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WESTERN CENTRAL ATLANTIC FISHERY COMMISSION

Report of the

TWELFTH (VIRTUAL) SESSION OF THE SCIENTIFIC ADVISORY GROUP

19-20 June 2023

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PREPARATION OF THIS DOCUMENT

This is the official report of the twelfth session of the Scientific Advisory Group (SAG) of the Western Central Atlantic Fishery Commission (WECAFC), convened (virtually) from 19 to 20 June 2023.

The Food and Agriculture Organization of the United Nations (FAO) Secretariat to the session, consisting of Ms Yvette Diei Ouadi, and Ms Sonya Thompson, would like to thank the SAG members, working group members, experts, observers from partner organizations and others attending and supporting the organization of this session for their active contributions to the success of the session. The working and information documents used for the session are made available at:

https://www.fao.org/fishery/en/meeting/41395

ABSTRACT

The twelfth session of the Scientific Advisory Group (SAG) of the Western Central Atlantic Fishery Commission (WECAFC) was held virtually from 19 to 20 June 2023. The SAG considered the outcomes of the work carried out by various joint working groups between 2022 and 2023 and their recommendations to the 19th Session of WECAFC (WECAFC19). A revised version of the Caribbean Regional anchored aFAD Management plan and a revised version of the Guide for improved monitoring of anchored aFAD catches and improved assessment of anchored aFADs impact on stocks first reviewed at SAG XI were tabled.

During the meeting, the working groups and other regional experts presented reviews of draft fishery management plan, a monitoring guide, and a review of a governance document as follows:

- Caribbean Regional Management Plan for the anchored fish aggregating device (aFAD).
- Guide: WECAFC guide for improved monitoring of aFAD catches and improved assessment of aFAD impact on stocks.
- Review: Anchored fish aggregating devices fisheries governance with application to other fisheries in the insular Caribbean.

Further, amended recommendations were presented and reviewed for the spawning aggregation and conch working groups. Additionally, the review of the SAG considered outputs from activities of several working groups during the intersession, as summarized in the reports of the working groups, which also included draft recommendations to WECAFC19 and 2023–2025 workplans.

A list of specific SAG recommendations for the attention of WECAFC19 is included in the preface of the report. Workplans for 2023–2025 are provided for each working group as appendices.

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ABBREVIATIONS

aFAD anchored fish aggregating device
AIS automatic identification system

AOTTP Atlantic Ocean Tropical Tuna Tagging Programme

BBNJ biodiversity beyond national jurisdiction

CARICOM Caribbean Community – Implementing agency for crime and security

CF conversion factor

CFMC Caribbean Fishery Management Council

CITES Convention on International Trade in Endangered Species of Wild Fauna and Flora

CLME Caribbean Large Marine Ecosystem

CNFO Caribbean Network of Fisherfolk Organizations

CoP Conference of the Parties
COVID-19 coronavirus disease 2019

CRFM Caribbean Regional Fisheries Mechanism

CSL Caribbean spiny lobster

DCRF Data Collection Reference Framework

DG MARE Directorate-General for Maritime Affairs and Fisheries

EAF ecosystem approach to fisheries management ECROP Eastern Caribbean Regional Ocean Policy

ESA Endangered Species Act

FAC Fisheries Advisory Committee

FAD fish aggregating devices

FAO Food and Agriculture Organization of the United Nations

FDS Fisheries data and statistics

FEWER Fisheries Early Warning and Emergency response

FIRMS Fisheries and Resources Monitoring System

FMP fisheries management plan FSA fish spawning aggregation

FSAMP fish spawning aggregation fishery management plan

GCFI Gulf and Caribbean Fisheries Institute

GHG greenhouse gas

GPS global positioning system

ICCAT International Commission for the Conservation of Atlantic Tunas

ICT information and communication technology
IUU illegal, unreported and unregulated fishing

IWG Intersessional Working Group

JICA Japan International Cooperation Agency

MARPLESCA Caribbean Spiny Lobster Regional management and conservation plan

MCS monitoring, control, and surveillance

MCSE monitoring, control, surveillance and enforcement

MDA maritime domain awareness
MLE maritime law enforcement

MOU memorandum of understanding

NDF non-detriment findings

NIC National Intersectoral committees

NOAA National Oceanic and Atmospheric Administration

NPOA National Plan of Action

NGOs non-governmental organization

OECS Organization of Eastern Caribbean States

OSPESCA Organization for the Fishing and Aquaculture Sector of the Central American

Isthmus

PBS Public Broadcasting System

PROCARIBE Protecting and Restoring the Ocean's natural capital, building resilience and

supporting region-wide Investments for sustainable blue socioeconomic

development

QC Queen conch

QC/SSTAG Queen conch/Scientific, Statistical and Technical Advisory Group

RDB Regional DataBase

REBYC-III Strategies, technologies and social solutions to manage bycatch in tropical Large

CLME+ Marine Ecosystem Fisheries

RFB regional fishery bodies

RFMO regional fisheries management organization

RFSAMP Regional fish spawning aggregation fishery management plan

RPOA regional plan of action
SAG Scientific Advisory Group
SAP strategic action programme

SAWG Working Group on Spawning Aggregations

SICA Central American Integration System

SCRFA Science and Conservation of Fish Aggregations

SDGs Sustainable Development Goals

SPAW Specially Protected Areas and Wildlife Protocol (Cartagena Convention)

SSF small-scale fisheries

STAC Scientific Technical Advisory Committee

TOR terms of reference

UNDP United Nations Development Programme
UNODC United Nations Office on Drugs and Crime
UNOPS United Nations Office for Project Services

UWI The University of the West Indies

VMS vessel monitoring systems

WECAFC Western Central Atlantic Fishery Commission

WECAFIS WECAFC Fisheries Information System

WG Working Group

WTO World Trade Organization

RECOMMENDATIONS FOR THE ATTENTION OF THE COMMISSION

The Scientific Advisory Group recommends that the Commission:

Endorse two recommendations from the working Groups and that have been thoroughly reviewed by the experts.

- a) Amendment to Recommendation WECAFC/XVIII/2022/4 (Updated 15 March 2023 at the Fifth Meeting) of the WECAFC Working Group on Spawning Aggregations (SAWG).
- b) Amendment to Recommendation WECAFC/XVIII/2022/3 (Updated 16 March 2023 at the Sixth Meeting) of the WECAFC Working Group on Queen conch Draft amended Recommendation WECAFC/XVIII/2022/3 on increased efforts in the implementation of the regional queen conch fisheries management and conservation plan in the WECAFC region.

INTRODUCTION

- 1. The twelfth session of the Scientific Advisory Group (SAG) was convened virtually from 19 to 20 June 2023. The list of the members of SAG who attended the meeting is attached as Appendix C. The experts were selected based on their specialized knowledge. They served in their personal capacities and not as representatives of their respective governments or organizations.
- 2. Six working group conveners attended the meeting. The Chairperson of the Western Central Atlantic Fishery Commission (WECAFC), the Secretary of the WECAFC, nine technical and support staff from the FAO (Food and Agriculture Organization of the United Nations) Regional Office for Latin America and the Caribbean, the Subregional Office for the Caribbean and from Headquarters, Rome. Observers from 11 WECAFC member states and four observers from the Gulf and Caribbean Fisheries Institute (GCFI), Nova Southeastern University, Central American Fisheries and Aquaculture Organization (OSPESCA) and the UNOPS (United Nations Office for Project Services) Procaribe+ Project, were also in attendance. Simultaneous interpretation (English/Spanish) services were provided for all days of the meeting.
- 3. The Secretary of the WECAFC gave the opening speech on behalf of the FAO Subregional Coordinator, Ms Renata Clarke. She noted this SAG session is the last meeting opportunity of the selected experts before the 19th session of WECAFC. The central role of SAG as the scientific "arm" of WECAFC was also reiterated in the perspective of driving the development and implementation of well-informed and sound management measures, bolstering sustainable ecosystems services, social and economic benefits, including ensuring the livelihoods of the people depending on the living marine resources. In particular, she noted the task of advancing the realization of the 2030 agenda for Sustainable Development, especially the Goal 14: Conserve and sustainably use the oceans, seas and marine resources for sustainable development, an SDG for which FAO is a custodian agency.
- 4. She recalled the expectations from the meeting before thanking the Chair of WECAFC, Mr Edward Jackson and Ms Nancie Cummings, Chairperson of the SAG for joining the meeting despite their hectic agenda, and indicated that:
 - a) The contribution of the Commission to the management and development of the living marine resources of its area of competence based on the best available information and data, is primarily driven by this advisory body, which is led by selected resource persons with suitable scientific qualifications and experience in fisheries, who serve in their personal capacity to generate key advice to the Commission and its ad hoc working groups; and this, in keeping to its independence and integrity.
 - b) SAG is therefore crucial to the informed conservation and management measures development by the main governing body of WECAFC (The Commission); and the meeting of SAG is as essential as is the Plenary session of the Commission, which it usually precedes.
 - c) This meeting is being held almost a year after the last one of SAG, to provide the relevant advice to WECAFC19 slated for 6–8 September 2023 in Bridgetown, Barbados an exceptionally short intersession. It is indeed convened to be aligned with the meeting cycles of the FAO Regional Conference for Latin America and the Caribbean, the highest governing body in its instance of the organization.
 - d) She continued with recalling when the team of SAG was established, following almost two years of reform, after which members recommended to increase the number of scientists to nine. She informed that three positions are still to be filled, but this low membership did not preclude the group, from working laboriously and diligently to deliver within a brief

intersession. The innovations brought in the format of the meeting, the guidance reporting template for WG conveners, and the plan to host periodic consultations intersessionally to better support the working groups (WGs) in serving the Commission, were appreciated. These actions triggered a greater accountability of the WECAFC programme of work.

- e) She praised the dedication of these experts and made a call for WECAFC members, to encourage the team through an increased number of volunteers.
- f) She stressed that the issues to be tabled are the core items of the agenda of WECAFC19, and reminded the procedure following SAG review, including the 15 days to address eventual amendments suggested by SAG.
- g) She then recalled the key agenda items, before ending her speaking points.
- 5. In closing, the Secretary of the WECAFC thanked everyone for their attention and extended special thanks to the Chair of WECAFC, Mr Jackson for joining in delivering an opening statement, and to Ms Nancie Cummings, Chairperson of the SAG. She expressed her gratitude to her FAO colleagues for their hard work, especially Ms Sonya Thompson, the actual institutional memory of WECAFC, in organizing the event with professionalism. She wished for successful and fruitful deliberations after she introduced the meeting arrangements, and before passing the floor onto the WECAFC Chairperson for some remarks. The speech is shown as Appendix B.
- 6. In his welcoming address, Mr Edward Jackson, Chairperson of WECAFC echoed how the SAG is an essential body of the Commission and has continued its work intersessionally under the leadership of its Chair, Ms Nancie Cummings, including responding to requests from the Executive Committee on specific matters, such as the trends in the production of spiny lobster and the United States of America proposed listing of queen conch on the Endangered Species Act.
- 7. He underlined that it is of utmost importance to: (i) continue to conduct studies to provide insight on the biological state of fishery resources, in order to guarantee their sustainable use through the establishment of management measures, such as closures, minimum sizes, fishing quotas and spatial closures for industrial fisheries; (ii) contribute to the promotion of growth in production, exports and productivity by fostering fisheries and aquaculture, within the framework of national and international food security; (iii) increase the yields of small and medium-sized fishers and fish farmers through capacity building, technology transfer and value addition; and (iv) improve the quality of products for commercialization; restoring the rights of women and men involved in fisheries and aquaculture as a result.
- 8. On the other hand, the threat posed by climate change to economic and social development and food security is increasingly acknowledged. However, it is more evident in the fisheries and aquaculture sector. Therefore, it is paramount that the SAG makes recommendations for climate change adaptation and mitigation.
- 9. He recalled SAG's mission which is to provide scientific advice to the Commission and its working groups. The quality of its work is essential for building confidence in all fisheries and aquaculture stakeholders. He expressed concern however, that much work lies ahead, including continuous communication on its work and the scientific rigour.
- 10. A brief introduction of SAG members followed. Ms Nancie Cummings, from the United States of America introduced herself as a stock assessment scientist for over 35 years She is the Convener of the WECAFC Fishery Data and Statistics Working Group (FDS-WG). She noted her contribution scientifically would be in terms of stock assessment and statistics and data collection. She thanked all the SAG members for all their contribution. Mr Christopher Parker from Barbados followed,

he has been the Fisheries Biologist at the Barbados Fisheries Division for the last 24 years. He provides scientific information and advice for the management of all fisheries in Barbados. Ms Beatrice Padovani Ferreira is a Professor at the Federal University of Pernambuco, in Recife, Brazil. She is a fisheries ecologist working on reef fishes and fisheries in the Brazilian tropical marine region. She is presently conducting research on fisheries and fish stocks to provide guidance for fisheries management in the region. Mr Fabian Blanchard has been the Director of IFREMER laboratory in French Guyana since 2009. His background is in ecology but also ecological economics for fisheries. He works on the ecosystem approach in fisheries. His laboratory investigates habitat and fisheries production, impact of climate change and economic and human dimension for the small-scale fisheries (SSF). Fabian also is the convener of the WG of shrimp and groundfish resources since 2015. Ms Karina Ramirez followed. She works at the fisheries institute of Mexico with highly migratory pelagic species and is currently one of the heads of the 14 research centres of fisheries and aquaculture in Mexico. Mr Servando Valle Gomez (Cuba) has worked with the Centro de Investigaciones Pesqueras since 1973. Servando is also a Professor at the Centro, has experience in bio-economic modeling of fisheries and benefits to management, and is a member of the ad hoc WECAFC WG on spawning aggregations. Mr Fabian Blanchard was absent.

ELECTION OF CHAIRPERSON

11. The meeting agreed that Ms Nancie Cummings (United States of America) should act as Chairperson of the SAG. She introduced the approach to be used during the meeting, especially in the review of the recommendations, which involved allocating five minutes for reading, followed by ten minutes to collect SAG members' contributions to the specific recommendation/resolution.

ADOPTION OF THE AGENDA

- 12. The meeting approved the agenda given in Appendix A.
- 13. The documents that were presented and made available to the meeting are available at: <u>SAG XII Meeting Documents</u>

MAIN DECISIONS AND RECOMMENDATIONS OF THE THIRTY-FIFTH SESSION OF THE COMMITTEE ON FISHERIES (COFI 35)

- 14. Mr Piero Mannini (FAO) provided the document WECAFC/SAG/XII/2023/2 for agenda item 5, which contained the main discussion points of the 35th session of Committee on Fisheries (COFI). The document is available at www.fao.org/3/cc6431en/cc6431en.pdf. Mr Mannini was unavailable to present the report, he however electronically shared a summary of the main points of the document as presented here:
- 15. SAG is requested to consider some of the outcomes of COFI-35 with consideration to those of relevance to the WECAFC region and member countries.
 - a) The impact of climate change is significant in the WECAFC region and the proposed international workshop with Regional Fisheries Management Organizations (RFMOs) and Regional Fisheries Advisory Bodies on the regional approach to climate change impacts in fisheries and aquaculture was regarded as of high relevance. The regional scale can be particularly suitable to address climate change impacts, especially in the case of multilateral governance of shared fishery resources.
 - b) WECAFC could consider/review the current status of ratification of Port States Agreement (PSMA) and the role of WECAFC to support its ratification and implementation.

