not appear to be publicly available data on incidences of enforcement within Belizean waters, or involving Belizean authorities. However, there has been a recent example pointing towards Belizean authorities enforcing their regulations on a vessel suspected of illegal activities. In June 2018, Belize deregistered the world's largest fish factory ship, the 'Damanzaihao'³³ – an action said to have been a 'setback' to the vessel's operations.³⁴ This vessel was being investigated by Peruvian authorities on the grounds of suspected IUU fishing activity. Belize removed the vessel's flag for failing to complete its vessel registration materials appropriately, and for failing to inform Belize of its IUU fishing record. Whilst this specific example is a positive instance of enforcement, a recent report by the United Nations Conference on Trade and Development (UNCTAD) suggests that effective enforcement is still hindered by a lack of resources.³⁵

Number and value of sanctions

As part of the significant legal changes that took place with the High Seas Fishing Act 2013, new, stronger regulations around sanctioning were established. The 'High Seas Fishing Sanctions Regulations'³⁶ outline these changes. For example, serious violations became subject to a fine of between US\$50,000 to US\$3,000,000, and minor violations between US\$10,000 and US\$1,000,000. Other measures include actions related to recidivism and accompanying sanctions such as suspension of license and confiscation of gears. It was however not possible to find complete data on the extent to which this sanctioning regulation has been enforced since its establishment.

Monitoring, control and surveillance changes

MCS rules have seen significant improvements as a result of the legal framework changes involving the High Seas Fishing Act, 2013. This is evident when comparing the High Seas Fisheries Act, 2003³⁷ with the 2013 Act, with the latter containing significantly more details around vessel monitoring, catch reporting, and observers.

General improvements that have been introduced in the act, and since, include:

- Introduction of the High Seas Fishing (Monitoring, Control and Surveillance) Regulations, 2014³⁸ – which include a national plan of inspection.
- The establishment of a Fisheries Monitoring Center, which has ensured Belize has greater capability to monitor its global fleet 24 hours a day.
- Improvements to its Vessel Monitoring System (VMS), with on-board VMS required to be kept functional "at all times while in the high seas or such other areas as may be agreed or designated"³⁹ and transmission of position reports carried out every hour.
- Establishment of an electronic catch reporting system in early 2015.
- Implementation of an observer program in 2015 for "the purpose of collecting and reporting reliable and accurate information for scientific, management and compliance purposes" and to comply with RFMO obligations.⁴⁰

33 Safety4Sea. (2018). Belize removes flag of world's largest fish factory ship. Available at: <https://safety4sea.com/belize-removes-flag-of-worlds-largest-fish-factory-ship/>

34 Undercurrent News (2018). Belize strips Damanzaihao of flag, leaving it stateless. Available at: <https://www.undercurrentnews.com/2018/06/08/belize-strips-damanzaihao-of-flag-leaving-it-stateless/>

35 UNCTAD. (2020). Oceans Economy and Trade Strategy: Belize marine fisheries and seafood processing. Available at: https://unctad.org/system/files/official-document/ditctedinf2020d5_en.pdf

36 BHSFU. (2014). High Seas Fishing Sanctions Regulations. Available at: <https://www.bhsfu.gov.bz/wp-content/uploads/2014/05/S-I-No-32-of-2014-High-Seas-Fishing-Sanctions-Regulations-2014-.pdf>

37 Government of Belize. (2003). High seas fishing act chapter 210:01 revised edition 2003 showing the substantive laws as of 31st May, 2003.

38 Belize High Seas Fisheries Unit (BHSFU). High Seas Fishing (Monitoring, Control and Surveillance) Regulations, 2014. Available at: <http://extwprlegs1.fao.org/docs/pdf/blz174495.pdf>

39 Belize High Seas Fisheries Unit (BHSFU). High Seas Fishing Act, 2013. Available at: <https://www.bhsfu.gov.bz/wp-content/uploads/2014/05/High-Seas-Fishing-Act-2013-No-26-of-2013.pdf>

40 Belize High Seas Fisheries Unit (BHSFU). High Seas Fishing Act, 2013. Available at: <https://www.bhsfu.gov.bz/mcs/national-observer-program/>

- Greater use of innovative technology to expand MCS capability. For example, the deployment of ‘quadcopter’ drones with capacity for live video streaming.
- Signed a Memorandum of Understanding with Global Fishing Watch and Oceana to publish its vessel tracking data through the Global Fishing Watch online fishing map.⁴¹

Prevalence

Number of flagged vessels

Particularly within the context of a State considered a flag of convenience, a reduction in the number of flagged vessels may indicate higher standards being required from the relevant authorities, and that the flag was less desirable for unscrupulous fishers as it previously might have been. As aforementioned, significant changes took place regarding Belize’s flag registry and monitoring of high seas fisheries with the nationalisation of the flag registry authority and the establishment of the HSFU. One impact of this has been a marked drop in the number of vessels receiving the Belizean flag. At the time of writing, it stands at 44 vessels,⁴² whereas between 1999 and 2005 this figure ranged from between 241 and 443.⁴³ According to key informant interviews, there has been a similarly drastic decrease in the country’s high seas fishing fleet, declining from 96 in 2013 to 21 in 2020. At around the time of changes in the registry (June 2013), the number was close to 100, and this quickly dropped to as low as a quarter of that as vessels’ flags changed. However, Belize is still considered a flag of convenience^{44/45}, and further work remains in order to ensure the country is fully compliant with its responsibilities as a flag State.

Number of vessels on IUU lists

According to the Combined IUU Fishing Vessel List of Trygg Mat Tracking (TMT) (which provides up to date information on all fishing vessels that appear on IUU lists published by RFMOs), there were 13 vessels placed on RFMO IUU lists that were flagged to Belize at the time of their listing, for contraventions of either IATTC or IOTC CMMs.⁴⁶ All of these vessels were listed prior to the country’s engagement in the carding scheme. As of the 15th of November 2012, due to a number of the 13 vessels changing flags, the EU noted in their decision of pre-identification⁴⁷ that there were 6 Belizean vessels currently listed on RFMO IUU lists: Goidau Ruey No.1, Orca, Reyamar 6, Sunny Jane, Tching Ye No.6 and Wen Teng No. 688. In November 2013, the EU reported that this number had increased, with 8 vessels listed on RFMO IUU lists with Belizean flags: Amorinn, Chia Hao No. 66, Orca, Ray, Reyamar 6, Tchaw, Tching Ye No.6, and Wen Teng No. 688,⁴⁸ suggesting a decline in adherence of Belizean-flagged vessels to relevant CMMs. No Belizean vessels appear to have been added post-carding to the RFMO IUU database.

Identification by US National Oceanic and Atmospheric Administration (NOAA) for IUU fishing concerns

Since 2009, Belize has not been ‘identified’ by NOAA as a nation engaging in IUU fishing. However, in both the 2011 and 2015 report to US Congress, Belize was noted as a ‘country of interest’, which suggests some affiliation with IUU activity. In 2011, this was due to alleged violation in 2009 of IATTC Resolutions C-04-06 and C-08-02 (no VMS on-board), and IATTC Resolutions C-05-03 and C-05-07 (shark fins on board without corresponding

41 Oceana. (2021). Belize to publish vessel tracking data through global fishing watch. Available at: <https://oceana.org/press-releases/belize-publish-vessel-tracking-data-through-global-fishing-watch/>

42 BHSFU. (2021). List of Authorized Vessels. Available at: <https://www.bhsfu.gov.bz/vessels/list-of-authorized-vessels/>

43 Gianni, M. and Simpson, W. (2005). The Changing Nature of High Seas Fishing: how flags of convenience provide cover for illegal, unreported and unregulated fishing. Australian Department of Agriculture, Fisheries and Forestry, International Transport Workers’ Federation, and WWF International. Available at: <http://assets.wwf.org.uk/downloads/flagsofconvenience.pdf>. Note: this figure refers to vessels greater than or equal to 24m in length.

44 Petrossian, G. A. et al.. (2020). Flags for sale: An empirical assessment of flag of convenience desirability to foreign vessels. *Marine Policy*. 116 (103937).

45 Ford, J. H. and Wilcox, C. (2019). Shedding light on the dark side of maritime trade – A new approach for identifying countries as flags of convenience. *Marine Policy*. 99. 298-303.

46 Trygg Mat Tracking Combined IUU Vessel List. Available at: <https://iuu-vessels.org/>.

47 European Commission. (2012). Commission Decision of 15 November 2012 on notifying the third countries that the Commission considers as possible of being identified as non-cooperating third countries pursuant to Council Regulation (EC) No. 1005/2008 establishing a community system to prevent, deter and eliminate illegal unreported and unregulated fishing. Available at: <https://op.europa.eu/en/publication-detail/-/publication/2b030b76-2ffc-11e2-9b72-01aa75ed71a1/language-en>

48 European Commission. (2013). Commission Implementing Decision of 26 November 2013 identifying the third countries that the Commission considers as non-cooperating third countries pursuant to Council Regulation (EC) No. 1005/2008 establishing a Community system to prevent, deter and eliminate illegal, unreported and unregulated fishing. Available at: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2013:346:0002:0025:EN:PDF>

carcasses and incomplete shark catch records).⁴⁹ The country's 2015 "country of interest" status relates to alleged violations of IATTC Resolution C-12-07 (false transshipment declaration) and IATTC Resolution C-11-03 in 2013 (prohibition of fishing on data buoys).⁵⁰ In both incidents, NOAA deemed Belize's response to the infractions sufficient, and opted not to fully 'identify' them.

Belize has not featured as an identified country or country of interest since the 2013 incident outlined in the 2015 report. The country's absence from the 2017 and 2019 NOAA reports is suggestive of reduced instances of IUU fishing amongst the Belizean fleet from the time period before delisting in December 2014 to the present day.