- c) The ratification, and implementation and challenges posed by the World Trade Organization (WTO) Agreement on Fisheries Subsidies. All WECAFC members are also WTO members. The Agreement foresees an important role for Regional Fisheries Bodies (RFBs), particularly RFMOs, to support individual country to implement it. Despite the advisory nature of WECAFC, the Commission could play an instrumental role to support its members to abide by the provisions of the WTO Agreement, should they ratify it as encouraged by COFI.
- d) The Intergovernmental Conference on an international legally binding instrument under the United Nations Convention on the Law of the Sea on the conservation and sustainable use of marine biological diversity of areas beyond national jurisdiction (BBNJ) approved the BBNJ Treaty on 19 June 2023. WECAFC should consider the implications on the fishery sector in WECAFC region of this long-awaited international instrument. The application of the BBNJ in the high seas adjacent to many WECAFC coastal states can be an issue of particular interest and relevance.
- e) SAG should consider appropriate to bring to the attention of WECAFC19 the reiterated interest and support of COFI for the ongoing discussion about further strengthening of WECAFC.

SUMMARY OF THE REGIONAL PRIORITIES ESTABLISHED BY THE XXXVII FAO REGIONAL CONFERENCE FOR LATIN AMERICA AND THE CARIBBEAN AND THE POTENTIAL CONTRIBUTION OF FISHERIES AND AQUACULTURE

- 16. Ms Maya Takagi introduced the document WECAFC/SAG/XII/2023/3 on regional priorities established by the XXXVII FAO regional conference and the Caribbean for agenda item 6. The full document is available at: www.fao.org/3/cc6619en/cc6619en.pdf. The document provides a concise overview of the regional priorities established by the XXXVII FAO Regional Conference (RC) for Latin America and the Caribbean. It also explores the potential contribution of fisheries and aquaculture in addressing these priorities.
- 17. It was noted that in recent decades, agriculture (including stock farming, fisheries and aquaculture) in Latin America and the Caribbean has shown a significant growth. The region has become one of the world's leading food suppliers, accounting for 14 percent production and 23 percent of agricultural and fisheries exports. This significant growth has brought with it considerable environmental costs, such as water scarcity and pollution, soil deterioration, loss of terrestrial and marine biodiversity, reduction in fish stock and forest cover, and a high level of greenhouse gas (GHG) emissions, which contribute to climate change. Today, Latin America and the Caribbean face a major challenge in transforming their food systems towards more sustainable and resilient production. This will also contribute to combating all forms of malnutrition and reducing poverty of the most vulnerable rural and coastal communities in the region. This transformation can be a source of multiple opportunities as it will require the introduction and expansion of technological innovations, increased investment in human capital and research, improved policies and regulations, and greater opportunities to advance in gender equality.
- 18. The 37th Conference encouraged FAO to further dialogue with Members with a view to maximizing the impact of FAO's work at country and regional level. FAO's response to the COVID-19 pandemic was also acknowledged, harnessing the Organization's convening power, supporting Members to strengthen the resilience of agrifood systems and keep them functioning, as food production and supply remained stable in a highly stressed context.
- 19. It was also important to highlight FAO support in combating illegal, unreported and unregulated (IUU) fishing to contribute to the sustainability of fisheries in the region. Key selected recommendations at the 37th Conference included:

- a) Continue to support Members to ensure that agrifood systems and value chains recover from the negative effects of the COVID-19 pandemic, through the implementation of the priority areas of the FAO Strategic Framework 2022–2031 in the region, with special emphasis on the recovery of decent employment, especially among women and youth, and the eradication of child labour, and ensure the right to adequate food in the context of national food security, in particular for vulnerable households, women, children, youth, indigenous peoples, peasants, afro-descendants and those whose food security and nutrition had deteriorated.
- b) Encourage the adoption of urgent measures to help agrifood systems, according to their characteristics, to adapt and contribute to climate change mitigation, addressing the degradation of natural resources, the restoration of ecosystems and the increase in the frequency and intensity of disasters and natural phenomena, recognising the principle of common but differentiated responsibilities and the role of the region in global food security.
- c) Adapt the implementation of the FAO Strategic Framework 2022–2031 to the local context and support countries according to local context and capacities, in support of the 2030 Agenda for Sustainable Development to achieve efficient, inclusive, resilient and sustainable agrifood systems, through the implementation of the priority programme areas Provide technical assistance to Members, upon request, to strengthen their statistical systems, including censuses, in line with national data protection regulations, to produce information on agrifood systems for improved decision-making, including young people, in line with the 2021 Declaration of the Committee on Fisheries in favour of sustainable fisheries and aquaculture, in line with the report of the 168th session of the Council.
- d) Strengthen science and evidence-based decision-making for marine resources management through research and capacity building of Caribbean Members under Nansen programme.
- e) Support members to ensure diversity of land uses, soil fertility and health, conservation and sustainable use of biodiversity in agrifood systems and the provision of ecosystem services.
- f) Develop a Strategy for Science and Innovation that would serve as a key instrument to contribute to the implementation of the FAO Strategic Framework 2022–2031. Its crosscutting and cross-sectoral relevance across the work of the Organization was underscored.
- g) Adopt an approach that ensures access and affordability of innovations in an inclusive and non-discriminatory manner.
- h) Promote partnerships with public and private sector research institutions and exchange among Members.
- i) Provide support to Members, upon request, to implement adaptation and mitigation measures to address the challenges of climate change and to strengthen their national, sub-regional and regional policies, strategies and mechanisms in a coherent manner, as appropriate, and in accordance with existing contexts and capacities.
- j) Use holistic and innovative approaches, including biotechnology, genomics, direct seeding and other technical tools, promoting the linkages between climate change, restoration of productive ecosystems, integrated water resources management, land-use planning and management, combat desertification, land degradation and illegal deforestation.
- j) Incorporate the suggestions received from the 37th session of the Regional Conference and continue with the consultative process so that the draft Strategy on Climate Change can be considered by FAO Council at its 170th Session.

k) Requested that the Regional Commissions hold their regular meetings no later than the first half of the second year of the biennium so that technical recommendations and decisions could be addressed in due time and form for the Regional Conference.

INTERSESSIONAL ACTIVITIES – REVIEW OF 2023–2025 WORKPLAN OF THE WESTERN CENTRAL ATLANTIC FISHERY COMMISSION

- 20. Ms Diei Ouadi introduced the document WECAFC/SAG/XI/2022/4 on Intersessional activities Review of the WECAFC Work Programme 2019–2021, which contained a summary of the recent activities of the WECAFC. The document addressed agenda item 7 and is available at: www.fao.org/3/cc6430en/cc6430en.pdf.
- 21. She noted that because there has been less than one year since the previous Commission meeting there have been relatively limited activities of the advisory bodies (the working groups and the Scientific Advisory Group) when compared to a regular intersessional period. The decision to have the 19th session so soon after the 18th session, was made by the Commission to align the meeting cycles and provision of recommendations with the Regional Conference for Latin America and the Caribbean.
- 22. She further noted that, the key statutory body assigned to implement the decisions of the Commission between its sessions, the Executive Committee, maintained the trends started in the previous intersession, in convening periodic meetings to carry out such tasks as entrusted to it by the Commission. Subsequently, the coordination of intersessional meetings of the working groups and other subsidiary bodies such as the ad hoc intersessional working group (IWG) under the direct oversight of the Chair of the Commission, was less than in some periods. On the other hand, matters requiring the actions by the Executive Committee, the follow up on processes not fully completed during the 18th Session, such as the revised rules of procedure, the partnership framework with the International Commission for the Conservation of Atlantic Tunas (ICCAT), the strategic reorientation, publications, and coordination of resource mobilization between working groups engaged the largest share of the time assigned by the Secretariat to WECAFC.
- 23. Ms Diei Ouadi then summarized the key achievements during the intercession of the Commission which spanned four main areas in alignment with the 2022–2027 strategic plan: 1) Improve regional fisheries governance; 2) Increase regional information exchange and collaboration in fisheries management; 3) Strengthen regional fisheries management and best-practice approaches for fisheries and aquaculture; and 4) Fostering a conducive environment within the WECAFC Secretariat to support the achievement of the goals and objective of the Commission. Corresponding to these four areas the document summarizes the main outputs which cover four main organizational categories (Executive Committee, Scientific Advisory Group, working groups, other bodies, partnership, data and information sharing for improved regional governance in fisheries). The main outputs within these categories as relates the four main areas of the strategic plan include:

A. Executive Committee:

- a) Leading continued review of 2014 rules of procedure.
- b) Identification of a second Vice-Chair, requiring two rounds of communication.
- c) Preparation of 19th Commission session.

B. Scientific Advisory Group:

- a) Convening of multiple review sessions intersessionally for consideration so special topics of interest (e.g. trends in spiny lobster production, proposed listing of queen conch on the Endangered Species Act [ESA]).
- b) Preparing the report of the eleventh session for publication in the FAO Publication Workflow System (PWS), expected to be published summer 2023.
- c) Preparation of 12th SAG session.

C. WECAFC working groups achievements:

- a) Three WGs met during the intersession (hybrid format), SAWG, aFADs, and Queen conch.
- b) Key achievements across all WGs were:
 - a. revising (draft) recommendations for the SAWG and conch WGs for the 19th Commission;
 - b. revisions of aFADs Draft fishery management plan and monitoring guide;
 - c. preparation of v1.0 of the Data Collection Framework as an FAO circular;
 - d. advancing the WECAFC list of aquatic species to include Mutton Snapper and Nassau Grouper as priority species;
 - e. progressing intersession discussions of WECAFC proposals for statistical reporting; and
 - f. advanced the work on WECAFC-FIRMS inventories of fisheries and stocks and initial steps towards operationalization of the Regional Database (RDB) now named WECAFIS.
- 24. The document also recognized the importance of sustainability of WECAFIS, the new regional database and, noted that securing resources for a regional database manager for sustainability of the WECAFIS is a critical matter deserving attention at the WECAFC 19.
- 25. During the intersession several WGs increased collaborations specifically:
 - a) FDS/IUU/Spiny lobster WG conveners developed a concept note for proposal titled "Enhance data collection and monitoring and develop practical approach to characterize illegal, unreported, and unregulated fishing (IUU) for sustainable small-scale spiny lobster fisheries in the WECAFC region".
 - b) FDS-WG/WECAFC-FIRMS taskforce provided input to aFAD, SAWG, and conch WG meetings as relates to alignment of data collection initiatives being prepared for those WGs with the DCRF.
 - c) FDS-WG/FAO NFIS staff on the WECAFC WECAFIS regional database in support that the platform is ready for data calls, and noting the additional capacity needs to support the diverse and increasing workload of the various WGs.

- 26. The document recognized the urgent situation regarding WG convenorship strength as relates: a) absence of conveners (shrimp and groundfish); pending departure of conveners (spiny lobster); b) burden on CRFM Secretariat to act as WG convener of three WGs (conch, IUU, flyingfish/dolphinfish). The Secretariat is proposing that the Commission discusses the possibility of distributing the convener responsibility by a group of member countries (CRFM, OSPESCA, other members).
- 27. Outputs from Other bodies: the key output post WECAFC 18 included the continued work from the ad hoc Intersessional Working Group (IWG) established by WECAFC17 towards the roadmap of WECAFC reorientation. Post WECAFC 18 two additional meetings of the IWG were held and the Chair has taken the lead during the intercession in drafting the proposed draft text options.
- 28. The document also provided achievements from new initiatives, notably:
 - a) Preparation of proposal (funded by European Union) on "Improving ecosystem approach to fisheries by advancing fish spawning aggregation information gathering and increase of public engagement in the WECAFC region".
 - b) Preparation of pre-proposal for funding consideration by FDS/SL/IUU WGs on "Enhancing data collection and monitoring and develop practical approach to characterize illegal, unreported, and unregulated fishing (IUU) for sustainable small-scale spiny lobster fisheries in the WECAFC region".
- 29. The document also recognized multiple projects ongoing and/or near completion on several aspects of importance particular to the Commission's mission and basic operations including: deterring and eliminating IUU, support in implementing targeted actions of the 2019–2020 workplan on improved regional fisheries governance, effective implementation of priority actions of the Programme of Work agreed at the 17th session of the Commission.
- 30. The document then recognized several regional projects which are expected to involve and require some level of interactions with the Secretariat and/or various WGs including: a) Blue Economy-CLME+": Promoting National Blue Economy Priorities Through Marine Spatial Planning in the Caribbean Large Marine Ecosystem Plus; b) Enhancing capacity for the adoption and implementation of EAF in the shrimp and groundfish fisheries of the North Brazil Shelf Large Marine Ecosystem (EAF4SG); c) Strategies, technologies and social solutions to manage bycatch in tropical Large Marine Ecosystem; and d) Protecting and Restoring the Ocean's natural Capital, building Resilience and supporting region-wide Investments for sustainable Blue socio-economic development (PROCARIBE+), e) REBYC-III CLME+.
- 31. Partnership, data and information sharing for improved regional governance in fisheries main outputs:
 - a) Partnership. The Secretariat collaborated with the ICCAT Secretariat to develop a draft MoU between WECAFC and ICCAT, during the intersession between the 17th and 18th sessions however no advancement of the MoU occurred prior to WECAFC 18. In June 2023, a response was received by ICCAT and the Secretariat is requesting the topic be tabled at the 19th session.
 - b) Data and information sharing/Publications it was noted that several publications are soon to be published in the FAO PWS system from now on until end of September 2023 including:
 - a. data Collection Reference Framework;

- b. review of the Biological Data, the Stocks Spatial Distribution and the Ecological Connectivity between the Areas Beyond National Jurisdiction and the Exclusive Economic Zones in the WECAFC region;
- c. SAG XI and WECAFC18 session reports;
- d. Regional Fish Spawning Aggregation Fishery Management Plan: Focus on Nassau Grouper and Mutton Snapper (FSAMP);
- e. Regional Plan of Action for the Conservation and Management of Sharks, Rays and Chimaeras in the WECAFC area; and
- f. meeting reports in preparation: Fifth Spawning aggregations WG, sixth Queen conch WG, fifth anchored aFAD session, SAG XII report.

CARIBBEAN REGIONAL MANAGEMENT PLAN FOR ANCHORED FISH AGGREGATING DEVICE FISHERY

- 32. Dr Henri Vallès introduced the document WECAFC/SAG/XI/2022/7, The Caribbean Regional Management Plan for the Anchored Fish Aggregating Device (aFAD) Fishery Working Document for agenda item 8. The document is available at: www.fao.org/3/cc6421en/cc6421en.pdf.
- 33. The preparation of the document was motivated by the terms of reference of the workplan of the working group for the period 2019–2020, a project funded by the European Union. Several revisions were conducted, the first was in March–May 2022, and the second in January–February 2023 that included input from the European Union and the United States of America, and finally in April 2023 additional input from the aFAD working group was incorporated. This revision corresponds to the 2015 workplan of the CRFM, it is based on the online study of different aspects, which covered 20 countries and territories (70 percent are related to the fisheries of the plan). It is divided into seven sections, plus four appendices.
- 34. The plan identifies 26 locations in the region with significant utilization of aFADs, of which 92 percent are Caribbean Islands. A total of over 3 600 aFADs are estimated in the region, 86 percent are private and are located in the Dominican Republic and Guadeloupe, 97 percent are private, with an estimated 6 200 full or part-time fishermen with 2 700 vessels. Florida is the only location with aFADs used primarily for recreational fishing.
- 35. The key objectives of the aFAD fishery remain the same as for the past thirty years for the region. For example, to improve fisher livelihoods, decrease fishing pressure and increase fishing efficiency.
- 36. It has been observed that across the region, there is a great diversity of aFAD designs and their costs, varying according to the materials used. Public owned aFADs tend to be more aligned with best practices than privately owned aFADs in design, seeking to minimize aFAD losses and collisions with vessels. The use of biodegradable material is limited with both public and private aFADs. Public aFADs are more expensive to construct than private aFADs. Public aFADs last longer, take longer to be replaced when lost but are also more likely to be recovered than private ones.
- 37. The review of the different designs in the region, in terms of activities, has continued during the intersession. Most fishing is conducted by two to three fishermen on small boats (usually <9 m length overall) with trips being of one day in duration. Fishing occurs mainly within 100 m from the aFAD and is mainly conducted during daylight hours. The fishing techniques employed involve surface and subsurface trolling using artificial lures or deep drifting drop lines using small pelagic species or small tunas as live bait.

- 38. There is a variation in catch composition across the region as well as within locations over time. What drives these variations in any area remains poorly studied and needs further research. Available data indicates that catches of tunas and dolphinfish associated with aFADs are usually dominated by juveniles. The dominant bycatch around aFADs are sharks. Incidences of bycatch of turtles, seabirds and mammals are rare. The exploitation status of stocks of blue marlin, white marlin and bigeye tuna are of particular concern while the exploitation status of other species such as yellowfin tuna, skipjack, and albacore are not of large concern being neither overexploited nor overfished. There are few published reports of pelagic landings for aFADs. Guadeloupe and the Dominican Republic, with the larger number of aFADs, jointly account for most of the reported catches, with production varying between locations. Yields per fishing trip can differ widely across the region; the reasons are not clear. It is likely that fisher crowding around aFADs affects yields, as well as the distance of the aFADs from the coastline. However, the impacts of these factors are poorly studied and present another area for research.
- 39. Although available data supports that aFAD fishing provides greater revenue than other forms of fishing the extent depends on local context. Only one study has rigorously compared the profitability between aFAD fishing and other types of fishing at the same location and as such more similar studies and research is needed in this area. This is because it is clear the social and economic contexts are very different from location to location as well as the resources available to fishermen to operate aFAD fisheries.
- 40. It also appears that there is a great need for training fishermen in several areas relevant to fishing on aFADs indeed for fishing in general. There is great diversity across the region in the level of training that fishers receive and identified as an important challenge to overcome in many locations.
- 41. In terms of management systems recently there have been improvements in relation to data collection capacities. However, there are still no data collection systems at some locations and at many others even some basic fisheries statistics such as trip costs etc. are not routinely collected therefore, there is no capacity nor knowledge base to assess whether aFAD fishing is more efficient or profitable compared to other types of fishing.
- 42. There is also a lack of a comprehensive and well enforced regulatory framework. This is a major challenge across the region. Only two out of 20 locations report having aFAD management plans, in some cases, fishers at some locations may not know the rules or regulations on the use of aFADs.
- 43. Where there is no comprehensive regulatory framework and where there is little enforcement capacity, a system where informal fishing territories may develop around private aFADs, with fishermen themselves claiming exclusivity, leading to a lack of equity and access to fishing areas. This promotes a race for the fish with an increase in the number of aFADs, even further from the coast to target the fish that may be in these areas. So oftentimes not investing in good quality aFADs leading to an increase in loss of the aFADs and contributing to an increase in marine debris. This practice also results in decreasing safety at sea as fishers move further from the coastline to reduce competition and ultimately leading to a dilution of potential economic benefits.
- 44. Of the nearly 50 challenges identified for management of aFADs, in the context of dilution of economic benefits when there are too many aFADs, high fuel consumption and costs associated with aFAD fishing was ranked as the most significant challenge in countries where there was no regulatory framework.
- 45. In the governance domain the major concerns included the lack of aFAD regulations and the lack of capacity to enforce the regulations and the lack of management plans.

- 46. In the biological domain the most significant concerns were the need to address the insufficient reduction of fishing pressure on coastal resources and the capture of juvenile fish for commercial purposes.
- 47. All these elements support the need to develop a regional aFAD management plan which the Draft Caribbean Regional Fishery Management Plan for the aFADs Fishery seeks to do. The overall objective being to guide the implementation of a set of identified management measures that can be applied at the regional, subregional, national and local levels for the sustainability of large oceanic and coastal pelagic fish stocks while ensuring a healthy aFAD fishery and the improvement of the livelihoods of the people that rely on the fishery.
- 48. The seven specific objectives of the management plan are: 1. to improve national and regional governance frameworks for the aFAD fishery; 2. to support the development and adoption of robust and effective aFADs management measures across the region; 3. to improve local and regional systems for the collection, integration, sharing, and restitution of fishery-dependent data; 4. to improve the monitoring, control, and surveillance (MCS) of aFAD fisheries across the region to ensure effective implementation of applicable fishery regulations and help eradicate IUU fishing in the region; 5. to improve the environmental sustainability of aFAD fisheries; 6. to improve socioeconomic performance and sustainability of aFAD fisheries; 7. to support a science-based approach to aFAD fisheries management.
- 49. An abridged version of the tables is presented in section 3 of the document listing only the key outputs under each of the seven specific objectives, related activities, actors and timelines were presented. That is, the indicators and means of verification columns were removed for the presentation. Furthermore, in the interest of time only one of the activities related to an output was presented as examples to explain the structure and utility of the tables as provided in the document.
- 50. A 16-point list of implementation guidelines providing advice for selected activities in the plan was then presented. Finally adaptive management mechanisms for implementing and reviewing the Plan were presented. This included that: National governments are responsible for implementing the Plan at the national level; Amendments to the Plan are to be made at the level of WECAFC and then passed on to its Members, CRFM and OSPESCA for their implementation; development agencies, financial institutions, and government and non-governmental agencies investing in the implementation of activities under the Plan should also independently monitor and evaluate the impact of their financial contributions on the expected outcomes; a review of progress should be conducted regularly by the WECAFC in conjunction with the aFAD Working group and a first evaluation of activities and outcomes under each specific objective should be conducted after five years of the Plan being adopted; the financial resources to implement the Plan will be obtained mainly at the national level, with support from bilateral and multilateral donors and collaborators.
- 51. The final section of the document provided key references cited in the plan.

Discussion

52. The SAG thanked Dr Vallès for the presentation and opened it for discussion. The SAG commented that the plan is quite comprehensive and supported with an extensive document, on a complex subject, it is a multi-species fishery, and therefore it contains many elements to be considered. SAG also noted that the revisions that were raised at the 11th meeting of the SAG were considered and their incorporation into the version presented here reflects improvement in the Plan document. It is pointed out that in the presentation there is a lot of background information about the fishery, and the SAG considers that the authors should refer to that material also in the monitoring guide.

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- 53. There are also about seven different objectives in the management plan, and the way to identify them was very useful, for each of the objectives there are the results associated with the implementation and achievement of objectives. Activities were identified in the indicators to identify what will be done to achieve their objective, and what will be the performance measurement, which will determine if the objectives are achieved or not. Objective 3 is related to other organizations such as ICCAT, where it relates to cooperating with the working group on fishery data and statistics (FDS), it is expected that under Objective 3, and the other thing is to integrate compiled data with the local databases, aligning with the Data Collection Reference Framework (DCRF), the latter could be used to make data recommendations in the region, identify the mechanism, to be included in the final document of the 19th meeting. It is noted that the regional database, WECAFIS, has also been endorsed (at the 18th Commission), it is expected that the submitted data will be integrated into the ICCAT database.
- 54. It was also noted that a name change was noted, from 'moored' to 'anchored' which is related to FAO publication protocols, and that the name changes should be explained to the group.
- 55. As for the objectives, SAG members noted that it would be useful to have a kind of prioritization. Table 3 in the plan does not indicate which is the most important, or perhaps they are all equally important. The Commission requested at the 18th Meeting to identify priorities between objectives, not only costs, but also to identify priorities and urgencies.
- 56. SAG also noted that Figure 4 would be clearly presented as a bar chart arranged in descending order, where it would highlight the relative contribution of each species to the catch.
- 57. SAG also noted that in relation to managing catches of blue and white marlins, the potential for instituting catch retention limits is not mentioned. and in this regard the use of mechanisms such as the use of circle instead of J hooks and the use of dehooking devices to facilitate the safe release of these species that should not be taken. It is not mentioned, but the group considers that it is necessary to encourage the live release of these species.
- 58. SAG also suggested that regarding catches of juvenile tuna, it would be more appropriate to say that juvenile fish are caught rather than suggest that they are actually targeted. Dr Vallès expressed his thanks for the comments and replied that the comment about different types of hooks could be part of capacity building or training activity. However, he believes that in terms of concentrating on catching young fish, there are two sides of the coin: firstly, it is understood that young fish are normally found on the surface, so fishers expect to catch smaller, younger fish when trawling on surface so it could be that targeting younger fish really happens as younger tuna is easier to catch. Everything revolves around the idea of improving fisher approach, fishing techniques related to FADs, and fisher knowledge on how each species responds to different ways of fishing around FADs (e.g. time of day of aggregating, hook size).
- 59. SAG also noted that it was important to nuance management measures across the three sectors involved in the FAD fisheries (subsistence, small commercial, recreational) especially to ensure equity across all the sectors as relates management measures.
- 60. SAG further noted regarding how to handle the collection of data on size of small fishes, the importance of tracking any changes quickly, since recruitment changes can occur quickly. The author responded that more data collection is needed.
- 61. The concept of co-management was mentioned by Barbados; the ability to participate and strengthen the process was recognized. It is believed that for the future, this is how data collection will be improved. SAG further noted that the importance of leveraging the data collection across the various working groups was key to optimizing and advancing data collection.

- 62. Other points were made by SAG, but it is decided that since they relate mostly to the monitoring guide it would be better to present those when the monitoring guide is presented.
- 63. Trinidad and Tobago congratulated the authors for the work, acknowledging that it is more integrated and structured work in this new version. Recommendations from SAG XI were addressed. It is very important to mention that the implementation of aFAD fishing aimed to improve catches and food security and to reduce the pressure on other resources, but not all of this has been achieved. Thus, a recommendation for an evaluation to determine the effectiveness of activities and outcomes recommended in the management plan is made. Relating to Table 3, a suggestion for the working group is to look at the indicators, as the ones available likely will not allow to measure the results of the associated objective. For example, for objective 1 (improve regional and national governance, one of the activities is to improve the capacity of stakeholders to participate in co-management). The indicators and the actors were identified, but regarding the issue of capacity of stakeholder participation, that does not only mean the quantity, but it is the knowledge and understanding and how fishing behaviour changes, that this should be achieved in five years. It is recommended then for the other activities as well; a goal or objective is to quantify the effectiveness of the outcome of each objective. This likely would be an in-depth exercise, and it appears that has not been done however this would be a good evaluation exercise in the next five years, perhaps it could be considered by the Working Group (WG).
- 64. The WECAFC Secretary congratulated the work, with modifications at different stages and a lot of work invested. She queried about some of the appendices, recalling that at the fourth WG meeting it was suggested to publish them as separate documents, likewise the results of the FADS and the guide for development of local management plan.
- 65. The Author acknowledged that they should be separate documents.
- 66. The OSPESCA observer gave some general comments, based on experience in Central America. He indicated that: 1) Dominican Republic is one of the important countries and asked what level of participation it had in the elaboration of the document. According to him, the translation into Spanish, the terms used sound ugly, anchored fish aggregating devices, sounds ugly, so he would like them to consider reviewing them. Also, 2) Regarding the financing issue, i.e. the implementation of the plan, when seeing the presentation, it seems that the activities will be implemented thanks to donors and not as government budgets. He flagged that things work if there are donors; once there is no such a support, there is no more work and implementation can be difficult.
- 67. Dr Vallès responded that within the plan the first objective, one of the outputs within the 1st and 7th objectives, the participation of fisheries authorities is expected as human capacity building, more people dedicated to this type of work, what cannot be defined is where the funds come from, but it depends on the context of each country.
- 68. Regarding the participation of the Dominican Republic, Dr Vallès informed that they have participated since the development of the management plan, and so far, all of the documents have been translated into Spanish. The importance of the Dominican Republic, which has most FADs in the region is known, and a call for nominations for their attendance was made. He further added that indeed, Dominican Republic participated in the survey. On the translation aspect, the WECAFC Secretariat indicated that FAO uses authorized translators for documents, and before publication they are reviewed as part of the publication workflow.

WESTERN CENTRAL ATLANTIC FISHERY COMMISSION GUIDE FOR IMPROVED MONITORING OF ANCHORED FISH AGGREGATING DEVICE CATCHES AND IMPROVED ASSESSMENT OF ANCHORED FISH AGGREGATING DEVICE IMPACT ON STOCKS

- 69. Dr Henri Vallès introduced the document WECAFC/SAG/XI/2022/8 "Guide for improved monitoring of aFAD catches and improved assessment of aFAD impacts on stocks in the WECAFC region Working document (5th draft)" for agenda item 9. The document is available at www.fao.org/3/cc6423en/cc6423en.pdf.
- 70. This guide is an essential document to carry out the work regarding the aFADs Management Plan to facilitate the integration, harmonization, obtaining and validation of data for compliance with the objectives of sustainable management, a work expected to help increase the quantity and quality of information at the local, national and regional level.
- 71. Henri Vallès presented a revised version of the document for the improvement of catches with aFADs available at www.fao.org/3/cc6423en/cc6423en.pdf. This document is a review that includes the recommendations of the members of the working group on statistics and fishing information, which was carried out before the 5th Working group meeting. The presentation began with a background on the need for the guide's development. It was noted that there are several challenges associated with aFAD fishing, especially at the ecosystem and biological level, particularly on concerns about catches of young fish, as well as the catch of species that are considered overexploited, bycatch of sharks, turtles, marine mammals and birds, the number of aFADs, turnover rates and location, as well as the hyper-stability of catches using aFADs. So far, the efforts to measure the impacts are not representative and cannot be used as an index of total abundance of a particular species, thus requiring the development of alternative ways to assess fish stocks using fishing-independent indicators.
- 72. Despite the fact that there has been a lot of progress in terms of countries and regions, in terms of improving their statistics or data that are recorded in fishing and their capacity to collect data, there are still opportunities for improvement, especially when trying to harmonize the data, to have a better vision of the stock assessment, since not all of them have these systems for data collection, so more effort is required for the sake of their standardization for data collection systems and for the promotion of their harmonization in all regions.
- 73. It was recognized that a framework for data collection (DCRF) in the region has been endorsed (WECAFC 17), as well as a regional database (WECAFIS, WECAFC 18) and the development of the WECAFC logbook for the entire region and the process to carry out the harmonization of fishing data, which describes the main issues for the standardization of data collection systems in the region, with the assignment of tasks and subtasks that allow a gradual implementation of national fishing data collection systems based on the capacities of each member.
- 74. It was further noted that the monitoring guide is primarily directed to national/local fisheries authorities and researchers involved in the development and application of data collection systems, aimed at moving towards a data collection framework in the region, primarily aimed at improving aFAD-related fisheries data collection systems in the WECAFC region, particularly in the Eastern Caribbean.
- 75. Dr Vallès noted that the guide is currently operating in the WECAFC region, with special focus on the Eastern Caribbean, and is structured under the WECAFC Caribbean Regional Fisheries Mechanism (CRFM). The other relevant element is that there is a logbook where the information is recorded, which provides a methodological framework to facilitate data collection from regulated fishing. The objective is that this logbook provides all the necessary reports regarding national objectives or local management plans, to ensure that countries comply with their agreements and

obligations, in addition to international agreements, and that they can report them to WECAFC, through a modular approach. Module 1 provides basic data on vessels and crew, module 2 refers to the description of the fishing trip, and module 3 provides a description of the fishing gear and the effort of each gear, including basic data on aFADs in case of using these devices. Module 4 presents a summary of landings by species (distinguishing between retained and discarded catches), and finally module 5 that provides a report on non-fishing activity. Modules 1 to 3 are considered as key data. Modules 4 to 6 provide a supplement to the document. In general, it is a useful logbook for any type of fishery and provides a general framework.