Summary

As this case study has shown, since receiving a yellow card from the EU, Belize has made significant improvements in its approach towards IUU fishing. The renationalisation of the Belizean registry, coupled with the legislation changes that took place in 2013 regarding high seas and activities of the distant-water fleet, have been the most significant changes. Indicators point to improvements in numerous outcomes, such as a large reduction in flagged vessels, the sign of more robust and stringent regulations, a reduction of flagged vessels on IUU vessel lists to zero, and the establishment of MCS infrastructures such as a Fisheries Monitoring Center and an observer program. While there is still room for improvement, the bilateral dialogue that took place between 2012 and 2014 acted as a catalyst⁵¹ towards compliance with its international fisheries related obligations, and thereby contributed to the fight against IUU fishing.

49 Implementation of Title IV of the Magnuson-Stevens Fishery Conservation and Management Reauthorization Act of 2006 Biennial Report to Congress. (2011). Available at: https://media.fisheries.noaa.gov/dam-migration/2011_report_508.pdf

50 NOAA. (2015). Improving International Fisheries Management. February 2015 Report to Congress. Available at: https://media.fisheries.noaa.gov/dam-migration/2015noaareptcongress_508.pdf

51 SeafoodSource (2016). How the IUU red card helped turned Belize around. Available at: <https://www.seafoodsource.com/features/how-the-iuu-red-card-helped-turned-belize-around>



CASE STUDY

Guinea

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The waters of Guinea have historically been host to high instances of IUU fishing. An aerial survey of Guinea's territorial waters in 2001 found that 60% of the 2,313 vessels spotted were committing offences.⁵² In 2006, it was estimated that between 20% and 60% of vessels fishing within Guinea's Exclusive Economic Zone (EEZ) were unlicensed,⁵³ and a 2005 estimate suggested that Guinea was losing US\$105.3 million annually to IUU fishing practices.⁵⁴ Furthermore, in 2012, illegal fishing in Guinea was estimated to represent the equivalent of 64% of legal reported catches.⁵⁵ The above was a significant contributor to Guinea receiving a yellow card in November 2012. Specific reasons given by the EU for the yellow carding ranged from insufficient sanctioning of IUU vessels to a lack of enforcement of national fisheries legislations.⁵⁶

Following bilateral discussions between the EU and Guinea, and in light of Guinea's perceived failures to address IUU fishing following the yellow card, the EU officially red carded the country in November 2013. It was noted that in the opinion of the EU, the shortcomings outlined while issuing the yellow card had not been suitably addressed, and that the measures proposed in the action plan established by Guinea and the EU had not been fully implemented.⁵⁷

Guinea had its red card lifted in October 2016, having been deemed to have significantly improved its fisheries governance. When explaining the reasons for Guinea's delisting, the EU described Guinea as having undertaken a number of positive steps including the implementation of its international law obligations and the introduction of MCS procedures. These include the development of an NPOA on IUU fishing, the introduction of improved vessel surveillance and monitoring and a review of its registration and licencing systems.⁵⁸

52 High Seas Task Force. (2006). Closing the net: Stopping illegal fishing on the high seas. Governments of Australia, Canada, Chile, Namibia, New Zealand, and the United Kingdom, WWF, IUCN and the Earth Institute at Columbia University. Available at: <https://www.oecd.org/sd-roundtable/papersandpublications/39375276.pdf>.

53 *ibid.*

54 Marine Resources Assessment Group. (2005). Review of the impacts of Illegal, Unreported and Unregulated (IUU) fishing on Developing Countries. Available at: <https://mrag.co.uk/experience/review-impacts-illegal-unreported-and-unregulated-iuu-fishing-developing-countries>

55 Belhabib, D., Copeland, D., Gorez, B., Harper, S., and Zeller, D. (2012). "Guinean fisheries: past, present and future," in *Marine Fisheries Catches in West Africa*, eds D. Belhabib, S. Harper, D. Zeller, and D. Pauly (Vancouver, BC), pp.91–104.

56 The full list of reasons for Guinea's yellow card can be found here: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2012:354:0001:0047:EN:PDF>.

57 The full list of reasons for Guinea's red card can be found here: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=OJ:C:2013:346:0002:0025:EN:PDF>.

58 The full list of reasons for Guinea's de-listing can be found here: <https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32016D1818&from=EN>.

Improvements in fisheries governance

Legislation and Regulation

Institutional and legal framework changes

Following the country's carding, four new decrees were written in 2014/2015 to improve fisheries management in Guinea. They were:

1. the establishment of aerial patrols,
2. the installation of satellite tracking devices on fishing vessels,
3. the establishment of rules for landing and transshipment of fish products, and
4. a decree on determination of fines and penalties for a wide range of offences. In addition, "a new technical inspection procedure has been laid out to determine the exact tonnage of fishing vessels, which would help in reducing false declaration before the issuance of licence".⁵⁹

Furthermore, in 2015, Guinea restructured and amended its national fisheries legislation.⁶⁰ The contents of this legislation has enabled Guinea to improve its fisheries governance in many aspects, and was one of the key elements of the dialogue with the EU. Under its fisheries management plans, Guinea closes its coastal waters (from the high tide mark up to 60 nautical miles offshore) to all fisheries between July 1st and August 31st, with the exception of most artisanal vessels and industrial vessels targeting pelagic species.

Participation in relevant international agreements and initiatives

Indicator 14.6.1 of the Sustainable Development Goals (SDG) measures "progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing".⁶¹ In 2018, Guinea scored a 5 (out of 5) for this indicator,⁶² which equates to a "very high implementation of applicable instruments to combat IUU fishing".⁶³

Since its engagement in the IUU bilateral dialogue Guinea has participated in the following relevant international agreements in initiatives (date in brackets):

- The code of conduct concerning the repression of piracy, armed robbery against ships, and illicit maritime activity in West and Central Africa (2013).⁶⁴
- Port State Measures Agreement (PSMA) (2016). Guinea has also sought technical assistance from FAO to support its effective implementation since 2017, with the latest mission taking place in September 2019.⁶⁵
- FAO International Plan of Action on IUU Fishing (2001),⁶⁶ leading to the establishment of a National Plan of Action (NPOA) on IUU Fishing (2017).⁶⁷

59 Pramod, G. (2020). 'Guinea – Country Report' in Policing the Open Seas: Global Assessment of Fisheries Monitoring Control and Surveillance in 84 countries. Available at: <https://iuriskintelligence.com/wp-content/uploads/2020/08/Guinea-Country-Report-Global-Fisheries-MCS-Report-2020.pdf>

60 Government of Guinea Marine Fisheries Act of 2015. Available at: <https://peches.gov.gn/images/PDF/Code-rvis-de-la-Pche-Maritime-2015.pdf>

61 UNSTATs. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing. Available at: <http://www.fao.org/sustainable-development-goals/indicators/1461/en/>

62 *ibid.*

63 World Bank Group. (2021) SDG Metadata Translation Project: Indicator: 14.6.1. Available at: <https://worldbank.github.io/sdg-metadata/metadata/en/14-6-1/>

64 Illicit maritime activities in the context of this code of conduct include, but are not limited to, IUU fishing, narcotics trafficking and wildlife smuggling.

65 Food and Agriculture Organization (FAO). (2019). FAO continues ongoing capacity development work to implement the PSMA in Guinea. Available at: <http://www.fao.org/iuu-fishing/news-events/detail/en/c/1234375/>

66 Food and Agriculture Organization (FAO). (2001). International Plan of Action to Prevent, Deter and Eliminate Illegal, Unreported and Unregulated Fishing. Available at: <http://www.fao.org/publications/card/en/c/71be21c9-8406-5f66-ac68-1e74604464e7>

67 Republic of Guinea. (2017). National Plan of Action on IUU Fishing. Available at: <http://extwprlegs1.fao.org/docs/pdf/Gui169189.pdf>

- Submission of information to the FAO Global Record of fishing vessels, refrigerated transport vessels and supply vessels (last port information submitted 3 April 2018 and last vessel record submitted 16 July 2019).⁶⁸
- Signed the Torremolinos Declaration, indicating an intention to ratify the International Maritime Organization (IMO) 2012 Cape Town Agreement (2019).⁶⁹

Compliance and Enforcement

Engagement and compliance with RFMOs

Guinea joined ICCAT in 1991 and is a member of two panels within the RFMO (tropical tunas and other species).⁷⁰ The country was a member of the IOTC since 2005, however as of 2015 it was in arrears to the tune of US\$143,308.⁷¹ In 2013 Guinea was contacted by the Chair of the Commission to ascertain whether they were still interested in maintaining membership, with a follow up reminder in February 2014. Following this, and a period of inactivity within the IOTC area of competence, the country withdrew its membership from the RFMO in 2016.

According to key informant interviews with a range of stakeholders, including a representative of the Guinean navy, the fishing industry and the government's fisheries resource department, Guinea's general fisheries administration process is reported to have improved since the EU carding. It is noteworthy however that Guinea has fallen short in terms of information submissions to ICCAT (e.g. last catch records to ICCAT were submitted in 2014, in 2017-18 they did not submit any statistical fisheries information and in 2020 it was noted that the country had failed to submit a number of obligatory species check sheets)⁷². Also, Guinea does not seemingly have port data records, which signifies a lack of compliance with ICCAT recording responsibilities.⁷³ Records of non-compliance for Guinea in the ICCAT compliance summary tables demonstrate that Guinea has historically shown a poor record of compliance for all of the categories used by ICCAT (Annual Reports/Statistics, Conservation and Management Measures, Quotas and Catch limits, Other issues). All categories of non-compliance are noted for every year between 2009 and 2019, except for the "other issues" which was highlighted from 2009 onwards until 2012, when Guinean-flagged vessels were noted on the ICCAT IUU list.