- 76. Another important point was the mention of the aFADs fishing logbook, which was developed between 2014 and 2015 to support the Caribbean Fisheries Co-management project (CARIFICO), developed specifically for a specific type of fishing, in which five countries were consulted for its implementation. This logbook includes information on fishing trips, fishing equipment and manoeuvres, as well as catch information, as well as a section that aims to deal with incidental catches that includes a breakdown of catches by condition (discarded dead, released live) and some data on the costs of each fishing trip. The difference between the two logbooks (aFADs, CRFM) is that the latter focuses more on aFADs fisheries.
- 77. This work was carried out to support the standardization of data requirements on aFADs between countries and to allow the development of performance indicators to assess the status of the fishery in relation to specific management and socioeconomic objectives, this to support use in the region. The data that collected are data that can be used to answer if the objectives are being met, and also to align the data requirements with those ICCAT recommendations, and to allow the quantification of the effects of fishing for aFADs on juvenile species, target species that suffer from overfishing and non-target species, in addition to allowing the evaluation of the type of gear, bait and depth of fishing, as well as the composition of species, in addition to allowing the evaluation of the effects of environmental factors.
- 78. The CRFM logbook form data are very relevant, some of the usual management objectives contemplate the socioeconomic scope that includes: increasing the income of fishermen, reducing fuel consumption, improving efficiency, improving food security, and the availability of fish products, which allows evaluating compliance with the objectives and at the same time, providing the opportunity to analyze some of the effects that aFADs fishing, and which may also have implications in the biological domain and ecosystems, reducing the capture of overexploited species and reduction of the bycatch of key groups, to have relevant information to determine whether or not the objectives are met, all in terms of guaranteeing the biological and ecosystem stability. Regarding future work, it is intended to continue aligning with the WECAFC logs to continue its improvement.
- 79. Finally, Mr Valles noted that information technologies (ICT) can improve the process of data collection by fishermen by using technology to delineate the activities of fishermen with FADs, allowing to quantify the number of FADs, and to know the level of activity. The idea is that the fishermen, with the use of computers, go to a local, national and regional database, sharing confidentiality agreements for privacy issues. The document recognizes the differences in data collection capacity in the region, as well as identifies the need to adapt its implementation using a staggered approach, commensurate with the capacity of each country. Finally, the guide integrates recommendations to carry out the process of integrating ICT in local and national fishing data systems. He also noted that the use of ICT data collection tools in the region, specifically the Calipseo system (Calipseo Information System) was underway in Dominica FAD fisheries and being considered for other fisheries in Trinidad and Tobago and Suriname.

Discussion

- 80. The SAG Group observed that it is a complete document, which presents various alternatives, and refers to the existence of different capacities by country, for which it was recommended to set different levels, implementation phases so that countries can integrate according to their capacities and to the progress of its implementation, establishing priorities on what data is needed, how it is needed and identify what activities are needed.
- 81. Regarding the biological data that the guide considers, the SAG Group refers to the need for the investigation of the capture of juveniles to be considered as a priority, through obtaining o information, harmonizing between the management plan and the guide; the importance of collecting this type of data (sizes of juveniles) since it is known that there are differences in catches by species and in their composition by size.
- 82. In addition, the SAG Group suggested the alignment of the field logs of the management plan and the guide, however, because it will require more time, the experts will work during the next months, to present a proposal as soon as possible. Another suggestion is to work with the statistics of the fishing data to develop a field log.
- 83. The SAG Group observed that the guide has Table 1 in which the requirements for data collection are presented in accordance with the Data Collection Reference Framework (DCRF), however, its incorporation is required to broaden the versatility for the conclusions of the working group, with flexibility for all regional fisheries.
- 84. Trinidad acknowledged the need to prioritize the data collection requirements and to assess what data are needed to achieve each management objective as well as and the importance of the iterative approach for implementing. Regarding data collection, it is recommended to consider what are the best approaches for collecting each data type to optimize data collection and also minimize burden to fishers, Trinidad supported the use of ICT tools while recognizing different tools (CRFM vs WECAFC logbooks, ICT etc.) can yield different data types so harmonizing data collection across the various tools is needed. Also, support the implementation of FAD registry system and through that system could collect FAD characteristics. Also, Trinidad supported the collection of biological data; however, noted that it may not be reasonable to expect fishers themselves to collect such data. Thus, other mechanisms could be used for these data collections (e.g. arranging with captains to bring fish to port, specialized training of captains, cameras). Trinidad also supported the use of ICT tools for the capture of environmental vs use of a logbook system.
- 85. Montserrat noted the need to be cautious when it comes to the collection of biological data so as not to burden the fishers and the need to strengthen capacity within the governance of the region in the collection of this data type (biological) and not just to collect catch and effort in these fisheries.
- 86. CRFM supported that in general FAD characteristics should be collected through a FAD registration system.
- 87. In general, there was acceptance regarding the use of information technologies considering the budgetary impact and the results that are intended to be obtained. Therefore, the identification of opportunities for collaboration must be used both for financing and for the implementation of costs.

REVIEW OF MANUAL ON ANCHORED (MOORED) FISH AGGREGATING DEVICES GOVERNANCE

- 88. Dr Susan Singh-Renton introduced the document, WECAFC/SAG/XII/8, Best practices of fisheries using anchored (moored) fish aggregating devices (aFAD) Volume V aFAD fisheries governance" for agenda item 10. The full document is available at www.fao.org/3/cc6551en/cc6551en.pdf.
- 89. It was noted that there is a wealth of material and information to guide the way forward including from several projects in aFAD fisheries, regional and international reviews, knowledge exchanges etc. There are several success stories in the region. There has been an international review of more than 1 000 fisheries in 30 countries.
- 90. The current review identified the need for fisheries governance to deliver four key element outcomes, which will be detailed later, to successfully influence policy, management decisions and adaptation.
- 91. It is important that each element must be managed. Each element has to incorporate the 8 principles of good governance. The use of a process management cycle, and a whole-of-government approach along with a sustainable financing plan for the use of resources are proposed for each element.
- 92. It was noted that the background information on the status of aFADs in the region was already presented. Of particular note was that based on the WECAFC 2022 survey, the number of aFADs and fishers fishing on them reported in the region that 90 percent of the interviews reported a stable or increasing number of aFADs, indicated that aFAD fisheries were well established in the region and therefore careful and timely management of them was needed going forward.
- 93. There is a continuum in the deployment of aFADs in the region with some deployed by individuals, groups of individuals and some by government. Consequently, there is a range of access opportunities whereby the private aFADs are usually only accessed by the persons that deployed them while the Government aFADs are accessible to all fishers.
- 94. It should be noted that approximately 95 percent of aFADs are private and this has led to challenges. Firstly, when more fishers want access to the fishery, they will put out their own aFADs thus leading to increasing capacity (effort). So, more aFADs are deployed and there is an open-access arrangement with no limited entry. This leads to poor enforcement and additionally, as low-cost materials are often used in constructing these aFADs they have a shorter lifespan; this eventually can lead to a problem with marine litter.
- 95. Governance challenges have been recognized since 2015 and were updated in the 2022 review. Topping the list were enforcement of regulations that are associated with the IUU issue, transboundary fishing, management regulations and management plans not being in place, the organization of fisher groups and governance structure across stakeholder groups, representation in ICCAT, data collection and data sharing.
- 96. For preparation of the governance manual, some key informants were also approached to reaffirm their understanding of the governance challenges and a text analysis of their recommendations reflected similar concerns that ranged from science and monitoring support to management and MCS.
- 97. While many countries may indicate that they already have systems in place it must be queried if they apply the eight principles of good governance. Noting that these eight principles are embraced in the guidance on actions to be taken and the results expected in terms of what was included in the manual.
- 98. The layout of the manual was then explained. The four key elements are presented in the manual as key outcomes with the first being the need for a strong evidence base and importantly transparency in its management and usage. The second key element is transparent and equitable stakeholder

dialogue that is necessary for making balanced and acceptable decisions. This outcome includes the concept of "leave no man behind". A government commitment mechanism is needed for data-driven policy and that policy can be reviewed and adapted on a regular basis, which demonstrates government commitment as opposed to just having a policy just "sitting there". The final key element is a whole-of-government approach for greater policy coherence and also support for the policies being advocated within and for the fisheries sector.

- 99. It is proposed that each of these outcomes is managed by a cycle of steps, referred to as such as they should be repeated in a timely fashion. These steps require dialogue, planning, implementation, data analysis, review and evaluation, decisions and adaptation. Each of these cycles must also apply the eight principles of good governance.
- 100. The four management cycles were then presented after reiteration that they are process cycles as they are concerned with governance which is the process leading to the desired decisions and behaviours. The manual also presents minimum results for each management cycle, the actors and processes involved as well as presenting best practices for going forward.
- 101. The individual management cycles must also connect and for example, it is shown that the science management cycle is very important in connecting all of the cycles and needs to have an input in all the cycles. It was noted for example that the aFAD industry management cycle is part of an overall fisheries industry management cycle.
- 102. It was reiterated that each management cycle must include a range of steps that must be completed and repeated in a timely fashion.
- 103. Recalling that the first of the four proposed governance elements is to develop a strong evidence base and ensure transparency in management and usage. This means gathering and organization of information and knowledge and doing this in collaboration with other scientists and all stakeholders. In this context, the governance guide provides various ideas for achieving the necessary dialogue and identifies areas where the evidence base needs further development and documentation. It also proposes types of analyses to use with the evidence base to deliver multiple objective advice for balanced decisions. In addition, science communication for science understanding, a topic that is often ignored.
- 104. An example of the process including the elements just discussed was then presented.
- 105. The topic of best practices was then discussed. The major weak area for aFAD fisheries is building the evidence base, for example, in the area of data collection. The manual therefore describes some best practices examples to illustrate possibilities in this regard especially with the use of new technologies including some low cost and digital solutions. Examples of best practices included such as from Indonesia using low-cost Global Positioning System (GPS) tracking technology that could track vessel movements and estimate aFAD governance element outcome statement numbers and locations, the number of visits to aFADs, trip lengths and fishing time etc. The Vessel Monitoring System (VMS) trials for real time tracking and reporting of vessels to improve data collection including identifying important fishing areas and MCS by Montserrat and the customized mobile app developed by Dominica were also recognized. It was also noted that the University of the West Indies (UWI) which developed the Fisheries Early Warning and Emergency Response (FEWER), the ICT Solution in collaboration with the CRFM was looking to expand its use to facilitate the reporting of data by fishers.
- 106. Trials in the use of tools for multicriteria analysis and ecological risk assessment from the effects of fishing have been conducted in the region. Ecological risk assessment has been used by ICCAT in data limited situations and multicriteria analysis has increasingly been used for sustainable

- resource management because it helps to address a range of conflicting and multiple objectives in situations of risk and uncertainty as well as considering multiple decision options.
- 107. Both WECAFC and CRFM have and continue to facilitate platforms for knowledge and information exchange.
- 108. It was noted that the most important step in improving stakeholder dialogue is that stakeholders must understand the need to organize themselves and their information. The manual gives guidance on membership of the organization, leadership, cooperation with other cycles, the fact that they should give observer status to NGOs and the national fisheries authority. Stakeholder groups should be networking with the other cycles. They also need to build their own evidence base to develop and support their positions. It should not be subjective when they come to the table. Much of the work with stakeholder organizations has focused on developing leadership and managing the organization but they also need to develop their information sources about various issues of interest to the industry including, not only statistics and scientific research, but also social protection, keeping a tab on trade and economic issues, managing for results and also establishing partnerships with fishing cooperatives as they could help with certain types of business arrangements. It is recognized in the manual that sometimes existing resources are not utilized such as family and community resources who for example may have ICT skills, interpreting and explaining data, etc.
- 109. The industry management cycle is detailed in the manual and links distinct results with the outcome and speaks to them being organized and informed, having a conflict resolution process, having a formal mode of cooperation with the National Fisheries Authority and with government, making contributions to the evidence base and using the evidence base to develop positions and having access at the policy and management level. A lot of activities and guidance is included as to how the fisherfolk groups should go about doing this.
- 110. Best practices are included to show how fisherfolk groups have strengthened their leadership and organizational skills. There have been many aFAD fisheries projects focused on creating fisher groups and the formation of these fisher groups has helped to improve cooperation in data collection, aFAD design, construction and deployment, improved relations, support for regulations and improved meeting participation. These aFAD fisheries projects had several success stories that can be learnt from.
- 111. The Caribbean Network of Fisherfolk Organizations (CNFO), established in 2004, was highlighted as one of the fisherfolk groups in the region having become a strong organization in itself and many of its member national stakeholder organizations are active within their respective countries. The strong status of the CNFO and its members is the result of a sustained effort to build capacity, not only to manage the organizations but to improve their knowledge, communication and advocacy skills. There is good potential for the aFAD working groups to develop good working relationships with the NFO for national level representation and CNFO for regional and international representation.
- 112. The third outcome is government commitment. The government ministry cycle is required for Ministers to avoid subjectivity, bias and becoming outdated. So, this government element requires government commitment to data driven policy and being responsive in a timely fashion as and when policy needs to be changed. The membership needs to pay attention and proposes establishment of a Fisheries Management Forum, or whatever local legislation may refer to it such as a Fisheries Advisory Committee, Fisheries Council, etc. However, whatever it is called there is value in making good use of it. There must be a regular cycle of meetings and this forum must nurture the habit of receiving and processing scientific advice. Scientific advice must address multiple objectives, for example, the ecosystem approach.

- 113. The importance of information availability and dissemination was addressed. Virtual meeting platforms are acceptable if it can include all the groups and equitable representation is not lost. It is important for this forum to document the use of its scientific advice and have rules for applying the precautionary ecosystem approach because if the regional fisherfolk organizations have such rules, so should the national-level organizations. The forum's process should also be kept under review.
- 114. Best practice examples are found where the Government has a close relationship with the Fisheries Forum. For example, the Belize Fisheries Board has been in operation since 1965 and has only just recently been made into a Fisheries Council. This Board works closely with the Minister and their meeting are documented in reports. This gave transparency to this Board and although he did not have to, the Minister most of the times followed the recommendations of the board probably due to close and accountable relationship between the two parties. In the case of Suriname, Marine Stewardship Council Certification was the incentive for the Fisheries Department to establish a working group that included the Fisheries Authority, industry, NGOs and Regional Fisheries Bodies. This group has been active for several years. It has a website to provide information on its activities. The group has accessed expertise from WECAFC and CRFM at various times to support its work and importantly it gets decisions made despite even being only an advisory group. So even if the group is not legally mandated it is important to identify a cause that needs attention and work with a good cross-section to get the work done.
- 115. Other examples in the manual are from the Maldives where again the incentive was to attain Marine Stewardship Council (MCS) Certification. In this case, being an archipelagic state comprising a number of islands and atolls specific councils and these councils have some authority to manage fisheries within their respective jurisdictions, while adhering to the overall regulation decisions. The Maldives also has a Tuna Advisory Committee and even though it is only an advisory body with the incentives of the MCS ensures that the decisions are taken in the sector's interest. The Tuna Advisory Committee also closely collaborates with a Research Institute in the Maldives and that Institute in turn has a close connection with the RFMO in the Indian Ocean the right connections can expand to establish even more connections.
- 116. A whole of government approach is needed for policy coherence that supports the sector's needs and interests. The Caribbean Large Pelagic Ecosystem project tried to promote an ecosystem approach and several countries agreed to a ten-year strategic action program. The vision of the CLME SAP is multi-scaler and polycentric because it is at the large marine system level, and it is using an ecosystem approach to Fisheries. An essential target of the CLME SAP and a key building block recognized for the ocean governance framework was the establishment of a national intersectoral committee in each of the countries or a proxy.
- 117. The manual suggests that this group should be chaired by a minister and should have legal status. The manual advises paying attention to the membership of the committee, it should be intersectoral and it should follow the same rules and tasks as the government ministries fisheries management forum.
- 118. This group needs to be supported by both scientific and management arms. This is important because as noted earlier the scientific cycle is important for providing inputs into all the other management cycles. As such both arms must be present to facilitate data driven decisions. The National Intersectoral Committees (NIC) outputs must pay attention to everything and should produce products for various Ministries as well as for regional and international forums and for public education as well as solicit additional expertise as needed.
- 119. For the whole of government approach, results will be holistic national policies and management decisions for fisheries that incorporate trade-off analyses so that it is a balanced approach.

- 120. The ecosystem approach to fisheries will be achieved by an intersectoral approach with a whole of government approach there will be equitable use of human and financial resources and the efficiency aspect of good governance.
- 121. In terms of best practices, this has happened where governments have recognized the connectivity across the sectors reliant on ocean resources. For example, the regional ocean policy adopted by OECS States is a comprehensive framework on ocean governance to facilitate development of the Blue Economy and it has facilitated harmonization of the national ocean governance frameworks within the country's concerned. They are harmonized national ocean policies across the countries and it also recommended, and countries have acted on this, to establish national-level Ocean Governance Committees or similar bodies. These are the perfect bodies to serve as NICs. However, in some countries, such as Saint Lucia, they remain an advisory body. As such, there needs to be a cause to draw attention to the main concerns. In the case of aFAD fisheries issues such as conflicts with maritime shipping lanes and the issue of marine litter could be used to draw the attention needed to improve everything on the aFAD agenda. Essentially the right button must be found to push to make things happen.
- 122. Another best practice example is the establishment of specific Ministries that bring many of the ocean sectors under the same ministry for improved coordination. Mauritius has a national development and has developed a national ocean council and an ocean economy roadmap. Although it does not have a dedicated budget, and the national ocean council remains advisory, these challenges must be considered for how we move forward in terms of how to get these advisory bodies to deliver. In 2018, Barbados created a Blue Economy ministry to bring a number of the ocean sectors together and have created a Blue Economy roadmap.
- 123. The manual lists a number of identified issues that could be considered a starting point to identify issues that may be relevant particularly to national Fisheries. In addition to this list, it also gives some ideas as to how to approach them. For example, licensing rules for safety and knowledge tests for personal certifications.
- 124. Some governance challenges dealt with trans boundary fishing and mentioned illegal fishing and representation in ICCAT. In this context, it is very important for the National Cycles to link up with the regional and international management cycles. It should be noted that both RFBs, e.g. WECAFC and ICCAT, have scientific and management arms and work with subsidiary bodies. So, if arranged at the national level where there are strong scientific and management arms working in coordination, there will be improved participation in these regional and international management cycles, which will be mutually beneficial for all.
- 125. Finally, the whole of governance approach provides easier identification of synergies and required trade-offs in the allocation of human and financial resources. It also improves the complementarity of projects and programmes, especially those sponsored by development partners, maximizing efficiency and effectiveness. Legislation of the whole of government approach will also help with gaining funding support. Key informants agree that public-private partnerships were very important to establish for long-term economic sustainability. License fees were identified to fund some activities such as aFAD maintenance and sustainable financing case to inform the development of sustainable financing plans.
- 126. The SAG chair thanked Dr Singh-Renton for her excellent and comprehensive presentation of the guide and after giving a short synopsis of the key points presented opened the floor to discussion.

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Discussion

- 127. SAG noted that while there is a well-structured interactive mechanism between stakeholders and Ministers through the Fishery Advisory Councils (FACs), etc., there is also an important role for lobbyists or champions to prominently communicate and keep in the forefront, the decisions and positions of the stakeholders to the politicians. This is because politicians necessarily listen to a wide cross-section of the public but may end up being misguided, by people that are driven by private agendas, which in turn may result in Ministers not accessing the best advice and therefore not making the right decisions in relation to the industry. It is in this context that lobbyists for the cause, who may not themselves be or be best suited to lead the organization, have an important role in the process to ensure that the Ministers are always receiving the right information and advice for the industry.
- 128. Dr Singh-Renton agreed that there was a lot that goes on behind closed doors and it is important to develop intelligence on what one is dealing with in the industry. For example, at ICCAT you must understand all the parties and where they are coming from. This is where for all the cycles, that information gathering pays attention to all the agendas that are afoot, who is involved and who is the minister speaking with about the sector. Then bring these parties into the meetings and to understand their positions. It was agreed to strengthen the language to take this into account. It was noted that if faithful to good governance and accountability, these issues should eventually come to light.
- 129. Dr Singh-Renton then addressed a query raised by Mr Peter Murray (CRFM) in the chat as to whether the best practices outlined, incorporate gender-sensitive approaches. She noted that gender was not specifically discussed. However, in the context of women and youth in the community, the stakeholder cycle speaks to not to ignoring resources that are around you and are accessible to the group for example who may be very good at admin tasks, ICT and skills and that should be used. She opined that gender was a word that was very abused but that it was necessary to pay attention to gender. However, if you have good governance then all things including the vulnerable aspects such as gender ideally should be addressed because when we speak of stakeholder dialogue and equitability in representation and participation that equitability includes vulnerable groups and vulnerable groups are mentioned in the manual.
- 130. The SAG chair offered suggestions for where the concept of a lobbyist or champion that was raised earlier could be included in the manual. For example, by expanding on the list of players noted in chapter 2 item one, "Participation and representation of stakeholder groups".
- 131. The SAG Chair queried who is/which groups are going to pay for the governance, for example, the costs to various government and industry entities involved in implementing the fishery management plan.
- 132. The presenter noted: the governance manual does present some ideas on funding the governance. It is important for the country to first look at what structures are in place that can be built on to morph them into the cycles discussed for the aFAD fisheries. As always, everything may not be achieved in one go so it has to be taken in small steps to follow through. Note that we are not starting from scratch. There is already some evidence base, we already have information to improve management that could probably be brought to the ministry's table and the entire government table. Additionally, finding a cause that is important to other sectors in the government, such as the conflict with maritime shipping lanes, marine litter or some other issues that might be important not only for aFAD fisheries but to somebody else as well, can be used to help arrange meetings where the relevant players could discuss how to address these issues; what funds are available; what projects are coming on stream and with whom one can network. Fisheries ministries often work alone, and this is an error, for working with and leveraging activities being undertaken by other ministries, allowed the Fisheries ministry to take advantage of some of their resources to

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- carry out some of the work. It is necessary to be clever and focus attention to sourcing resources, noting what the specific interests are for each group such that efforts can align to bring the various activities together resulting in ultimately et addressing all the needs.
- 133. SAG Chair queried who would identify the priorities and under what umbrellas would they fall. This cannot be done through the working group but must be done at the levels of government and industry and as such this will become a process and this should be food for thought. Identifying these priorities would be a next step while considering what initiatives are already there along with what platforms exist and can be built on to put this into place.
- 134. The SAG chair concurred with the comment made by Peter Murray (CRFM) in the chat that the manual was a treatise on all good fisheries governance and not only for aFAD fisheries that can be considered broadly within the sector.
- 135. Monserrat congratulated Dr Singh-Renton on her work and noted that in that country, in relation to identifying the existing platform, the government's standpoint was that the CRFM is the lead organization that addresses issues and supports the Caribbean region in all fisheries and fisheries related management issues. He also noted the mention of the OECS and the OECS member states are also part of the region's ocean governance and the revised Eastern Caribbean Revised Ocean Policy (ECROP) is addressing issues that are coming forward. He considered that through CARICOM the CRFM is the lead on this issue and to move forward and it was incumbent on member states to address their priorities and when going to the Ministers of council that we put forward these priorities. They are currently in a transition period having a lot of elections and that is the priority now, but the oceans sustainability and food security is also an important priority. However, he believed that there was a framework in the region and he was pleased to be in a meeting a few days before in which the Caribbean region was charting the way for the blue green economy. What we need to do as member states is to continue to support this CRFM and the OECS collaboratively in advancing what we need to do.
- 136. The WECAFC Secretariat queried in the context of finalizing the manual, she concurred that the manual could cut across all the working groups and fish species so it can be used by the other working group as well. She considered it fortunate that for identifying best practices for the formulation of the manual that so many countries responded to the survey. She noted also that best practices from such French territories and the Maldives were mentioned, no feedback was received from OSPESCA and the Dominican Republic and asked Manuel Perez of OSPESCA if he could facilitate identifying best practices from OSPESCA states and the Dominican Republic to be integrated into the manual as it is being finalized. She asked Dr Singh-Renton if she would still be able to incorporate such information. She noted that while no particular example was furnished, she had received a reply from the Dominican Republic in the key informant survey and that information was incorporated in the manual, but any additional information could be incorporated.
- 137. Mr. Perez (OSPESCA observer) reiterated the importance of the FAD fisheries in the Dominican Republic as noted earlier in the discussion on the fishery management plan, and in particular emphasized the issue of the translation of the management plan into Spanish because many of these issues are handled in English, and most of them refer to the small islands of the Lesser Antilles where the FADs fisheries, although they exist, are of much less importance than the fishery that occurs in the Dominican Republic. Additionally, he noted the need to use multiple approaches when sending requests for surveys or form completion, namely not just to the national country but also through the Regional Directorate or Secretariat of OSPESCA. In such a way that there are two approaches for accessing information. Finally, he noted the issues of capacity relating to staffing and financing issues that are issues affecting all the OSPESCA countries and could have impacted the ability to provide responses. He further emphasized the continued willingness to provide support and any information needed on the Dominican Republic FAD fisheries.

- 138. The presenter indicated she would work with Mr Perez to incorporate any best practices that could be identified, while finalizing the document over the next two weeks.
- 139. There was additional input from SAG and CRFM about extending the relevance of the governance manual to other fisheries in the region. Trinidad and Tobago concurred with others that the manual is comprehensive enough for use in governance of fisheries in general and with the proposal that the title of the manual be amended to reflect its potential applications to fisheries governance in general.

REVIEW OF RECOMMENDATIONS AND RESOLUTIONS TO WECAFC 19

- 140. No new recommendations were presented for SAG XII; however, two revised recommendations were submitted and one recommendation form SAG XI was continued for consideration and are available at: www.fao.org/3/cc6552en/cc6552en.pdf:
 - a) Amendment to Recommendation WECAFC/XVIII/2022/4 (Updated 15 March 2023 at the Fifth Meeting) of the WECAFC Working Group on Spawning Aggregations (SAWG).
 - b) Amendment to Recommendation WECAFC/XVIII/2022/3 (Updated 16 March 2023 at the Sixth Meeting) of the WECAFC Working Group on Queen conch Draft amended Recommendation WECAFC/XVIII/2022/3 on increased efforts in the implementation of the regional Queen conch fisheries management and conservation plan in the WECAFC region.
- 141. The full content of the Draft Recommendations is presented in Appendix D.

Intersessional report by Working Groups, to include draft Recommendations to WECAFC19 and updated 2023–2025 Workplan (see Template recommended by SAG)

142. The activities of the individual working groups are captured in the document WECAFC/SAG/XII/2022/10 available at www.fao.org/3/cc6600en/cc6600en.pdf and is highlighted for each separate working group below.

1. Intersessional report moored fish aggregating devices (Convener, Colvin Taylor)

- 143. The report was presented by the convener of the aFAD working group Mr Colvin Taylor and is found at pages 42–51.
- 144. Mr Taylor summarized activities of the WG during the intersession. The WECAFC Working Group on Fisheries using aFADs met once during the intersession. The WG held its (hybrid) fifth meeting as the WECAFC WG, 17–19 April 2023 in Roseau, Commonwealth of Dominica, following the pulling out of IFREMER from the name of the WG after decades of support. In addition to this change, the end long ago of the Japanese International Cooperation Agency (JICA) project, made it essential to review further the name of the WG in streamlining its regional scope. The agreed name is the "WECAFC Working Group on fisheries using moored (or anchored) Fish Aggregating Devices" (aka aFADs instead of commonly known MFADs, to comply with FAO's suggested terminology).
- 145. An important development in the WG following the 18th Session of WECAFC (WECAFC18) held 26–29 July 2022 (Managua, Nicaragua) was the assignment of the convener to high level national duties in his country, hence becoming unavailable to coordinate the WG. A new convener was nominated at the fifth meeting (April 2023), with the commitment of Barbados. This was largely marked (i) by the establishment of a task force composed of a consultant and two member

volunteers (European Union and United States of America) who further developed the two instruments endorsed as interim instruments by the 18th Session of the Commission, (ii) assistance to Dominica in the development of a national aFADs management plan, (iii) the preparation of a draft aFADs Governance manual and (iv) the implementation of targeted activities of the 2023–2025 workplan of the working group, including assessing the feasibility for managing the publication of the existing four draft aFADs manuals from a CRFM-implemented project.

- 146. Primary objectives identified for the 2022–2023 intersession were in alignment with the TORs as updated at the SAG XI session. Main goals are: the WG is expected to contribute to the fulfillment of national and regional responsibilities for the marine environment and for the management of pelagic oceanic and coastal fisheries resources harvested using anchored/moored fish aggregating devices (aFADs) including large and small tuna, swordfish, billfishes, dolphinfish, and mackerels and related or interacting species or fisheries in the WECAFC Region.
- 147. The main accomplishments during the intersession period (2022–2023):
 - a) Reviewed guide for improved monitoring of aFAD catches and improved assessment of aFAD impact on stocks, interim Caribbean Regional aFAD Fishery Plan, Draft aFADs Governance manual, Draft National aFADs management plan of Dominica, work in progress for the national validation and cabinet's endorsement.
 - b) Preparation and publication of the proceedings of the fourth WG meeting: Report of the Fourth Virtual Meeting of the Joint WECAFC Working Group on Fisheries using anchored fish aggregating devices (aFAD), 14–16 February 2022.
 - c) Convened Fifth (hybrid) WG Meeting,17–19 April 2023. The objectives of the meeting included 1) Review data and recent developments and the state of play in Member Countries with aFAD fisheries and share experience on aFAD fisheries b) Review the progress of relevant regional and sub-regional activities, c) Discuss various working documents coming out of the implementation of the endorsed 2023–2025 workplan, namely, (i) the Caribbean Regional aFAD Fishery Plan as a result of the review of the CRFM sub-regional Management plan for aFAD fisheries to adapt it to a broader WECAFC regional plan and support Member's efforts to develop local/national management plans, (ii) the guide to develop local aFAD fishery management plans, (iii) the guide for improved monitoring of aFADs and assessment of impacts of aFAD fishing on stocks, (iv) the draft aFADs governance plan, and (v) manuals on the best practices in the fisheries using aFADs. On the latter, the approach to the existing manuals (two in draft version-, two published-, all to be in the three languages of the Commission) have been agreed.
- 148. The main challenge faced was the lack of the convener, which made the coordination of the WG relatively less effective than it would have been. However, with the support of the WECAFC Secretariat, engagement of the Task Force and the Consultant, and the assignment of Mr Derrick Theophille, Chief Fisheries Officer (Ag) of the Fisheries Division of the Commonwealth of Dominica who supported in the activity of a regional consultant for the national aFAD management plan development and in the organizational matters connected to local logistics of the fifth meeting, negative impact on the delivery of the WG was minimized.
- 149. The period in review 2022–2023 was short as an intersession but was undoubtedly a busy one for the WG. It was able to produce the key deliverables expected as follow up actions from WECAFC19 and more outputs, despite being without a convener. These are namely the interim Regional Caribbean Anchored aFAD fishery management plan, and the interim guide for monitoring of aFADs, in addition to the draft aFADs Governance manual. These documents which are aimed towards improving aFAD fishery management in the WECAFC region were well

received when presented at the fifth meeting of the WG and ready to be tabled at the SAGXII and WECAFC 19 subsequently. Hosting of the fifth working group meeting, including in-person attendance after the exigencies of COVID-19 provided a good opportunity and a platform for members to adequately review and comment on matters pertaining to the working group including the 2023–2025 workplan for WECAFC.