Incidences of enforcement

There is limited information available on incidences of enforcement by the Guinean authorities. In the case of the notorious IUU fishing vessel 'F/V Labiko 2', formerly called 'F/V Maine', it was reported by the NGO 'Sea Shepherd' that the Republic of Guinea stripped the vessel of its flag on account of its IUU operations.⁷⁴ In another instance, the Korean-owned trawler 'Mahawa' was found to be illegally operating under both Guinean and Sierra Leonean flags. As a result, the vessel was removed from Sierra Leone's register and fined by the Government of Guinea.⁷⁵

Number and value of sanctions

Key informant interviews suggested that Guinea historically was not active in pursuing sanctions, both before and during carding, and many illegal fisheries activities escaped prosecution. In addition, foreign vessels committing infringements in Guinean waters were often sanctioned with the lowest possible fine foreseen in Guinean law, as also documented by the EU in its carding opinion.⁷⁶ An example of the comparatively low fines in Guinea

68 Food and Agriculture Organization (FAO). Global Record of fishing vessels, refrigerated transport vessels and supply vessels. Available at: <http://www.fao.org/global-record/tool/extended-search/en/>

69 International Maritime Organisation (IMO). (2019). Torremolinos Declaration. Available at: <https://www.wcdn.imo.org/localresources/en/MediaCentre/Documents/Torremolinos%20Declaration.pdf>

70 ICCAT. Contracting Parties. Available at: <https://www.iccat.int/en/contracting.html>

71 IOTC. (2015). Membership of Sierra Leone and Guinea in the IOTC. Available at: <https://www.iotc.org/documents/membership-sierra-leone-and-guinea-iotc-0>

72 ICCAT. (2020). Secretariat's report to the ICCAT conservation and management compliance committee: https://www.iccat.int/com2020/ENG/COC_303_ENG.pdf

73 ICCAT's 2020 data and information submission requirements can be found at: https://iccat.int/Documents/Comply/Guidelines_ENG.pdf

74 Sea Shepherd. (2017). Sea Shepherd assists Liberian Coast Guard in arrest of notorious internationally-blacklisted vessel for illegal fishing. Available at: <https://www.seashepherdglobal.org/latest-news/sola-stella-blacklisted-illegal-fishing/>

75 EJF. (2019). Red flags: the story of the Mahawa and transparency standards in fishing. Available at: <https://ejfoundation.org/news-media/red-flags-the-story-of-the-mahawa-and-standards-of-transparency-in-fishing>

76 Paragraph (163). [https://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:32013D1127\(01\)&from=EN](https://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:32013D1127(01)&from=EN)

is illustrated well when comparing the fine for the forgery of documents, vessel names and markings with neighbouring countries. In Sierra Leone the average fine for such offences was US\$302,000 while in Guinea it was US\$30,000.⁷⁷

The new fisheries legislation in Guinea has, however, seen a significant increase in its rate of sanctioning and the value of fines being issued. For example, in 2018 Guinea imposed two substantial fines on Chinese owned vessels 'Mengxin 18' (€500,000) and 'Lian Run 48' (€50,000, with a final payment made of €40,000) for fishing without a valid licence and fishing using a non-compliant fishing gear, respectively. Since 2018, Guinea has also inspected 121 fishing vessels, 16 of which were ordered to port due to severe infractions (illegal fishing gear, non-compliant meshing, non-declaration of catches, etc.).⁷⁸ Importantly, the Guinean government also publishes details of industrial fisheries offences and the value of sanctions, although information for both of these categories has not been kept up to date, with the last uploads in July 2019 and June 2020 respectively.^{79/80}

Monitoring, control and surveillance changes

Since carding, Guinea has taken a number of steps to improve its MCS capabilities. For example, in December 2017, two coastal radar stations were installed under a Franco-Guinean military cooperation agreement. These radars help "in detecting all shipping activities at sea and collected information is relayed to the Maritime Prefecture operational centre".⁸¹ Furthermore, since the red card was lifted there has been a steady increase in sea patrols in Guinea's EEZ.⁸² The recommended minimum target to deter IUU activities is 220 days of sea patrol per year, with Guinea completing 123 days in 2018, 180 in 2019 and 64 in the first 6 months of 2020.⁸³ There has also been a steady increase in the number of artisanal fishing vessel inspections since 2016.⁸⁴

Beyond its national-level efforts, Guinea has embarked upon a number of regional and inter-regional projects that will be of benefit to its MCS capacities. For example, the Sub-Regional Fisheries Commission (SRFC) has convened with other member countries (Cape Verde, Senegal, Gambia, Guinea-Bissau, Mauritania and Sierra Leone) to discuss surveillance of transshipment activities and cooperation for joint operations in the member countries' EEZs. In addition, Guinea has been collaborating with the European Fisheries Control Agency (EFCA) in joint surveillance operations since 2018. These operations are also a means by which the EU can evaluate areas for capacity building and knowledge transfer in West Africa related to the PESCAO project, which is funding "Improved Regional Fisheries Governance in western Africa" between January 2018 and December 2022.⁸⁵

At the inter-regional level, Guinea continues to participate in the Obangame Express, a U.S. Naval Forces Europe-Africa regional exercise that has been occurring in the Gulf of Guinea for over a decade.⁸⁶ Obangame Express aims at collaboratively addressing joint maritime security concerns in West Africa (IUU fishing being one of them). Similarly, Guinea continues to participate in the Grand African NEMO, a similar regional exercise organised by the French Navy. Furthermore, in 2019 maritime security personnel from Guinea participated in the Interregional Institute for Maritime Security's 5-day training to deepen the fight against IUU fishing. This highlights Guinea's continued efforts to increase capacity related to its maritime security as well as to collaborate with regional partners across West Africa.

77 Doumbouya, A. et al. (2017) Assessing the Effectiveness of Monitoring Control and Surveillance of Illegal Fishing: The case of West Africa. F.M.Sci.

78 Information from an unpublished inspection report shared with the author by a key informant.

79 Guinean Ministry of Fisheries, Aquaculture and Maritime Economy. List of Industrial fishery offences. Available at: <https://www.peches.gov.gn/index.php/pecheadmin/indicpeche/indicateurs#ild-2>

80 Guinean Ministry of Fisheries, Aquaculture and Maritime Economy. Infraction fines received. Available at: <https://www.peches.gov.gn/index.php/pecheadmin/indicpeche/indicateurs#ild-2>.

81 Pramod, G. (2020). 'Guinea – Country Report' in Policing the Open Seas: Global Assessment of Fisheries Monitoring Control and Surveillance in 84 countries. Available at: <https://iuriskintelligence.com/wp-content/uploads/2020/08/Guinea-Country-Report-Global-Fisheries-MCS-Report-2020.pdf>

82 *ibid.*

83 *ibid.*

84 *ibid.*

85 European Fisheries Control Agency (EFCA). (2017) Improved regional fisheries governance in western Africa (PESCAO). Available at: <https://www.efca.europa.eu/en/content/pescao>.

86 DVIDS. (2019). Ten Years of History and Lessons in West African navy maneuvers. Available at: <https://www.dvidshub.net/news/316587/ten-years-history-and-lessons-west-african-navy-maneuvers>

Prevalence

Number of flagged vessels

Data was unavailable on the number of vessels flagged to Guinea pre- and post- carding.

Number of vessels on IUU lists

According to the IUU vessel database of TMT, there are two vessels that were Guinean-flagged at the time of their listing on RFMO IUU lists (ICCAT).⁸⁷ These vessels were the 'Labiko 2' (IMO: 7325756) and the 'Carlos' (IMO: 7234014) elsewhere known as the 'Daniaa', listed on the ICCAT IUU list in 2007 and 2008 respectively. The vessel 'Acros 2' (IMO: 7379345) was said to have carried the flag of Guinea until 16/10/2006, before changing to the flag of Honduras⁸⁸ and being listed on the ICCAT IUU list shortly after on 26/11/2006. As noted in the European Commission implementing decision in which Guinea's red card was announced (2013/C 34 6/02), the vessel 'Kabou' (IMO: 6706084), elsewhere known as 'Red', was granted the Guinean flag following its inclusion on the North East Atlantic Fisheries Commission (NEAFC) IUU list in 2006. Since carding, there have been no additional instances of Guinean-flagged vessels being placed on RFMOs IUU lists according to TMT's database.

Identification by US National Oceanic and Atmospheric Administration (NOAA) for IUU fishing concerns

Guinea has not been identified by NOAA for IUU fishing concerns.

Summary

As this case study has shown, since its cooperation with the EU, Guinea has continued to improve its fight against IUU fishing. The associated changes in legislation have been the catalyst for what appear to be much broader efforts by Guinea to address its problems in the fight against IUU fishing. Indicators point to improvements in numerous outcomes, such as changes in national fisheries legislation, participation in international agreements and initiatives, and improved national MCS measures. While there is still room for improvement, particularly in RFMO compliance, further positive changes can be expected as infrastructure improves and Guinea becomes better equipped to address IUU fishing activities in its waters.

87 Trygg Mat Tracking. Combined IUU Vessel List. Available at: <https://iuu-vessels.org/>.

88 Conflicting information exists as to the flag on this vessel, with IHS Sea-web listing it as flagged to Guinea from 1997 to current.



CASE STUDY

Solomon Islands

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The Solomon Islands is a Pacific Island state with an economically significant tuna fishery. In December 2014, the country was informed by the EU of the possibility of identifying it as a non-cooperating country pursuant to the Regulation and was issued a yellow card. The reasons for carding were extensive, but largely revolved around a significant lack in traceability protocols and data recording, and a poor legal framework to support a worthy fight against IUU fishing, with particular focus on the country's tuna stocks.⁸⁹

The Solomon Islands had its yellow card removed in February 2017. When explaining the reasons for the rescinding of the card, the EU described it as having undertaken a number of positive steps, including significant improvements in its MCS procedures, fishery products traceability and increased cooperation with customs authorities.⁹⁰

⁸⁹ The full list of reasons for the Solomon Islands yellow card can be found here: [https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32014D1213\(01\)&from=EN](https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32014D1213(01)&from=EN).

⁹⁰ The full list of reasons for the lifting of the Solomon Islands yellow card can be found here: https://ec.europa.eu/fisheries/fighting-illegal-fishing-commission-lifts-yellow-cards-curaçao-and-solomon-islands_en

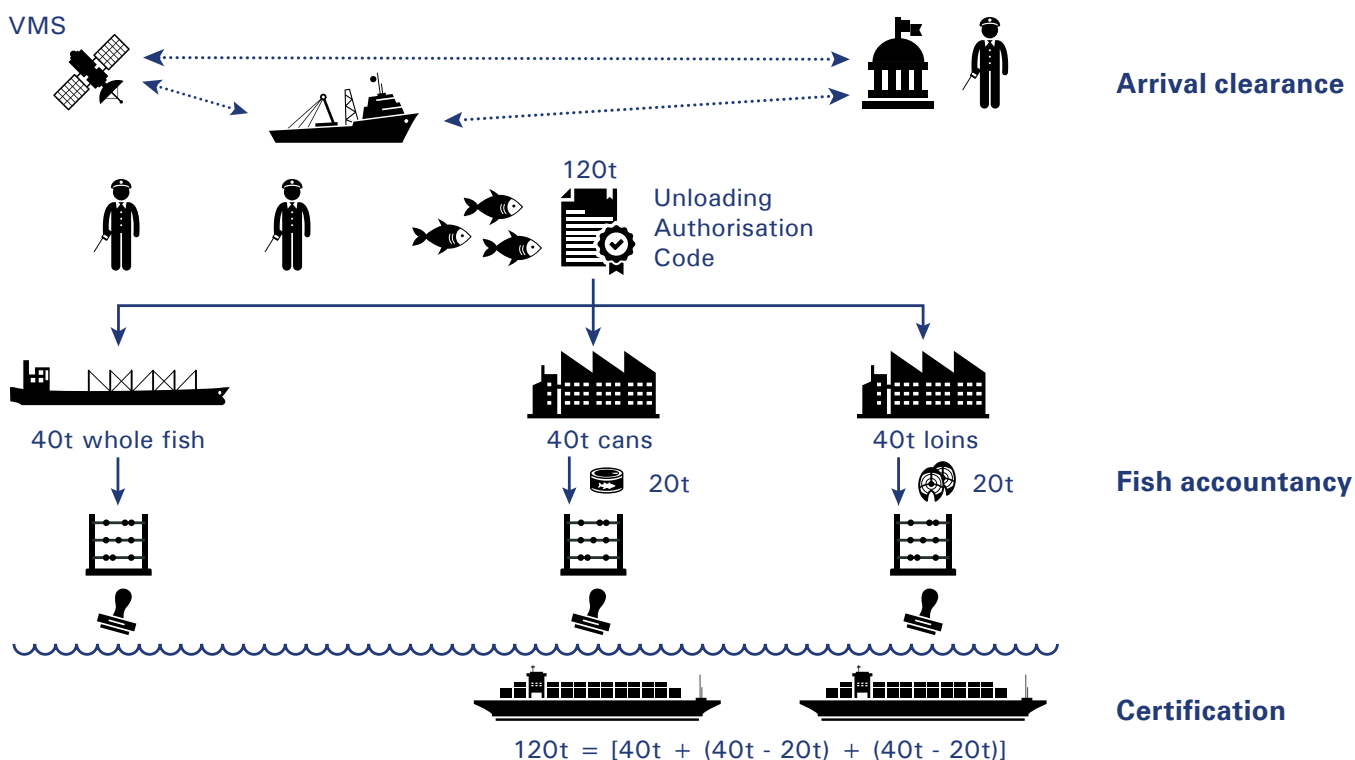
Improvements in fisheries governance

Legislation and Regulation

Institutional and legal framework changes

In 2015, the Solomon Islands developed a new Fisheries Act,⁹¹ aimed at improving processes around fisheries management, especially those relating to the tuna stocks that heavily motivated the carding decision. This has also led to a new Tuna Management and Development Plan that now provides an improved legal framework for management of tuna resources in the Solomon Islands and reflects the reality of its fishing operations, activities and industry.⁹² Considering tuna is the nation's primary export fishery,⁹³ this is an important change that has materialised after the carding. The Tuna Management and Development Plan includes, amongst other things, conservation and management measures at sub-regional level, refined licencing systems, total allowable effort limits and zonal management for both archipelagic waters and EEZs. Key informant interviews with both government and industry actors indicate that the most notable improvements that have come from the changes in these legal frameworks are regulations around data recording for processors which have dramatically increased the traceability of tuna catch. The country has also improved its product traceability with improved catch certification and data recording efforts, via the fisheries management information system (Figure 1). Additionally, the 2015 Fisheries Act saw the adoption of a number of new regulations for the protection of vulnerable coastal species. These include regulations in place to protect humphead wrasse and bumphead parrotfish through the introduction of minimum size limits and fines – though enforcement remains an issue.⁹⁴

Figure 1 | Fisheries Management Information System



Fisheries Information Management Systems diagram that depicts the processes now undertaken by the Solomon Islands to improve product traceability and provenance (note: such systems were largely driven and first established by Papua New Guinea).⁹⁵

91 Solomon Islands Fisheries Management Act. (2015).

92 Solomon Islands Tuna Management and Development Plan. (2014). Available at: <http://macbio-pacific.info/wp-content/uploads/2017/08/Tuna-Development-and-Management-Plan.pdf>

93 Solomon Islands National Fisheries Policy 2019-2029. (2019). Available at: <http://extwprlegs1.fao.org/docs/pdf/sol188935.pdf>

94 Hamilton, R.J., et al. (2019). Community-based management fails to halt declines of bumphead parrotfish and humphead wrasse in Roviana Lagoon, Solomon Islands. Available at: https://www.researchgate.net/publication/332255546_Community-based_management_fails_to_halt_declines_of_bumphead_parrotfish_and_humphead_wrasse_in_Roviana_Lagoon_Solomon_Islands

95 Blaha, F. (2015). The Impact of the EU Yellow Cards in the Pacific. Available at: <http://www.franciscoblaha.info/blog/2015/9/25/the-impact-of-the-eu-yellow-cards-in-the-pacific>

Participation in relevant international agreements and initiatives

Indicator 14.6.1 of the Sustainable Development Goals (SDG) measures “progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing”.⁹⁶ In 2018, Solomon Islands scored a 4 (out of 5) for this indicator which dropped in 2020 to 3,⁹⁷ which equates to a ‘medium implementation of applicable instruments to combat IUU fishing’.⁹⁸

Since its engagement in the carding process, Solomon Islands has participated in the following relevant international agreements and initiatives (date in brackets):

- FAO International Plan of Action on IUU Fishing (2001), leading to the establishment of a NPOA on IUU Fishing (2014).⁹⁹

Compliance and Enforcement

Engagement & compliance with RFMOs

The Solomon Islands is a member of the WCPFC. This RFMO requires 100% observer coverage for its purse seine fleet, which was not achieved until 2012/2013. Since being carded, there is now 100% coverage on the purse seine fleet. There is unfortunately less than 10% coverage on the longline fleet. Overall, the WCPFC compliance monitoring report of 2019 shows that Solomon Islands has had very few non-compliance situations (one noted for missing a VMS reporting deadline).¹⁰⁰

Incidences of enforcement

There is relatively little available data on incidences of enforcement within the Solomon Islands’ EEZ. A recent academic paper¹⁰¹ details a multi-agency response to ‘blue boats’¹⁰² operating within the Solomon Islands’ waters, which saw collaboration between the Royal Solomon Islands Police Force, the Pacific Islands Forum Fisheries Agency (FFA) and the French Government leading to the apprehension of illegal fishers. The paper also suggests that the Solomon Islands’ government has formed a ‘high-level cross-sectoral task force to deliberate on the ways to enhance interagency cooperation and coastal community alertness’ in response to the threat of blue boats. However, it is worth noting that blue boats are considered only a minor issue within the Solomon Islands’ EEZ.

Number and value of sanctions

The Solomon Islands have historically failed to apply fines to vessels known to be breaching fishing regulations. For example, in 2010, a vessel that was caught fishing in Solomon Islands EEZ without a licence was apprehended and reports provided by both the police and fisheries officers concluded they were acting illegally beyond reasonable doubt. However, the vessel was not fined because of administrative difficulties, which showed the vessel had paid the government the previous year for fishing rights. The government therefore decided to let the vessel go without fine based on concerns that the company of ownership would take the Solomon Islands government to court.¹⁰³ The exact circumstances around this event are somewhat unclear, and appear to have been exacerbated by a lack of communication within the relevant Solomon Islands government departments.¹⁰⁴

96 UNSTATS. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing.

97 UNSTATS. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing. Available at: <http://www.fao.org/sustainable-development-goals/indicators/1461/en/>

98 World Bank Group. (2021). SDG Metadata Translation Project: Indicator: 14.6.1. Available at: <https://worldbank.github.io/sdg-metadata/metadata/en/14-6-1>

99 The NPOA document is, however, not public. Considering this happened the same year as the carding (which happened in December) it is likely that this NPOA was already underway before the carding was given to Solomon Islands. The Solomon Islands government also wrote a National Plan of Action (NPOA) in 2010[1] which is widely available, but this does not cover IUU and is mainly about coral reef conservation initiatives as part of the Coral Triangle Initiative.

100 Western and Central Pacific Fisheries Commission (WCPFC). (2019). Final Compliance Monitoring Report. Available at: <https://www.wcpfc.int/doc/wcpfc17-2020-fcmr/2020-final-draft-compliance-monitoring-report-covering-2019-activities-adopted>

101 Song, A. M. et al. (2019) ‘Blue boats’ and ‘reef robbers’: A new maritime security threat for the Asia Pacific? *Asia Pacific Viewpoint*. 60 (3). 310-324.

102 Blue boats is a term used to describe small wooden hulled Vietnamese fishing vessels that have been known to illegally enter EEZs and target high-value species.

103 Solomon Star. (2010) Solomon Minister explains why IUU tuna vessels were released without penalty. Available at: <http://www.atuna.com/archive.php?article=8150>

104 Solomon Times. (2010). Police in breach of fisheries act: Leni. Available at: <https://www.solomontimes.com/news/police-in-breach-of-fisheries-act-leni/4958>

Whilst it was not possible to obtain data on sanctions and fines issued by the Solomon Islands, key informant interviews highlighted that rules have become more stringent with regards to applying sanctions that are also thought to be higher in recent years. This would make sense based on the carding and the efforts that the Solomon Islands have invested in fulfilling the EU's directions outlined in the carding (one point of which states an improvement in the sanctioning process).