150. Proposed Workplan for 2023–2025 includes:

- a) Collaborate with IFREMER, academia, and other research institutions on the use of technology on aFADs (e.g. satellite-linked echosounders) for improved assessment of abundance of key fish stocks associated with aFAD fisheries which includes: establishment of points of contact, including research groups with expertise in drifting aFAD fisheries; request and share information on the use of technology on ongoing aFAD fishery products and research; consolidating and compiling information related to ongoing projects and research; develop proposals for regional research projects using aFAD technology in the WECAFC region in collaboration with the ICCAT Atlantic Ocean Tropical tuna Tagging Programme (AOTTP) and the Fisheries Data and Statistics Working Group in order to improve the knowledge of tuna movements in the Atlantic Ocean and the Caribbean Sea.
- b) Develop and finalize manuals on best practices on (1) fishing and business strategies for sustainable aFAD fisheries; (2) safety and working conditions of aFAD fishers; and (3) governance of aFAD fisheries. These manuals should be presented during training sessions with fishers which includes: editing and publishing draft manual on safety and working conditions in aFAD fisheries; seek funding and identify experts to draft manuals on fishing, business strategies and governance of aFAD fisheries and edit and publish these manuals.
- c) Collaborate on use of low-cost Information and Communication Technology (ICT) for improved monitoring of aFAD fisheries, noting the promising examples of Dominica and Montserrat and strengthen ties with Fisheries Data and Statistics Working Group which includes encouraging the transfer of peer-to-peer practices through learning exchanges of Fishery Officers and Fishers.
- d) Facilitate the sharing of data, information, and experiences related to aFAD fisheries in the region in collaboration with the Fisheries Data and Statistics Working Group through the transfer of peer-to-peer practices through learning exchanges of fishery officers and fishers.
- e) Review and finalize the Regional Management Plan for aFAD Fisheries in the Caribbean, the guide for improved monitoring of aFADs, and the guide for implementation of local aFAD fishery management plans by requesting WECAFC members to review the documents for their finalization.
- f) Support Members' efforts to develop (sub) national aFAD (co-)management plans and improved monitoring systems for aFADs including seeking funding and expertise to support development of local management plans and improved monitoring systems for aFADs.
- 151. The WG's workplan is presented in Appendix F

2. Intersessional Report of the WECAFC Working Group on conch (Convener, Dr Maren Headley)

152. The work of the joint Working Group on Queen conch (QCWG) was summarized in the document and is available at www.fao.org/3/cb9894en/cb9894en.pdf (see pages 2–5).

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- 153. The WECAFC Working Group on Queen conch (QCWG) was established in 2012 by WECAFC 14. This document outlines intersessional activities accomplished by the QCWG since the 18th Session of WECAFC (WECAFC18) held 26–29 July 2022 in Managua, Nicaragua. WECAFC 18 adopted recommendation WECAFC/XVIII/2022/3 on "Increased efforts in the implementation of the regional Queen conch fishery management and conservation plan in the WECAFC region." Following WECAFC 18, the sixth meeting of the QCWG was held on 16 March 2023.
- 154. The third meeting of the Queen conch Scientific, Statistical and Technical Advisory Group (QC/SSTAG) took place at the Miami Marriott Airport hotel and virtually on 12–13 April 2023. Main Accomplishments during the Inter-sessional Period by the QCWG (2022–2023). A summary of the meetings and recommendations of the sixth meeting of the QCWG and the third meeting of the Queen conch Scientific, Statistical and Technical Advisory Group (QC/SSTAG) are provided below.
- 155. During the 6th QCWG, discussions focused on monitoring the implementation of the Regional Queen conch Fisheries Management and Conservation Plan, various Queen conch recommendations and resolutions along with recommendations adopted at the 18th meeting of the Commission in 2022. Participants reviewed the CITES CoP19 decisions and recommendations and discussed the progress of activities as called for in the Workplan for 2023-2025. Various updates were given on projects, including an update on advancing data collection efforts for sustainable Queen conch fisheries being conducted under the project entitled, "Support to the secretariat of WECAFC for effective implementation of priority actions of the Programme of Work agreed at the 17th session of the Commission" being funded by the European Union. Participants learned about collaborative work on Queen conch, especially at the regional level, and an overview of the intersessional activities undertaken. These activities include a proposal to identify unique Queen conch genetic markers for the purpose of determining connectivity and enhancing traceability of the species, and a collaborative Blue BioTrade project aimed at improving sustainability and traceability for Queen conch in three WECAFC member countries. An amendment was made to the Recommendation WECAFC/XVIII/2022/3 on Increased Efforts in the Implementation of the Regional Queen conch Fisheries Management and Conservation Plan in the WECAFC Region. The purpose of this amendment was to reflect the CoP 19.233 Decision directed to Range States of Strombus gigas (currently Aliger gigas) which calls for Range States to provide progress reports on activities to the WECAFC working group on Queen conch.
- 156. The third meeting of the QC SSTAG collectively made the following recommendations: a) To prioritize the collection of statistically valid landings data which forms the basis for the implementation of many other research priorities and sustainable management interventions (e.g. NDFs, quotas, CF, etc.); b) To follow a stepwise approach to make broadly available a technical document on Queen conch conversion factors, including the estimation of the meat dirty weight and the number of individuals by unit of weight. The first step shall include publishing online the technical document in English, which is already available, followed by preparation of Spanish and French translations of the document, and a subsequent organization of training workshops at the sub-regional level to strengthen understanding of the methodologies included in the document and their proper use. A generation of appropriate definitions of various meat processing grades is expected to result from this initiative and c) To follow a similar approach with the accessibility/availability, publication and training of three Queen conch training modules regarding: (i) statistical sampling designs applicable to landings and fishing effort estimations in artisanal and commercial Queen conch fisheries; (ii) population density estimation in Queen conch fisheries with revision of diving technologies, operational procedures and experimental sampling designs for direct stock assessments; (iii) assessment of the mathematical and statistical models historically applied in Queen conch annual catch quota assessments, highlighting the impact of assumptions on the statistical data required. To apply the lessons and experiences gained on the methodologies utilized in the Jamaica pilot project aimed to improve estimation of Queen conch

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landings to other countries/areas of interest where Queen conch fisheries are relevant across the wider Caribbean Region. This pilot project is based on surveys, self-assessments of existing Queen conch statistical systems and multistakeholder participation. To support CITES' efforts to help ensure that international trade in Queen conch is sustainable and legal through improving NDFs; moving beyond general recommendations for multiple species to conduct better analysis of the species' overall population sustainability and health; confronting increasing threats from climate change, natural disasters, and IUU fishing; and addressing the limited understanding of the species' reproduction, recruitment, and their relationship with conch densities. Application of the precautionary approach and introduction of stronger statistical approaches to collect relevant fishery and biological information at the unit of stock/population level are urgently needed. f) To work collaboratively in securing funding and collaboration towards implementation of the six top research priorities (Annex 3) agreed upon at this meeting. g) To promote the establishment of an educational team that is closely linked to the QC SSTAG to support the planning of more structured and enhanced training and education initiatives regarding the Queen conch. h) If possible, explore ways to allow QC SSTAG representation (through its coordinator) at the next CITES animal committee meeting.

- 157. Six priority areas: Queen conch NDF Guidance; 2) Improving Queen conch landing and monitoring statistics in the WECAFC Region; 3) Comprehensive determination of Queen conch genetic connectivity; 4) Increasing use of information on adult population dynamics for assessing ongoing sustainable exploitation; 5) Establishing methods alternative to the shell/lip-based minimum sizes to avoid landings of the shells; 6) Developing alliances for generating high-resolution habitat maps.
- 158. During the past two years, two Task Force Committees have been operative, one for Queen conch and another for spawning aggregations issues. These committees have representatives of the WECAFC Secretariat, NOAA Fisheries and its associated CFMC, the Working Group Convener, a strategic group of experts, and a Scientific liaison, thus following a participative approach. The Task Force Committees conduct periodic meetings, agree on short-term assignments, follow an adaptive planning strategy, look for funding opportunities including writing and submitting proposals in coordination with the WECAFC Focal Points, and provide technical advice as required. The one that deals with the Queen conch issues have achieved the following: (a) Support for the establishment of a Queen conch Statistical, Scientific and Technical Advisory Group; (b) drafting and approval small grants to improve communication; and (c) drafting, submission, approval and implementation of a small grant for improved collection of Queen conch landing data.
- 159. The challenges faced by the Queen conch fisheries throughout the region included: a) Ongoing lack of financial resources for fisheries data collection, field research and enforcement programs related to Queen conch at the national level, b) Limited implementation of the QCWG and WECAFC recommendations including: Recommendation WECAFC/XVII/2019/12 "On improved compliance with trade measures for Queen conch"; Recommendation WECAFC/XVIII/2019/13 "On Queen conch conversion factor"; and Recommendation WECAFC/XVIII/2022/3 on Increased efforts in the implementation of the Regional Queen conch fishery management and conservation plan in the WECAFC region, c) Limited implementation of the 14 management measures set out in the Regional Queen conch Fisheries Management and Conservation Plan, d) IUU fishing by foreign vessels, e) implementation of a pilot project aimed at improving statistical collection of data in Jamaica.
- 160. Steps taken to mitigate these challenges during the 2022–2023 period included development and identification of six top priority research areas to increase the utilization of conversion factors and provide training in stock assessment. CITES is also working on a number of activities to improve management of Queen conch, including a NDF technical guidance workshop and implementation

- of Phase 2 of the Blue Biotrade Project. The QC SSTAG will also be aiming to mainstream the use of the three updated modules for Queen conch stock assessment along with providing training online and in person.
- 161. The QCWG continued to actively implement the 2023–2025 Workplan through the successful completion of the 6th Meeting, intersessional meetings of the QCWG Task Force and one meeting of the Scientific, Statistical and Technical and Advisory Sub-group (SSTAG), which developed a number of recommendations. These recommendations covered: improving collection of statistical data; mainstreaming and use of the technical documents on conversion factors and the three stock assessment training modules; and obtaining funding to implement the six identified research priority areas.
- 162. The WG workplan is presented in Appendix E.

Discussion

3. Intersessional report of the WECAFC Working Group on Spawning Aggregations (SAWG) (Convener, Myles Phillips)

- 163. The intersessional report of the SAWG was presented by Mr Myles Phillips. The report can be found at pages 2–23.
- 164. The WECAFC Working Group on Spawning Aggregations (SAWG) was established in February 2012 by the 14th Session of WECAFC. Intersessional activities accomplished since Eleventh Session of the SAG and the 18th Session of WECAFC (WECAFC18) held 26–29 July 2022 in Nicaragua, Central America were presented. Several key documents were endorsed at WECAFC18, including (i) Recommendation WECAFC/XVIII/2022/4; (ii) a tailored Terms of Reference (TOR) for the SAWG; (iii) a 2023–2025 Workplan; (iv) a Regional Fish Spawning Aggregation Fishery Management Plan (RFSAMP) with a focus on Nassau grouper (*Epinephelus striatus*) and mutton snapper (*Lutjanus analis*); and (v) an accompanying Communications Strategy entitled, "Big Fish".
- 165. The 2023–2025 Workplan has come into operation during the intersessional period, with notable achievements including the Fifth Meeting of the SAWG in Puerto Rico in March 2023, and funding secured from the European Union Directorate-General for Maritime Affairs and Fisheries (DG MARE) for pilot implementation of the RFSAMP and Communications Strategy. An associated pilot project is due to be launched in three member states during summer 2023. The working group's task force has continued to work assiduously to lay the groundwork for accomplishment of multiple workplan line items and to propose revised recommendations to the Commission in pursuit of its mandate for conservation and management of fish spawning aggregations.
- 166. Main accomplishments during the intersessional period were:
 - a) Convene the Fifth meeting of the WECAFC Working Group on Spawning Aggregations (SAWG-V) as a hybrid meeting (San Juan, Puerto Rico, 14–15 March 2023). The objectives of the fifth Meeting included, inter alia; (i) to discuss and mainstream the RFSAMP; (ii) to discuss and mainstream the new TOR; (iii) To update/consolidate the 2023–2025 SAWG Workplan; (iv) Mainstreaming the Recommendation WECAFC/XVIII/2022/4; and (v) to present and discuss the implementation modalities of the new European Union-funded project. Member states and partners from non-governmental organizations provided updates regarding the status of FSA resources and research, and the plenary discussions facilitated the revision and update of the workplan and recommendations for activities through 2025.

New recommendations (revised since WECAFC 18) arose for (i) the formation of a new Fish Aggregation Management Plan Coordination Committee, which would function to facilitate broad implementation of the newly endorsed RFSAMP and (ii) the elevation of Nassau grouper and mutton snapper as WECAFC Group 1 species to emphasize their institutional priority under the RFSAMP. Finally, discussions were held to outline the best approaches to operationalize incumbent communications products and emerging collaborations with the WECAFC Fisheries Data and Statistics Working Group (FDS-WG) under the auspices of the European Union DG MARE funded project.

- b) Develop and submit research proposal to European Union DG MARE for support entitled Funded Project "Improving ecosystem approach to fisheries by advancing fish spawning aggregation information gathering and increase of public engagement in the WECAFC region". Project approved by the European Union DG MARE at the end of 2022 and will be implemented by FAO over the course of a 14-month period through a letter of agreement with a service provider agency. It will serve as a three-country pilot of many aspects of the RFSAMP, Communications Strategy, and facilitate modification of the WECAFC Information System (WECAFIS) and Data Collection Reference Framework (DCRF) to accept FSA related data and information. The mode of implementation involves three interrelated components, loosely interpreted as the following: (1) Compilation of fishery-dependent, fishery independent, socio-economic and trade information related to fish spawning aggregations to assess species ecological and management status; (2a) Regional harmonization of data collection and archival protocols; (2b) incorporation of compiled information into long term databases (i.e. WECAFIS); and (3) the launch of a digital communications hub as a multimedia repository for education and capacity building resources. The project will be piloted in Belize, Cuba, and the Bahamas, and should be completed in 2024. The letter of agreement is in its final phases of approval, and the project is due to be initiated imminently.
- c) Progress the work on the Educational "BigFish" Communication Campaign. The multimedia BigFish Campaign has advanced several of its deliverables, including the production of films, educational materials, and media components such as radio spots, podcasts, and public service announcements. These communications products are designed to target specific key stakeholder groups, and will cover topics including management, science, and alternative livelihoods for resource users. These products will be hosted on the "BigFish Communications Hub", a website which will serve as a point of open access to these resources for the public, provide a platform for coordination and communication between stakeholders, and serve as the online presence of the WECAFC-SAWG. An hour-long documentary called "Treasure of the Caribbean", referred to as "The Secret Crown" during its development, was released in April 2023 on PBS Nature. A major item on the SAWG Workplan, it serves as a highly engaging communications tool on the management, ecology, and threats to spawning aggregations of Nassau Grouper. More information can be found on PBS' website: www.pbs.org/wnet/nature/about-treasure-caribbean/28747/
- 167. Challenges and Mitigating Steps during the intersession included that the signature of the letter of agreement between FAO and the service provider for the European Union DG MARE project has been delayed by several months by administrative deliberations. This will, no doubt, necessitate seeking of a no-cost extension to the project, shifting its end date into the third quarter of 2024.

Conclusions

168. The last intersessional period built upon the monumental successes achieved at WECAFC 18 with the endorsement of the RFSAMP and other guiding documents. It was noted that the WECAFC-SAWG has turned its attention to implementation, with a view to capitalize on the existing inertia

by promoting widespread adoption, expanding its portfolio of educational and capacity building tools, and creating open access protocols to enable and harmonize collection of data on FSAs across the region.

169. The SAWG workplan is presented in Appendix E.

4. WECAFC Fisheries Data and Statistics Working Group (FDS-WG) (Convener, Nancie Cummings)

- 170. Ms Nancie Cummings presented the Report of the FDS-WG Intersessional Activities. The report can be found at pages 23–28.
- 171. It was reiterated that one of the primary objectives of the FDS-WG is to strengthen collaboration on fisheries data and statistics matters among the three regional fisheries bodies (WECAFC, CRFM and OSPESCA) and to reinforce national capacities to improve data collection, processing and dissemination for support to evidence-based fisheries policy making. In carrying out its mission, the FDS focuses work in three areas: 1) Data collection at national level, 2) Data sharing and harmonization at regional level, and 3) IT management and maintenance of the Regional DataBase (RDB)
- 172. At the most recent Commission session (WECAFC 18th) (Managua, Nicaragua, July 2022), the FDS-WG presented recommendations relating to the iDCRF, the regional data base, and on capacity building needs. At that session, the 'Data Collection Reference Framework (DCRF) and its appendices (WECAFC/XVIII/2022/9)' including in particular Appendix 2, "WECAFC subareas" and Appendix 3, "WECAFC Reference list of main species" were adopted as presented. Part 2 of the recommendation addressed the regional database- the Western Central Atlantic Fisheries Information System ("WECAFIS", formerly referred to as RDB) and was fully endorsed. It was noted that the WECAFIS has the mandate to disseminate data and statistics covered by DCRF with due consideration of DCRF data access and sharing rules, as well as FIRMS information on status and trends of fisheries and stocks under the WECAFC competence area. Part 3 of the FDS-WG recommendation address the continued need for capacity building and collaborative interactions recognizing 1) that the WECAFC-FIRMS project provides a collaborative platform for collation and sharing of scientific information, leveraging ongoing regional projects, and prioritizing national data needs, 2) identification and prioritization of capacity-building investments and projects is key to improving science-based decision-making, and 3) further investments are vital to build national capacities of WECAFC Members for data collection, analysis, and reporting with priorities on the DCRF and feeding the WECAFIS through the SAG process.
- 173. Implementation of intersessional activities was within the context of its TORs as contained in the report of the first and second meetings of the FDS-WG (May 2018, April 2022), and the Conclusion meeting of the FDS-WG2 in March 2022. Primary tasks were: a) Publish the v1.0 of the Data Collection Framework as an FAO Circular; b) Finalize WECAFC List of Aquatic Species, proposal for subareas and other appendices; c) Progress intersession discussions of WECAFC proposals for statistical reporting; and d) Advance the work on WECAFC-FIRMS inventories of fisheries and stocks and initial steps towards operationalization of the Regional DataBase ("WECAFIS") through i). regional data calls and data preparatory workshops and ii) supporting initial training to WECAFC Members in completion of DCRF tasks.
- 174. Achievements made during the intersession included: a) progressing the publication of v1.0 of the Data Collection Framework as an FAO Circular, b). Finalize WECAFC List of Aquatic Species, proposal for subareas and other appendices; c) progressing intersession discussions of WECAFC proposals for statistical reporting, d) advancing WECAFC-FIRMS inventories of fisheries and stocks and initial steps towards operationalization of the Regional Database ("WECAFIS")

through i. Through regional data calls and data preparatory workshops and ii) Through supporting initial training to WECAFC Members in completion of DCRF task inputs towards implementation of the DCRF; e) Fishery sheets were updated for Dominica (Reporting year 2022) and Suriname (Reporting year 2022) and new fishery fact sheets were developed for Dominica (Reporting year 2022) and Nicaragua (Reporting year 2019) and Saint Vincent and Grenadines (Rep. year 2022). The full list of stocks and fisheries fact sheets reported for the WECAFC region is available at WECAFC Stocks and Fisheries and at FIRMS.

- 175. Planned activities during the coming intersession period (2023–2025):
 - a) WECAFC-FIRMS focal points to continue outreach to national scientists for:
 - a. increasing awareness of need for and importance of updating fisheries marine resource and fact sheets; and
 - b. increasing capacity of national scientists to update fact sheets in a timely manner-through implementation of scheduled data calls;
 - b) initiating more formal discussions with CRFM and OSPESCA focal points toward identifying
 - c) identifying outreach activities with national scientists towards producing required inputs for operationalization of the DCRF;
 - d) data preparatory training workshops for DCRF and FIRMS data submissions; and
 - e) continuing the collaborations recently initiated and initiating new initiatives to advance statistics in the region with the aim towards harmonization with the DCRF and towards modifying the DCRF where needed to accommodate specific data collection needs across the multiple working groups (e.g. SAWG).
- 176. Challenges faced by the FDS during the intersession were several. FDS-WG did not meet in-person during the intersession however, the WECAFC-FIRMS taskforce and the WG Convener met several times (on an irregular basis) and through these virtual sessions the core work of the FDS-WG progressed. Additional resources will be needed to 1) further advance Members capacities to report statistics to the WECAFIS and to update and develop new FIRMS products and 2) ensure publishing and dissemination of products from FDS-WG activities.
- 177. The intersession period since FDS-WG2 (March 2022) was characterized by medium level of activity necessary to carry out the workplan. The intersession activities required a high level of collaborations with the WECAFC-FIRMS taskforce members and staff from FAO Headquarters and the Secretariat. The continued work to publish the DCRF, updating existing fact sheets, developing new fact sheets, initiating capacity initiatives presenting the operational characteristics of the WECAFIS, initiating new efforts involving collaborations with the FDS-WG and species working groups towards aligning the data collection with the DCRF- all marked good progress towards the aim of progressing members' capacities to collect and report statistics to better inform regional data and statistics, a core aim of the FDS-WG mission. If these basic core activities are continued, expected improvements in regional information available for management and stock assessment will follow.
- 178. The FDS-WG workplan is presented in Appendix E.

5. Regional Working Group on illegal, unreported and unregulated fishing (RWG-IUU) Convenor: Peter A. Murray

179. The intersession report of the IUU-WG was presented by Mr Peter Murray. He summarized activities since SAG IX and WECAFC 18, noting the activities performed by the group. The report is found at pages 79–84. Implementation of activities was within the context of its TOR as enshrined in the report of the First Meeting of the RWG-IUU in March 2017 and regularized/revised based on mandate of WECAFC 17. It was noted that the joint working group was established in 2014 by the 15th Session of WECAFC.

180. Main accomplishments during the intersession:

- a) Assessment of WECAFC Members' readiness to implement the RPOA-IUU. The readiness study carried out in 2020 remains "state of the art" with regard to the level of readiness to implement the RPOA-IUU. The top two needs appear still to be budgetary/financial assistance, and training and capacity development, with limited significant differences across the regions. PSMA Parties were seen, on average, to be readier to accomplish the measures in comparison to the other WECAFC member states. The overview of the recommended strategic implementation plans, proposed in the study, for the consideration of the member States still appears (on the surface) to be valid. These strategic recommendations can provide an opportunity to address the identified readiness gaps based on the requirements in the RPOA-IUU.
- b) Determining implementation status in WECAFC member states of the RPOA-IUU. Overview: Caribbean Regional Fishery Mechanism (CRFM) member states Most of the measures taken by CRFM member states still appear to have been at the policy and regulatory level, though there is recognition of the need to put in place and/or strengthen enforcement/compliance measures. Concern has also been expressed regarding the need to redouble efforts at collaboration and cooperation from importing countries. While only eight (8) CRFM member states are Parties to the PSMA5, they all remain committed to the Caribbean Community Common Fisheries Policy (and its protocols) and the CRFM MCS Strategy; and since 2017, eight (8) of these States have had (a total of 93) personnel receiving some level of training in Fisheries Prosecution and Interdiction as part of a joint initiative between the CRFM Secretariat and the Regional Security System (RSS) through its Training Institute and the CRFM Secretariat. As noted previously, CRFM member states participate in the RWG-IUU and WECAFC and have endorsed the Regional Plan of Action to Prevent, Deter and Eliminate Illegal, Unreported and Unregulated (IUU) fishing (RPOA-IUU) in the region. Three CRFM member states had developed National Plans of Action to Prevent, Deter and IUU fishing (NPOAs-IUU), prior to 2019 and five (5) are currently working on developing their NPOAs-IUU utilising the model/ template developed by the CRFM Secretariat. The CRFM Secretariat continues to specific technical guidance and assistance to its member States when called upon to do so.
- 181. It was recognized that the CRFM Secretariat continues interfacing with the UNODC Global Maritime Crime Program. The CRFM Secretariat also collaborates with the CARICOM Implementing Agency for Crime and Security (IMPACS) and is a member of the working group on the development of this regional Maritime Security Strategy. CARICOM IMPACS utilises a Maritime Domain Awareness (MDA) tool that provides reports to give an idea of the flagged vessels, recognised in the system as fishing vessels, that incur into member states waters. Regular reports are shared with member states' border control agencies (coastguard, police, defence force as appropriate). IC shares monthly summaries of the "fishing reports" coming from Windward, with the CRFM Secretariat, and as appropriate, has begun monitoring vessels "flagged by the system as probably being involved in illegal fishing".

- 182. Fourteen (14) CRFM Members have become signatory to the International Declaration on Transnational Organized Crime in the Global Fishing Industry (also known as the 'Copenhagen Declaration'). CRFM Member Countries and Secretariat participated in the international Blue Justice Conference held at UN City, Copenhagen, Denmark, 23-24 March 2023, co-hosted by the Norwegian Ministry of Trade, Industry and Fisheries and UNDP, in cooperation with CRFM and a number of other partners. The conference objectives were: to share experiences, highlight challenges and inspire creative solutions towards strengthened interagency cooperation and international cooperation to address fisheries crime; to highlight innovative digital tools and opportunities available through the Norwegian Blue Justice Initiative to address fisheries crime, such as the Blue Justice Community digital platform administrated by UNDP; and to facilitate technical support in use of these digital tools, including Automatic Identification System (AIS) and satellite based information. At the conference, it was formally announced that Jamaica, in November 2022 with support from the Blue Justice Initiative, had launched a Multi-agency Fisheries Crime Coordinating Mechanism to combat organized crime in the fishing sector. The CRFM Ministerial Council has since encouraged other member states to set up similar Multiagency Fisheries Crime Coordinating Mechanisms to that of Jamaica, with appropriate support from the CRFM Secretariat, to combat organized crime in the fishing sector. A "Caribbean Blue Justice Hub" was also formally launched at the Copenhagen conference, to be hosted by Jamaica, that will serve as a focal point for the priorities and next steps mapped out at the CRFM regional technical meeting, held in March of 2022.
- 183. Consequent upon logistical and convener availability issues, a fifth meeting of the RWG-IUU was not held in the intersessional period.

Challenges faced by the WG during the intersession.

- 184. With regard to implementing measures stated in the RPOA-IUU, some countries are still not currently ready to develop national strategies and procedures for combatting IUU fishing with due regard to port, flag, coastal and market state obligations; nor to adopt and implement measures on the marking and identification of fishing vessels in order to improve transparency and allow a better identification of noncompliant vessels, or to develop regionally harmonized national inspection plans. Resource limitations hamper many countries' ability to establish fisheries enforcement units in their fisheries agencies and to formalize an inter-agency information sharing and coordination mechanism at the national level for relevant agencies. Increased incidence of extreme meteorological events due to climate change continues to make the job of fisheries monitoring, control, surveillance and enforcement (MCSE) that much harder.
- 185. Consequent upon the COVID-19 pandemic, MCSE capabilities and resources of fisheries administrations were reduced. There has been no indication whether this situation has improved since the "relaxing" of the pandemic. The top two needs of member states still, anecdotally, appear to be budgetary/financial assistance, and training and capacity development. Related to the issue of capacities continues to be the ability of States to make optimal use of the wealth of data available, such as that obtained through MDA tools, including through in-country discussions between Fisheries, Coast Guard, Defence, and Maritime administrations and other such agencies, to effectively analyse such data to derive insights and information to assist with combating IUU fishing.
- 186. At the regional and sub-regional levels, the issue of budgetary/financial resources and the concomitant training and capacity challenges still appears to need to be addressed. Training is needed in various fields to enhance the capacity to strengthen the implementation of the PSMA and relevant international instruments. While five (5) CARICOM/WECAFC member states are currently working towards adopting a NPOA-IUU, some member states still have not ratified, adopted or acceded to the relevant international fisheries instruments (such as the PSMA). Gaps still appear to remain in the legal frameworks and inter-agency coordination. Importantly, information sharing, and cooperation needs to be improved, both on the national and the regional levels. This

- includes the introduction of mechanisms and tools to effectively identify vessels engaged in IUU fishing and related activities and to take coordinated action against the vessel operators.
- 187. While the use of MDA tools can enable greater insights into activities in the maritime space of member states, particularly with respect to the vessels using the AIS and their activities in these spaces. maritime law enforcement (MLE) units, which receive information directly, need to be better organized in utilizing the data, including carrying out trend analyzes to improve planning and execution of fisheries patrols in their respective jurisdiction. In all cases, greater capability is required to facilitate routine operations, extending to the outer limits of their jurisdiction.

Discussion

188. There was no updated workplan presented.

6. Report on intersessional activities (2022–2023) of the WECAFC working group on Caribbean Spiny Lobster (CSL-WG) Convener: Yesuri B. Pino

- 189. The Report of the Intersessional Work of the Caribbean Spiny Lobster was summarized in the document WECAFC/SAG/XII/2023/10 and is available at: www.fao.org/3/cb9894en/cb9894en.pdf (see pages 53–96).
- 190. This report compiles the main activities undertaken during the intersessional period (2022–2023) with the aim of showcasing the progress achieved by the Caribbean Spiny Lobster Working Group (CSL-WG) with respect to the Workplan and suggesting new activities that will enable the achievement of its objectives.
- 191. This Working Group held its last meeting on 21–23 March 2018 in Santo Domingo, Dominican Republic. This was the second meeting of the CSL-WG and took place in person. The endorsed Workplan for 2023–2025 envisaged holding the third meeting of the CSL-WG at the end of December 2022, in virtual mode. However, during the WECAFC Working Group Convenors meeting, WECAFC Secretariat confirmed it could fund and support the organization of the third meeting of the CSL-WG in the first quarter of 2023, as two meetings of other working groups were already underway. Despite the above, the meeting has not been held.
- 192. The objectives of this report are: (i) presenting the background of this Working Group and the main activities carried out between mid-2022 and early 2023; (ii) showcasing the progress achieved in this intersessional period; and (iii) suggesting updates to the established Workplan that will enable the achievement of the Working Group objectives and the implementation of the activities scheduled in the Regional Management Plan for the Caribbean Spiny Lobster Fishery (MARPLESCA Plan, for its acronym in Spanish).
- 193. The main achievements of the Working Group have mainly corresponded to the activities undertaken by the Caribbean Spiny Lobster Joint Regional Working Subgroup, composed of representatives of Central American Organization of the Fisheries and Aquaculture Sector (OSPESCA) and Central American Integration System (SICA). Based on the projects and consultancies carried out, substantial improvements have been made to the Caribbean spiny lobster stock assessment model. These updates have made the analysis more automated and easier to use. At the same time, a new option was included in the model to prepare the input data for the cohort analysis from those fisheries where the Caribbean spiny lobster is landed in bulk, generally in artisanal fisheries where catches are not directed to a processing plant or categorized.
- 194. The major challenges and issues faced during the intersession period have been: a) Limited availability of group members to provide active and timely feedback and ii) lack of continuity of staff in national fisheries offices, iii) Lack of support staff to implement the proposed activities

in each country, iv) Low budget allocation for the implementation of the Workplan activities in member countries. Thanks to an external consultant back-funded by the "Value Chain Integration in Fisheries and Aquaculture" project (INCAVPESCA, for its acronym in Spanish), who coordinated different activities and managed several meetings, and the financial and logistical coordination provided by OSPESCA, progress was made in various activities, which contributed to the overall achievements that can be extended to the whole region.