Monitoring, control and surveillance changes

There have been a number of marked improvements in the Solomon Islands MCS procedures and capacities since the carding process. Arguably one of the greatest successes of Solomon Islands' engagement in the carding process are the improvements made in human capacity. The Ministry of Fisheries and Marine Resources (MFMR) more than doubled the numbers of its fisheries officers in 2016. Both government and industry key informants, as well as other existing research,¹⁰⁵ suggest that the improvements in human capacity are largely attributed to the EU's yellow card process.

The Solomon Islands is also party to the South Pacific Forum Fisheries Agency Convention (FFA Convention)¹⁰⁶ and a member of the Parties to the Nauru Agreement (PNA), which oversees the largest tuna purse seine fishery in the world.¹⁰⁷ More specifically, a key measure for advancing sustainability has been the Vessel Day Scheme (VDS), whereby PNA members agree upon annual restrictions to the number of fishing days, based on scientific tuna stock assessments.¹⁰⁸ The success of which has been so clear (delivering greater income to PNA countries and enhancing fisheries MCS) that it has since inspired the introduction of a Longline VDS which aims to bring an end to tuna transshipment on the high seas, tackle low-levels of observer coverage and increase the quality of catch reporting.¹⁰⁹ However, more should be done to ensure the VDS is used legitimately and effectively (e.g. at the moment companies can buy vessel days at the start of each year regardless of if they are used or not, and there are currently no requirements around observer coverage). So although helpful, they cannot address the issues alone.

Conversely, since the carding, the Solomon Islands require 100% inspections for foreign-flagged and local tuna vessels at landing and vessels are also inspected based on safety and navigational standards. There is also now an annual inspection plan with inspection targets for each fleet focusing on different areas. Data concerning vessel inspections at sea, however, is not publicly available.

Prevalence

Number of flagged vessels

As of 2017, Solomon Islands had 10 flagged fishing vessels. Seven of which operate in archipelagic waters and the other 3 in PNA waters.¹¹⁰ There are no Solomon Islands vessels operating on the high seas.

Number of vessels on IUU lists

According to the IUU vessel database of TMT there are no Solomon Islands vessels listed on RFMO IUU lists.¹¹¹ The EU note that "no evidence of past cases of Solomon Islands-flagged vessels exists that would enable an analysis of the performance of Solomon Islands with respect to recurring IUU fishing activities (in accordance with Article 31(4)(a) of the IUU Regulation)".¹¹²

105 Pramod, G. (2017). 'Solomon Islands – Country Report' in Policing the Open Seas: Global Assessment of Fisheries Monitoring Control and Surveillance in 84 countries. Available at: <https://iuriskintelligence.com/wp-content/uploads/2019/05/Solomon-Islands-country-Report-Global-Fisheries-MCS-Report-2017.pdf>

106 South Pacific Forum Fisheries Agency Convention. (1979). Available at: <http://www.fao.org/3/Y4698B/y4698b0m.htm>.

107 Parties to the Nauru Agreement. About PNA. Available at: <https://www.pnatuna.com/index.php/content/about-pna>

108 The Parties to the Nauru Agreement. The PNA Vessel Day Scheme. Available at: <https://www.pnatuna.com/index.php/content/pna-vessel-day-scheme>.

109 EJJ, Oceana, The Pew Charitable Trusts and WWF. (2016). Improving performance in the fight against illegal, unreported and unregulated (IUU) fishing. Available at: http://www.iuuwatch.eu/wp-content/uploads/2015/06/3rdCountryCardingGuidelinesReport_FINAL.LOW_.pdf

110 *ibid.*

111 Trygg Mat Tracking. Combined IUU Vessel List. Available at: <https://iuu-vessels.org/>.

112 Commission Decision of 12 December 2014 notifying a third country that the Commission considers as possible of being identified as non-cooperating third country pursuant to Council Regulation (EC) No 1005/2008 establishing a Community system to prevent, deter and eliminate illegal, unreported and unregulated fishing. Available at: <https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?from=EN&uri=CELEX%3A32014D1213%2801%29>

Identification by US National Oceanic and Atmospheric Administration (NOAA) for IUU fishing concerns

The Solomon Islands have not been identified by NOAA for IUU fishing concerns.

Summary

As this case study has shown, Solomon Islands has improved its approach to tackling IUU fishing. The most significant changes revolve around policy updates (i.e. the rewrite of the Fisheries Act and associated regulations), data capture and recording. These were driven both by the Solomon Islands government in response to the carding but also by collaboration with other agencies (in particular the FFA). The Fisheries Bill and Tuna Management plans that occurred post-carding have led to an increase in the fisheries management workforce, which has added to the in-country capacity to deal with IUU activity.



CASE STUDY

Thailand

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Thailand's fishing industry has been marred by rampant IUU fishing and human rights abuses, including the physical and verbal abuse of crew.¹¹³ As a result of these, and other perceived governance failures, Thailand was informed in April 2015 by the EU of the possibility of being identified as a non-cooperating country pursuant to the Regulation, and was issued a yellow card. The list of failings provided by the EU was extensive, and included instances of Thai vessels operating without valid licences and the presentation of erroneous information to obtain catch certification. Additionally, Thai authorities have 'no legal basis to inspect, sanction or refuse access of third country vessels into Thai ports'.¹¹⁴

Thailand had its yellow card removed in January 2019. When explaining the reasons for the rescinding of the card, the EU described Thailand as having undertaken a number of positive steps including a comprehensive review of its legal framework relevant to fisheries, strengthening its MCS tools and the improvement of administrative procedures.¹¹⁵

113 Human Rights Watch. (2018). Hidden chains: rights abuses and forced labor in Thailand's fishing industry. Available at: <https://www.hrw.org/report/2018/01/23/hidden-chains/rights-abuses-and-forced-labor-thailands-fishing-industry>

114 The full list of reasons for Thailand's yellow card can be found here: [https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32015D0429\(02\)&from=EN](https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32015D0429(02)&from=EN)

115 The full list of reasons for the removal of Thailand's yellow card can be found here: https://ec.europa.eu/commission/presscorner/detail/pt/memo_19_201

Improvements in fisheries governance

Legislation and Regulation

Institutional and legal framework changes

Numerous improvements in Thailand's regulatory framework have taken place since initial carding. These include a substantive revision of its fisheries legal framework: One change was the enactment of the new Thai Fisheries Law, Royal Ordinance on Fisheries 2015 (and amendment in 2017). Comprehensive in scope, it is a legal framework that focuses on deterrence and prevention of IUU fishing but also on marine resources conservation and management. This legislation covers: fishing vessel registration, fishing license system, VMS, vessel inspection, crew inspection, catch inspection, traceability system, and high penalty fees and deterrent sanctions. Beyond this, Thailand also established a National Fishery Policy Committee to determine fisheries policies and supervise fisheries management for the development of fisheries in Thai waters, fisheries outside Thai waters, aquaculture and fisheries industries, and to ultimately decide on their approval. Commercial fisheries that operate beyond the coastal sea are the main focus of the fishery management program.

These changes were significant given the previous context. In 2015 the then EU Commissioner for the Environment, Marine Affairs and Fisheries stated that "There are no controls whatsoever and no efforts being made whatsoever and illegal fishing is almost totally allowed."¹¹⁶ This sense of a lack of control and enforcement is encapsulated by one key informant who stated "there weren't a lot of rules that could be breached", with another describing the change as tantamount to "Thai fishery policy doing a big U-turn on capture fishery from soft regulated open access fishery to strict regulated open access fishery".

Thailand's electronic traceability system that arose as part of this revised legal framework was implemented in 2017. The system produces electronic Catch Certificates for exporters. There is little public data available on the number of catch certificates produced. However, in its 2019 analysis of Thailand's electronic traceability system, the United States Agency for International Development (USAID) spoke of its significant success: "The DOF [department of fisheries] has developed an electronic traceability system that can store complete, accurate, and consistent KDEs [key data elements] in accordance with important CTEs [critical tracking events] in the Thai seafood traceability process. CTEs are supply chain events recorded to allow for effective tracing and tracking back products throughout the supply chain. KDEs are the details that describe or define that event and inform the 'who, what, when, where, why and how' of the seafood supply chain. Both must be captured adequately (accurately, verifiably, securely, and in a timely manner) within the eCDT [Electronic Catch Documentation and Traceability] system to enable traceability."¹¹⁷

Participation in relevant international agreements and initiatives

Indicator 14.6.1 of the Sustainable Development Goals (SDG) measures "progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing."¹¹⁸ In 2020, Thailand scored a 5 (out of 5) for this indicator,¹¹⁹ which equates to a 'very high implementation of applicable instruments to combat IUU fishing'.¹²⁰

116 The Guardian. (2015). EU threatens Thailand with trade ban over illegal fishing. Available at: <https://www.theguardian.com/environment/2015/apr/21/eu-threatens-thailand-with-trade-ban-over-illegal-fishing>

117 USAID. (2019). Thailand CDT Gap Analysis. Available at: https://www.seafdec-oceanspartnership.org/wp-content/uploads/USAID-Oceans_Thailand-CDT-Gap-Analysis_June-2019_final.pdf

118 UNSTATS. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing.

119 UNSTATS. (2020). Indicator 14.6.1: Progress by countries in the degree of implementation of international instruments aiming to combat illegal, unreported and unregulated fishing. Available at: <http://www.fao.org/sustainable-development-goals/indicators/1461/en/>

120 World Bank Group. (2021) SDG Metadata Translation Project: Indicator: 14.6.1. Available at: <https://worldbank.github.io/sdg-metadata/metadata/en/14-6-1/>

Since its engagement in the carding process, Thailand has participated in the following relevant international agreements and initiatives (date in brackets):

- FAO International Plan of Action on IUU Fishing (2001), leading to the establishment of a NPOA on IUU Fishing (2015).¹²¹
- PSMA (2016).
- UN Fish Stocks Agreement (UNFSA) (2017).
- Global Record of Fishing Vessels, Refrigerated Transport Vessels and Supply Vessels (last vessel record updated 05/02/21).¹²²

Compliance and Enforcement

Engagement and compliance with RFMOs

In terms of engaging with relevant RFMOs, Thailand has been a member of the IOTC since 1997.¹²³ In 2017, it joined the Southern Indian Ocean Fisheries Agreement (SIOFA).¹²⁴ The country is also a cooperating non-member of the WCPFC.¹²⁵

In 2018, the IUU Fishing Index scored Thailand poorly for its compliance with RFMOs. This suggests that in the previous years there was still room for improvement in terms of ensuring Thailand complies with its IUU fishing state obligations (scoring a 4, which means it is listed in multiple RFMOs compliance reports under either reporting or CMMs as not being compliant with RFMO flag-related obligations).¹²⁶ Thailand scores better for compliance with RFMO port State obligations (scoring the highest possible, 1, meaning no listing as non-compliant).

However, more recent data points to positive changes in compliance. Compliance reports for IOTC provide information on the extent its members comply with the following categories (both in timeliness and content): Implementation obligations, Management Standards, Reporting on Vessels, Vessel Monitoring System, Mandatory statistical requirement, Implementation of mitigation measures and bycatch of non-IOTC species, IUU Vessels, Transshipments, Observers, Statistical document programme, Port inspection and Market. The coding system they use is the following: Compliant; Partially Comply; Non-compliant; Late (timeliness only); and Not Applicable. In 2013, Thailand's was 31% and 40% compliant based on timeliness and content respectively. By 2020, the country was 98% and 92% respectively, showing a marked improvement in the periods pre- and post- carding.

Incidences of enforcement

As of July 2018, Thailand has identified and sanctioned 1098 commercial-sized vessels without fishing licenses.¹²⁷ These include a number of high-profile instances where vessels thought to be engaged in IUU fishing have been duly investigated, sanctioned and in some instances destroyed.

Number and value of sanctions

A definitive dataset of sanctions before and after carding was not available for this study. However, there are pieces of information that point to substantial increases in sanctions. These include when Thailand's Department of Fisheries stated that they have prosecuted more than 4,200 IUU cases since 2015 and that in 2018 more than

¹²¹ Government of Thailand. (2015). Thailand National Plan of Action to Prevent, Deter and Eliminate Illegal, Unreported and Unregulated Fishing (Thailand NPOA-IUU) 2015 – 2019. Available at: https://www.iotc.org/sites/default/files/documents/2015/10/IOTC-2015-WPDCS11-INF05_-_Thailand_NPOA_IUU.pdf

¹²² Thailand has only signed regarding the Vessel Data component of the programme.

¹²³ IOTC. Structure of the Committee – Commission Contracting Parties (Members). Available at: <https://www.iotc.org/about-iotc/structure-commission>

¹²⁴ Southern Indian Ocean Fisheries Agreement (SIOFA). Available at: <https://www.apsoi.org>

¹²⁵ Western and Central Pacific Fisheries Commission (WCPFC). About WCPFC. Available at: <https://www.wcpfc.int/about-wcpfc>

¹²⁶ IUU Fishing Index. Country profile – Thailand. Available at: <https://iuufishingindex.net/profile/thailand>

¹²⁷ Euractiv. (2018). Thailand confident to ban illegal fishing, forced labour by end of year, says ambassador. Available at: <https://www.euractiv.com/section/agriculture-food/news/thailand-confident-to-ban-illegal-fishing-forced-labor-by-end-of-year-says-ambassador/>

€3 million of fines were delivered for overseas fleet violations.¹²⁸ One specific example of sanctions imposed relates to logbook violations, where a fishing vessel was fined over €13,000 for this violation.¹²⁹

Monitoring, control and surveillance changes

The transformation of the fisheries policy and legal framework has led to the considerable expansion of Monitoring, Control and Surveillance tools. Improvements include:

- The introduction of port-in and port-out (PIPO) controls.
- At-sea and in-port inspections.
- Air monitoring.
- Inspection of labour conditions.
- Remote monitoring by the Fisheries Monitoring Centre (FMC) using modernised databases and IT systems.
- The establishment of 30 Port In / Port Out (PIPO) centres alongside 19 Forward Inspection Points to inspect Thai fishing fleets prior- and after- fishing.
- Mandatory Vessel Monitoring Systems for its commercial fleet (for vessels over 30 gross tonnes). These tools provide the foundation for better enforcement of IUU-related legislation.
- MCS for overseas fishing using E-reporting systems (E-logbook).
- CCTV to record fishing and transshipping activities.
- Drum-rotation sensors used to monitor the application of fishing gear.
- Hatch sensors used to monitor the occupation of fish holds in the vessel.
- Initiated the establishment of ASEAN network for combating IUU Fishing (or AN-IUU), which aims to support the MCS cooperation among ASEAN member States in fighting against and prosecuting IUU fishing vessels in the region.

To implement these drastic changes in policy, significant restructuring of governmental departments were made and greater resources were directed to where it believed it would be effective. There has been an increase in training (with the help of the European Union), which has meant greater capability of enforcing the law.

- As of July 2018, under the multidisciplinary working approach, 13 police officers have been deployed to work full-time supporting initial implementation at the new Fisheries Monitoring Center.
- There are now more than 4,000 officers working in MCS, emphasising a growing commitment to “help detect, deter, and stop IUU fishing.”¹³⁰
- A national Observer Onboard Program was established under the Marine Fisheries Management Plan. 20 observers were trained by the Department of Fisheries in September 2015, with 30 more following in April 2016 and another 30 in August-September 2017. The first on-board deployment of observers on Thai vessels in the high seas took place in July 2016.

¹²⁸ Thailand Department of Fisheries. (2020). Thailand's success in Combating IUU fishing. Available at: https://www4.fisheries.go.th/dof_en/view_message/232

¹²⁹ Amfori. (2018). Progress in the Thai Fisheries Sector. Available at: <https://www.amfori.org/news/progress-thai-fisheries-sector>

¹³⁰ Politico. (2018). Thailand's fight to eliminate illegal activity and promote human rights in the fishing industry. Available at: <https://www.politico.eu/sponsored-content/thailands-fight-to-eliminate-illegal-activity-and-promote-human-rights-in-the-fishing-industry/>

Prevalence

Number of flagged vessels

According to the Fishing and Fleet Management Division, Thailand's commercial vessel fleet decreased from 25,002 in 2015¹³¹ to 10,376 in 2020.

Number of vessels on IUU lists

According to the IUU vessel database of TMT, Thailand did not have a vessel listed in any RFMO vessel list when initially carded, and has not had any vessels added since.

Identification by US National Oceanic and Atmospheric Administration (NOAA) for IUU fishing concerns

Thailand has not been identified by NOAA for IUU fishing concerns.

Summary

Thailand has undertaken a significant transformation in relation to how it approaches fisheries governance since its yellow carding in 2015. In the years that followed, there were notable improvements in fisheries legislation and regulation. Indicators, such as RFMO compliance and number/value of sanctions, point to a considerable improvement in compliance and enforcement. In terms of prevalence, the reduction in vessel numbers may bring with it an inherent reduction in IUU fishing. Other prevalence indicators showed little or no change, however this was because it was not possible (e.g. presence on IUU vessel lists, as no Thai vessels featured on the list before carding).

¹³¹ Government of Thailand Fishing and Fleet Management Division. (2015). Available at: https://www.fisheries.go.th/strategy-stat/themeWeb/books/2558/2/Vessel2558_rev071160.pdf



Discussion

Changes in fisheries governance in carded countries

All countries analysed have shown demonstrable changes following carding from the EU. Improvements have been made and indicators point to real, tangible change, with the EU carding scheme appearing most effective at improving legislative arrangements in non-cooperating countries. Even if some of these processes were occurring before the carding, evidence suggests that, without exception, carding catalysed change in the case study countries. However, the EU and other stakeholders should continue to closely monitor, and maintain dialogue with these countries, reflecting the fact that the fight against IUU fishing requires long term commitment and does not stop when a card is lifted – demonstrated by the recent re-carding of Panama in December 2019¹³² and Republic of Ghana in June 2021.¹³³ Improving transparency around post-carding dialogues and missions, including making publicly available resources and documentation would be of great benefit to other actors with an interest in the journey and performance of previously carded countries, and would better demonstrate the EU's ambitions for making lasting changes in its bilateral dialogues on IUU fishing.

Noticeably, the first action every country took upon carding was to implement large-scale legislative changes around its fisheries. These significant changes represented fundamental transformations in how fisheries were governed and managed. Within a year of carding, the process of legislative change had begun for all countries (Belize's High Seas Fishing Act 2013, Guinea's Marine Fisheries Code, Thailand's Thai Fisheries Law, Royal Ordinance on Fisheries 2015, Solomon Islands Fisheries Bill and Tuna Management and Development Plan 2014). Whilst legislative changes do not necessarily entail tangible changes on the ground in terms of compliance and enforcement, these fundamental shifts are hugely important as a demonstration of intent and represent a foundation for tackling IUU fishing.

Broadly speaking, there were also notable improvements in MCS capabilities. Legislative changes led to further resources allocated for MCS purposes and to 'more eyes on the sea'. In Belize, Guinea and Thailand, a Fisheries Monitoring Center was established. While data is limited on the exact number and value of sanctions imposed by each country, what evidence there is points to an increase in both the number and value of these sanctions.

An interesting divergence between case studies was the extent to which compliance with RFMOs improved. For Thailand, observing the change within the IOTC before and after its yellow carding, it is clear there is a substantial shift towards much better compliance with the RFMO's measures and regulations. Belize achieved some improvements with regard to IOTC and ICCAT documentation, but not to the extent of those shown by Thailand. In contrast, Guinea appears to have continued a chequered history of RFMO engagement (consistently not provided data, likely due to a lack of in-country monitoring and recording capacity), whilst the Solomon Islands remains somewhat more difficult to assess given the divergent interpretations of WCPFC jurisdictions that exist amongst many Pacific nations.

Another contrast between case studies involves the extent in which countries have signed up to relevant international agreements or supported relevant initiatives following carding. Whilst it is too simplistic to say an increase in the number of agreements correlates to the level of improvement in tackling IUU fishing, it is interesting to observe how countries like Thailand sought to again lead the way by participating in international agreements as part of its transformation in fisheries governance which was undertaken with the support of industry and NGOs.

It is clear that engagement with the EU through the carding process has led to an increase of in-country capacity. This is both in terms of workforce (numbers working in fisheries management and control units) and education/knowledge to fight IUU. This capacity has often been driven by injections of technology like VMS systems, surveillance programs and traceability initiatives. For Belize and Guinea the increased awareness and education appears to have resulted in an assertiveness regarding sanctioning of IUU fishing activities with increased sanctions and better enforcement. It appears that the EU carding process therefore not only catalyses change in terms of capacity within-country but also empowers countries to act to enforce governance in their waters.

¹³² European Commission. (2019). Commission notifies the Republic of Panama over the need to step up action to fight against illegal fishing. Available at: https://ec.europa.eu/commission/presscorner/detail/en/IP_19_6755

¹³³ European Commission. (2021). Commission issues a warning (so-called yellow card) to the Republic of Ghana. Available at https://ec.europa.eu/commission/presscorner/detail/en/ip_21_2745

Social, ecological and economic benefits of improved governance

Whilst not covered explicitly in the IUU dialogues with the EU, there are a number of feasible positive side-effects of anti-IUU measures – including the potential to maintain or restore ecosystem health, with the associated social benefits that may arise (i.e. improved food and livelihood security). Given that the carding process is relatively new and the timescale for social, ecological and economic changes resulting from policy decisions may take years, if not decades, to manifest, it is difficult to attribute specific changes to the carding scheme. However, there are potential links that can be made between outcomes of the carding process and existing or future social, ecological and economic benefits.

For example, it is possible to infer that positive social impacts may arise from changes in fisheries governance following engagement in the carding scheme. A number of the case study countries have been observed to have issues around labour conditions on board their fishing vessels, particularly the larger industrial fleets. Thailand for example has in its past been associated with systemic human rights abuses occurring on its fishing fleet, an issue that is said to go hand in hand with IUU fishing.¹³⁴ It is conceivable that improvements made to tackle IUU fishing may cross into the sphere of improving the situation around poor labour conditions and other associated human rights abuses. For example, where countries ratified the PSMA following carding (as seen in the case of Guinea and Thailand), the increased capacity to inspect suspected IUU vessels could increase the likelihood of identifying human rights abuses on board fishing vessels.

Attributing any change in policy or governance to changes in ecology can be difficult due to the complexity of most ecological processes, the wide range of other variables at play and the potential spatial and temporal distance between cause and effect. Broadly speaking however, there are established links between IUU fishing activities and adverse impacts on the health of the ocean and its biodiversity,¹³⁵ and as such any successful attempts at reducing IUU should feasibly have a net positive effect on ocean health. Furthermore, the carding scheme also likely led in a number of instances to a reduction in fishing pressures, specifically the rapid decrease of fishing pressures exerted by Thailand on the global ocean and the departure of EU vessels from the EEZ of Guinea, which could contribute to the replenishing of fish stocks.

We might also make preliminary connections between the impacts of the carding scheme and economic benefits that can be derived at both national and local scales. IUU fishing comes with huge associated costs felt globally, and deprives local economies of jobs, income, tax revenues and other fiscal benefits,¹³⁶ meaning that successful anti-IUU measures arising from the carding process should enable the recovery of this lost income. From the above case studies, we can see in more detail how the carding scheme can assist countries to generate finances, for example Guinea's increased value of sanctions and the Solomon Islands introduction of the VDS. Moreover, in the Solomon Islands, changes that likely arose, at least in part, from engagement with the EU led to job creation through doubling the number of fisheries officers. Likewise in Thailand, there are now more than 4,000 officers working in MCS.

At the local level, small-scale fishers (particularly those in developing nations) are increasingly finding their access to fisheries resources diminished, in terms of both quality and quantity. This is in large part due to overfishing, IUU fishing and imbalances of power.¹³⁷ By reducing the prevalence of IUU fishing, access to fisheries resources should increase with concomitant economic benefits for fishers and fishing communities more broadly. Similarly linked to the pressures exerted by IUU fishing and overfishing, some communities are having to purchase industrially caught fish at inflated prices.¹³⁸ This creates additional financial burdens for communities that in many instances are already faced with high rates of poverty and marginalisation.

134 Greenpeace International. (2016). Turn the tide. Human rights abuses and illegal fishing in Thailand's overseas fishing industry. Available at: <https://storage.googleapis.com/planet4-southeastasia-stateless/2019/04/a99d5300-a99d5300-turn-the-tide.pdf>

135 EJF, Oceana, The Nature Conservancy, The Pew Charitable Trusts and WWF. Illegal, Unreported and Unregulated Fishing and the European Green Deal. Advancing the EU Biodiversity Strategy for 2030. Available at: <http://www.iuuwatch.eu/wp-content/uploads/2020/09/EU-IUU-Coalition-Biodiversity-Policy-Brief-final.pdf>

136 Sumaila, U.R et al. (2020). Illicit trade in marine fish catch and its effects on ecosystems and people worldwide. *Science Advances*. 6 (9).

137 Fabinyi, M., Dressler, W. and Pido, M. (2019). Access to fisheries in the maritime frontier of Palawan Province, Philippines. *Singapore Journal of Tropical Geography*. 40 (1). 92-110.

138 Nolan, C. (2019). Power and access issues in Ghana's coastal fisheries: A political ecology of a closing commodity frontier. *Marine Policy*. 108 (103621).

Impacts of the EU carding scheme

This report has built on previous case studies to show that the EU Carding scheme, and the bilateral dialogues it initiates have had positive effects on a range of fisheries governance measures in carded countries, in particular improvements to institutional and legal frameworks and strengthening MCS capacity. In assessing the changes in the case studies and exploring how much this change was attributable to the EU, a few noticeable strengths of the carding scheme emerged:

- Reputational impact: Given its standing in global fisheries as a respected international player, to be engaged in a formal dialogue by the EU is seen as detrimental to a nation's reputation. Particularly in the cases of Belize and Thailand, key informant interviews with government officials indicated that the reputational impact was deemed more important than the economic ramifications of carding.
- The carding scheme brings the issue of IUU fishing into mainstream discourse, generating pressure to act both within the country and internationally, potentially acting as a catalyst for change. This can empower NGOs and activists in the country, and encourage progressive voices in the government to redirect resources. The foregrounding of IUU fishing amongst national discourse may also make authorities more cognisant and receptive to broader sectoral challenges, e.g. fishing vessel safety and the ratification of relevant instruments. This was particularly so in the case of Thailand, and for Belize and Guinea in signing the Torremolinos Declaration which indicates an intention to ratify the IMO Cape Town Agreement on fishing vessel standards and crew safety.
- The message of the carding scheme is simple: A yellow card is a threat to withhold market access, and a red card is the actual withholding of this access. Even if the economic ramifications are not necessarily too detrimental in some cases, given the limited exports to the EU or lack of EU vessels paying to fish in their waters, the clarity of the cardings has stimulated actions from the four case study countries.
- Capacity building is central to the formal dialogues with the EU. Implicit in it is technical assistance and a path to a formal bilateral engagement. The combination of capacity building and dialogue throughout all stages of the carding process is more likely to lead to real and long lasting changes in fisheries governance and ultimately bolster national, regional and global efforts to end IUU fishing.



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Recommendations

- **The European Commission should maintain the use of the carding scheme to promote better global fisheries governance.**

To do so, the European Commission should ensure that relevant teams are resourced and funded adequately.

- **The EU should work internationally to explore the potential of expanding the carding system, or similar trade-based mechanisms, to be adopted by other market States to multiply the effect of possible trade measures.**

Whilst the EU carding scheme has proven effective at improving fisheries governance in non-EU countries, there exists a risk that fish potentially caught through IUU means may be diverted to alternative markets. The possible benefits that could arise from the expansion and harmonisation of market based anti-IUU mechanisms have been acknowledged elsewhere, including academic studies on the EU IUU Regulation,¹³⁹ on carding schemes¹⁴⁰ and on anti-IUU trade measures more broadly.¹⁴¹ As such, the EU should work alongside other key market States to explore the potential uptake of similar, and aligned, trade-based measures to end IUU fishing.

- **The EU's engagement and assistance with countries during the carding process is an asset that should be further strengthened. Though trade based measures can be an effective means of improving fisheries governance, it is the dialogue, capacity building and technical support offered by the EU which is fundamental to the success of the carding scheme and all such endeavours to end IUU fishing.**

These aspects not only increase the likelihood of positive change occurring, but also of it being sustained. Moving forward however, the EU should deepen further its technical assistance provided to developing countries to ensure they have the necessary skills and technology to manage their fisheries sector and address concerns raised by the EU.

- **The process through which countries are identified for evaluation and IUU fishing dialogues should be as transparent as possible without jeopardising dialogues.**

When the carding system was introduced, a common complaint of carded countries and industry was that the process by which the EU selected countries for IUU fishing dialogues, and the progress of these dialogues, lacked transparency. The EU now provides regular updates on the carding scheme to industry and NGOs through formal Advisory Councils, in particular the Long Distance Advisory Council and the Market Advisory Council. This process positively helps to guide industry and civil society efforts to engage non-EU countries and encourage appropriate reforms. This process is important in ensuring transparency in the process and should be maintained.

- **The EU should use all available avenues, including those outside the carding process, to encourage third countries to adopt measures aimed at increasing transparency in the fishing sector.**

In its most recent report¹⁴² to the European Parliament and the Council on the implementation of the EU IUU Regulation, the European Commission identifies weaknesses in third country fisheries governance

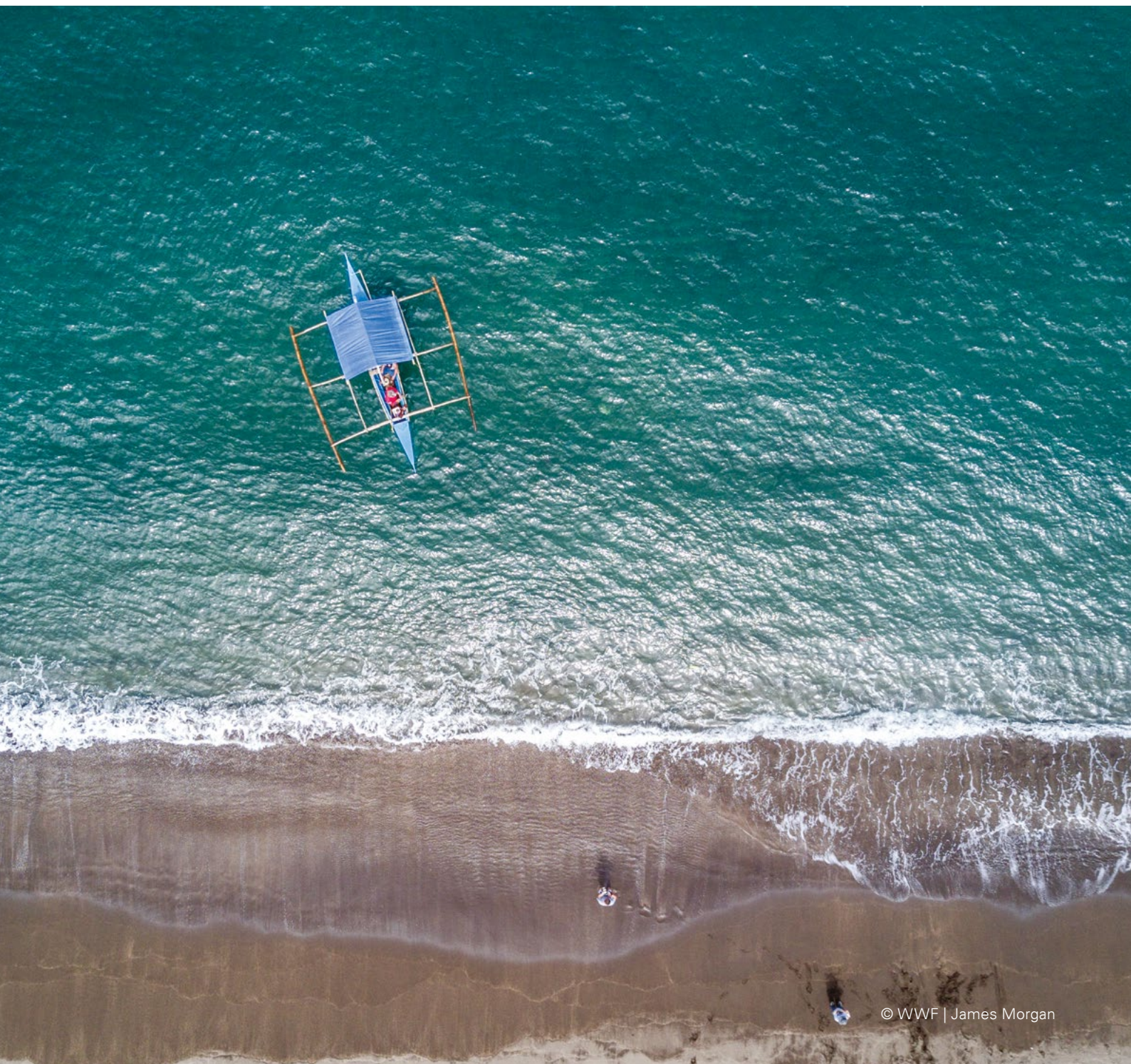
¹³⁹ Leroy, A., Galletti, F. and Chaboud, C. (2016). The EU restrictive trade measures against IUU fishing. *Marine Policy*. 64. 82-90.

¹⁴⁰ Sumaila, U. R. (2019). A Carding System as an Approach to Increasing the Economic Risk of Engaging in IUU Fishing?. *Frontiers in Marine Science*. 6 (34), 1-9.

¹⁴¹ See: Garcia, S., Barclay, K. and Nicholls, R. (2021). Can anti-illegal, unreported and unregulated (IUU) fishing trade measures spread internationally? Case study of Australia. *Ocean and Coastal Management*. 202 (105494) and He, J. (2018). From country-of-origin labelling (COOL) to seafood import monitoring program (SIMP): How far can seafood traceability rules go? *Marine Policy*. (96). 163-174.

¹⁴² European Commission. (2020), Report From the Commission to the European Parliament and the Council on the application of Council Regulation (EC) No 1005/2008 establishing a community system to prevent, deter and eliminate illegal, unreported and unregulated (IUU) fishing (the IUU Regulation). Available at: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2020:0772:FIN:EN:PDF>

systems that pose serious challenges to the implementation of the EU IUU Regulation.¹⁴³ These include the slow ratification of the PSMA, the lack of publicly available information on other countries' fleets, transparency on beneficial ownership in RFMOs as well as the use of flags of convenience in the fishing sector. The EU should use all available means, such as participation in RFMOs and Sustainable Fisheries Partnership Agreements, to encourage flag, port, coastal and market States to adopt measures designed to increase transparency in the fishing sector, including on vessels' identities, activities, catch and owners. The EU IUU coalition has developed 30 good governance criteria¹⁴⁴ aiming to provide guidance on such measures. As part of this, it is important that the EU itself fully implements its own commitments to transparency in its fishing fleet and waters.



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143 European Commission. (2020), Report From the Commission to the European Parliament and the Council on the application of Council Regulation (EC) No 1005/2008 establishing a community system to prevent, deter and eliminate illegal, unreported and unregulated (IUU) fishing (the IUU Regulation). Available at: <https://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2020:0772:FIN:EN:PDF>

144 http://www.iuuwatch.eu/wp-content/uploads/2019/10/Transparency-good-governance-criteria_EU-IUU-Coalition.pdf

Appendices

Appendix 1: List of data sources used to conduct research

Data Source
FAO Global Record of Fishing Vessels, Refrigerated Transport Vessels and Supply Vessels
FAO Compliance Agreement
FAO Fisheries and Aquaculture Statistics
FAO Global Record of Fishing Vessels, Refrigerated Transport Vessels and Supply Vessels
FAO NFIS 2020
FAO Port State Measures Agreement
Global Initiative IUU Fishing Index
Government Documentation from case study countries
IMO 2019 Torremolinos Declaration
International Labour Organization's Work in Fishing Convention, 2007 (No.188)
Key informant interviews
Media sources
NGO Literature
NOAA Reports
RFMO Documentation (Compliance reports, Meeting reports)
Trygg Mat Tracking IUU vessel database
UN Fish Stocks Agreement
World Bank Data

Appendix 2: Analytical framework for exploring impact on outcomes related to IUU fishing

Category	Sub-Category	Rationale for indicating positive change
Legislation and Regulation	Institutional and legal framework changes	Changes in institutional and legal frameworks that reflect increased desire to address IUU fishing and provide the foundations upon which nations can hold IUU operators accountable, and be held themselves accountable by third parties should they fail to effectively enforce them.
	Participation in relevant international agreements and initiatives	By participating in international agreements and initiatives designed to improve fisheries governance and address IUU fishing, States are obliged to align with international best practices and can be held accountable should they fail to do so.
Compliance and Enforcement	Engagement and compliance with regional fisheries management organisations (RFMOs)	RFMOs play a vital role in the management of fish stocks and fishing vessels in areas outside of national jurisdiction. Evidence that a state is complying with RFMO conservation and management measures (CMMs) is indicative of good fisheries governance.
	Incidences of enforcement	A rise in incidences of enforcement (i.e. the number of times a vessel is boarded by national authorities) may be indicative of an increasingly proactive approach to address IUU fishing at sea. The same logic applies to an increased detection of infringements during inspections at port, for example.
	Number and value of sanctions	An increase in both the frequency, and value of sanctions issued by a State can be indicative of both an increasingly proactive approach to address IUU fishing at sea, and of a recognition of the need for severe punitive action as a means of reducing the economic incentive to undertake IUU fishing.
	MCS changes	Changes in MCS (such as increasing staff levels or investing in infrastructure designed to improve MCS capabilities) reflects an increasing ability for States to address IUU fishing both within their fleet, waters and ports.
Prevalence	Number of flagged vessels	A reduction of the number of vessels flagged to a fleet may indicate that flag States are being more selective of which vessels they allow to fly their flag, or that a particular flag is less desirable to vessels seeking to operate under a less stringent regulatory environment.
	Number of vessels on IUU vessels lists	A reduction in vessels listed on IUU vessels lists may indicate adherence by a fleet to relevant CMMs and fewer instances of IUU fishing.
	Identification by US National Oceanic and Atmospheric Administration (NOAA) for IUU fishing concerns	The US Moratorium Protection Act requires Secretary of Commerce to report every two years to the US Congress on countries that are deemed to have been engaging in IUU fishing (as well as bycatch of protected species and shark catches on the high seas) ¹⁴⁵ responsibilities that have been delegated to NOAA. The definition of illegal fishing in this context differs slightly, as it is more specifically related to actions that undermine US interests and occur within international fisheries management agreements that the US are a party to, as opposed to IUU fishing in any form. ¹⁴⁶ Nevertheless, identification on this list can indicate a country's association with IUU fishing practices if their vessels fish in the same RFMOs that the US is a member of.

¹⁴⁵ US Federal Register. (2018), Identification of Nations Engaged in Illegal, Unreported, or Unregulated Fishing, Bycatch, or Shark Fishing. Available at: <https://www.govinfo.gov/content/pkg/FR-2018-05-22/pdf/2018-10859.pdf>

¹⁴⁶ Poseidon Aquatic Resource Management and The Global Initiative Against Transnational Organized Crime. Methodology for IUU Fishing Index. Available at: <http://iufishingindex.net/methodology>.



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