- 195. Activities carried out during the intersessional period (2022–2023):
 - a) Workshop and meetings convened by WECAFC Secretariat;
 - b) WECAFC Working Group on Spiny lobster;
 - c) Regional course on the use of an updated Caribbean spiny lobster stock assessment model, held on 4–7 October 2022 in person in Comayagua, Honduras. Two of the main objectives were: (i) training technicians from SICA member countries, in particular the WECAFC Working Group on Spiny lobster members, on the updates made to the Caribbean spiny lobster stock assessment model featured in the MARPLESCA Plan; and (ii) reviewing the implementation of national databases as a follow-up to the regional course held in November 2021;
 - d) Follow-up meeting (virtual) of the WECAFC Working Group on Spiny lobster;
 - e) Subgroup on 17 February 2023. Main objective: Presenting new adjustments to the Microsoft Excel cohort analysis module of the stock assessment model, identified during the workshop held in November 2022;
 - f) development of project proposals on regional research draft project proposal delivered in May 2023 to the SICA-OSPESCA Regional Directorate on a reproductive study of the Caribbean spiny lobster (*Panulirus argus*) in the Caribbean coasts of Belize, Costa Rica, Guatemala, Honduras, Nicaragua, Panama and Dominican Republic; and
 - g) progress towards implementation of the updated Regional Management Plan for the Caribbean Spiny Lobster Fishery (MARPLESCA Plan):
 - a. Stock assessment model of the MARPLESCA plan new software application for the Caribbean spiny lobster stock assessment was developed in Microsoft Excel using commercial categories data from processing plants as a basis. In November 2021 the application was presented and distributed to SICA/OSPECA member countries.
 - b. Technical assistance and support was provided for the use of this software tool aimed at assessing Caribbean spiny lobster stocks. Whilst providing technical assistance, a number of findings were made in the Microsoft Excel model that suggested the convenience of reviewing the software application. To this end, technicians from the Nicaraguan Institute for Fishing and Aquaculture (INPESCA, for its acronym in Spanish), who had developed the MARPLESCA Plan model, worked in implementing the suggested improvements with the aim of refining the Caribbean spiny lobster stock assessments.
- 196. Activities anticipated during the intersession include: a) conducting sampling for presence of locust virus, b) drafting proposal for a regional reproductive survey, conduct regional review of management plan, and continue updates of stock assessment model, and convene 4th meeting of the WG.

Challenges noted include:

- a) To achieve greater efficiency in the development and scope of work of the CSL-WG, coordination and advice should be provided by an external collaborator.
- b) To improve the coordination of future meetings, WECAFC Secretariat should request member states to designate a new representative in charge of monitoring the CSL-WG.
- c) There are obvious challenges in sampling and data collection: logistics, access to plants, insufficient funding and low availability of staff in most countries.
- e) It was noted and thanks to external funding, the continuation of activities and training of technicians from member countries, progress has been made in data collection, in addition to substantial improvements in the applicability of the MARPLESCA Plan stock assessment model.
- 197. The WG's workplan is presented in Appendix E.

ANY OTHER MATTERS

- 198. Developing from the discussions under agenda item 12, the following should be noted:
 - a) The upcoming SAG meeting will probably be held in 2025 prior to WECAFC20.
 - b) Ms Cummings made a suggestion for SAG to work with the FDS-WG and also seek inputs from other WGs on the topic of elevating some species from group 2 (*Other Reference Species*') to group 1 ('*Main Reference Species*') as it relates to data collection under the DCRF framework.

TIME AND PLACE OF NEXT MEETING

- 199. In accordance with the Rules of Procedure, the exact dates will be determined by the Director-General of FAO in consultation with the WECAFC Executive Committee and the competent authorities of the host institution.
- 200. Ms Diei Ouadi further noted the SAG meets the year that precedes the WECAFC plenary. Possibly, WECAFC 20 will be held in 2025.

ADOPTION OF THE REPORT

- 201. The refined key recommendations from the SAG were presented by Ms Yvette Diei Ouadi, Secretary of WECAFC. It was also decided that the revised recommendations with tracked changes and a clean version would be circulated to the SAG members and observers for further review.
- 202. Ms Cummings thanked the SAG members for their support, the Secretariat for logistical support, and all the observers for their patience and their good and informative inputs.
- 203. Ms Diei Ouadi thanked everyone, consultants, FAO Staff, WG conveners, observers, the interpreters (excellent new team) and the members of the SAG.
- 204. The meeting was adjourned at 13.30 hours on 20 June 2023 following closing remarks by the Chair, who thanked all present, and expressed the hope that she could count on their support in the upcoming SAG.

APPENDIX A – OPENING ADDRESS ON BEHALF OF THE SUBREGIONAL COORDINATOR FOR THE CARIBBEAN

Twelfth (Virtual) session of the Scientific Advisory Group Monday, 19 June 2023

Dear Edward Abella Jackson, Chairperson of the Western Central Atlantic Fishery Commission/WECAFC,

Distinguished experts of the Scientific Advisory Group (SAG), Working Group Conveners, observers from member countries and partner organizations, and FAO colleagues:

- a) I wish to convey the cordial greetings and apology of Dr Renata Clarke, Subregional Coordinator of the FAO Office that hosts the Secretariat of WECAFC. She is currently out of the office and requested me to deliver these speaking notes.
- b) It is always my pleasure to address a meeting of the Scientific Advisory Group (SAG), the scientific "arm" of WECAFC, to advance the realization of the 2030 agenda for Sustainable Development, especially the Goal 14: Conserve and sustainably use the oceans, seas and marine resources for sustainable development, a Sustainable Development Goal (SDG) for which FAO is a custodian agency.
- c) The contribution of the Commission to the management and development of the living marine resources of its area of competence based on the best available information and data, is primarily driven by this advisory body, which is led by selected resource persons with suitable scientific qualifications and experience in fisheries, who serve in their personal capacity to generate key advice to the Commission and its ad hoc working groups; and this, in keeping to its independence and integrity.
- d) SAG is therefore crucial to the informed conservation and management measures development by the main governing body of WECAFC (The Commission); and the meeting of SAG is as essential as is the Plenary session of the Commission, which it usually precedes.
- e) This meeting is being held almost a year after the last one of SAG, to provide the relevant advice to the 19th plenary of WECAFC slated for the 6–8 September 2023 here in Bridgetown, an exceptionally short intersession. It is indeed convened in order to be aligned with the meeting cycles of the FAO Regional Conference for LAC, the highest governing body in its instance of the organization.

Distinguished participants, Ladies and gentlemen,

- a) As you may recall, this team of SAG was established in March 2021 and elected its Chair on 29 December 2021. This followed almost two years of reform, after which members recommended to increase the number of scientists to nine (9). Three positions are still to be filled, but this low membership did not preclude the group, from working laboriously and diligently to deliver within a brief intersession. I would also mention the innovations brought in the format of the meeting, the guidance reporting template for WG conveners, and the plan to host periodic consultations intersessionally to better support the WGs in serving the Commission. These actions triggered a greater accountability of WECAFC programme of work.
- b) The dedication of these experts is consequently undisputable and deserve to be praised. Most important message for WECAFC members, this team merits to be encouraged through an increased number of volunteers. I therefore beseech you to critically discuss this essential matter to the goals of the Commission, to then come up with the most realistic approach to be reviewed by the Commission in September.

Distinguished participants, Ladies, and gentlemen,

- a) The issues to be tabled today and tomorrow are the core items of the agenda of WECAFC19. The conveners of the relevant working groups and contributors to the working documents would then have 15 days to address eventual amendments suggested by SAG, before the document is submitted to the Commission members for review and endorsement.
- b) The agenda looks very informative. Please allow me to quickly recall the key points: After the (i) introductory reports on the highlights of the Thirty-fifth (35th) session of the COFI, (ii) the priorities of the 37th Regional Conference and (iii) the scene setting overall report by the Secretariat of the intersessional activities, would follow the very specific scientific and technical items connected to the outputs from the joint working groups, building on several documents which can be distributed over four categories:
 - a. regular report by the WG conveners of their activities;
 - b. conservation and management measures that were not fully endorsed by members at the 18th Session, in particular the Caribbean Regional Management Plan and the Guide for improved monitoring of aFAD catches and improved assessment of aFAD impacts on stocks in the WECAFC region;
 - c. WECAFC18-endorsed Conservation and management measures, specifically Recommendations that underwent a revision by two of the WGs, likewise the updated Workplans of most WG that met over the past months; and
 - d. new CMM, such as the aFAD governance Manual.

For a SAG meeting held only nine months following the last session of WECAFC, you would agree with me, that this is a comprehensively enriching agenda. I am hopeful that it would trigger very interactive, constructive and productive deliberations.

In closing, I would like to thank you all for your attention. My special thanks to the Chair of WECAFC, Mr Jackson for joining in delivering an opening statement, and to Ms. Nancie Cummings, Chairperson of the SAG.

I wish successful and fruitful deliberations to all.

APPENDIX B - AGENDA

Twelfth session of SAG (Virtual session) 19–20 June 2023

Day 1	: 19 June 2023	
9.00	1. Housekeeping and ZOOM logistics	WECAFC Secretariat
9.15	2. Opening of the session and welcoming remarks	Dr Renata Clarke, FAO Subregional Coordinator, Mr Edward Abela Jackson, WECAFC Chairperson
9.45	3. Introduction of SAG members	Ms Yvette Diei Ouadi, Secretary of the WECAFC
10.00	4. Election of chairperson and adoption of the agenda	WECAFC Secretariat
10.15	5. Main decisions and recommendations of the Thirty-fifth session of COFI	Mr Piero Mannini, FAO Senior Liaison Officer
10.45	6. Summary of the regional priorities established by the XXXVII FAO Regional Conference for Latin America and the Caribbean and the potential contribution of fisheries and aquaculture	Maya Takagi, RPL RLC
11.15	Break and zoom photo	
11.30	7. Intersessional activities by WECAFC Secretariat: Coordination of the activities of the Advisory Groups, the IWG/Strategic reorientation process, the Executive Committee and other major actions to support the achievement of the goals and objectives of the Commission	WECAFC Secretariat
12.00	8. Review of the Caribbean Regional aFAD Management plan	Henri Vallès , FAO Consultant
12.45	9. Guide for improved monitoring of aFAD catches and improved assessment of aFAD impact on stocks	Henri Vallès , FAO Consultant
14.00	End of the first day of the meeting	
Day 2	: 20 June 2023	
9.00	Summary notes/Reflection on day 1	
9.15	Manual on aFAD Governance	Susan-Singh-Renton, FAO Consultant
11.15	Break and zoom photo	

11.30	Intersessional report by Working Groups, to include draft Recommendations to WECAFC19 and updated 2023–2025 Workplan (see Template recommended by SAG)	Working Groups Conveners: • Moored fish aggregating devices (Colvin Taylor) • Queen conch (Maren Headley) • Shrimps and groundfish (Fabian Blanchard) • Spawning Aggregations (Myles Phillips) • FDS (Nancie Cummings) • IUU-fishing (Peter Murray) • Spiny Lobster (Yesuri Pino)
13.30	Any other matters	Nancie Cummings
13.45	Time and venue of next meeting	Secretariat
14.00	Closing session	Secretariat

APPENDIX C

LIST OF PARTICIPANTS

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APPENDIX D – RECOMMENDATIONS FROM SELECTED WORKING GROUPS TO THE SCIENTIFIC ADVISORY GROUP

Amendment to Recommendation WECAFC/ XVIII/2022/4

(Updated 15 March 2023 at the Fifth Meeting) of the WECAFC Working Group on Spawning Aggregations (SAWG)

Cover Note

The SAWG has held two meetings since the adoption of the Recommendation WECAFC/17/2019/14 "On the Sustainable Management of Spawning Aggregations and Aggregating Species" at the 17th Session of the Commission (WECAFC17) held from 15–18 July 2019. This document enshrined 10 recommendations which emerged from commitments made to an associated 2018–2020 Workplan at the second meeting of the SAWG in March 2018. These recommendations were subject to review at the third meeting of SAWG in December 2019, during which many of these recommendations were found to have been accomplished through diligent intersessional efforts.

The advancement of the formal adoption process for the *Regional Fish Spawning Aggregation Draft Fishery Management Plan* (FSAMP) and completion of the "*Big Fish*" Regional Communications Strategy now demand elevated levels of commitment for their most needed implementation. Annual calls for regional harmonization of closed seasons and strengthened enforcement have been issued, along with short films for stakeholder engagement. Many activities have also been implemented at the member State level, including status assessments, passing of legislation and the creation of protected areas.

It is recognized that at the regional level, many of the data-dependent recommendations have not been achieved, impeded by data scarcity and resource limitations for implementation of associated high-level tasks. Fundraising efforts are ongoing to support the development of projects to determine the status of all known FSA sites, and to produce a set of standard monitoring protocols and sustain an associated regional monitoring database.

Another gap is the lack of national implementation of a seasonal closure for Nassau grouper and mutton snapper as called for in FSAMP. Recognizing the need for this measure, the Chair of the WECAFC Executive Committee sent a letter to the WECAFC membership in August 2020 strongly encouraging member States to establish synchronized regional closed seasons for Nassau grouper and mutton snapper to safeguard their spawning aggregations, and promote their effective conservation, management, and development.

The transition from the 2018–2020 workplan to the 2021–2025 workplan reaffirms the commitment of the SAWG to procure funding to pursue its data dependent objectives, and to establish a framework to facilitate regional monitoring of FSA management trends by WECAFC. The Fifth meeting of the SAWG had to be re-scheduled given Covid-19 travel restrictions, and as such, opportunities to achieve concrete results toward conservation and recovery of the FSAs continue to be postponed. The need for strong education and communication should be highlighted.

In the meantime, existing recommendations have been modified to reflect the status of deliverables. These recommendations call for adoption and implementation of the FSAMP, and actions to advance improved data collection, assessment, communication, and outreach for the conservation of FSAs. They also promote capacity building and the mobilization of resources to assist WECAFC members conduct priority research, monitoring, management, and enforcement activities.

The ramifications of not adopting these recommendations include the perpetuation of gaps in knowledge and critical information necessary to guide decision makers, inadequate protection and management of FSAs, and overexploitation of FSAs that [further] threatens their sustainability.

Preamble

The Western Central Atlantic Fishery Commission (WECAFC):

- RECALLING that the objective of the Commission is to promote the effective conservation, management and development of the living marine resources within the area of competence of the Commission, in accordance with the FAO (Food and Agriculture Organization) Code of Conduct for Responsible Fisheries, the Voluntary Guidelines for Securing Sustainable Small-scale Fisheries in the Context of Food Security and Poverty Eradication and to address common problems of fisheries management and development faced by members of the Commission.
- REAFFIRMING its commitment to support management and implementation of regional strategies and regulations to protect spawning aggregations and aggregating species through the establishment of the WECAFC Working Group on Spawning Aggregations (SAWG) at the 14th session of WECAFC in 2012.
- NOTING that stocks of many species of groupers and snappers in the Caribbean have declined significantly in the last three decades, some of their fish spawning aggregations (FSAs) have declined or disappeared and that immediate action is required to stop further reductions.
- MINDFUL that many fishers' livelihoods are dependent on harvest from spawning aggregations and the fisheries that they support, but also that these fishers have experience and expertise that could be invaluable in the conservation, management, and possible tourism at such sites and that the development of economic alternatives for affected fishers should accompany efforts to halt fishing during spawning periods or close areas where spawning occurs.
- REAFFIRMING the recommendations of the Declaration of Miami (2013) issued at the 1st CFMC/WECAFC/OSPESCA/CRFM Working Group on Spawning Aggregations.
- REAFFIRMING and supporting the recommendations and the workplan from the 2nd meeting of the CFMC/WECAFC/OSPESCA/CRFM Working Group on Spawning Aggregations.
- NOTING members' commitment to the 2018 SAWG workplan, various planned actions and that activities are well underway.
- COMMITTED to individually and collectively taking measures and actions to further improve the management and conservation of fish spawning aggregations and species that aggregate to spawn in the Wider Caribbean Region.

Action Items

The WECAFC Working Group on Spawning Aggregations, at its Third and Fourth Meetings on 18–19 December 2019 and 9–10 November 2020, ADOPTS in conformity with the provision of Article 6 (h) of the Revised Statutes of the WECAFC the RECOMMENDATION that:

- WECAFC, CFMC, and as appropriate CRFM, OSPESCA, and CEP-SPAW support the national adoption and strategic implementation of a **Regional Fish Spawning Aggregation Fisheries**Management Plan by all member states.
- WECAFC Secretariat and Members invest resources and support the **standardization of existing monitoring programs,** or introduction where these do not exist, to coalesce them into a unified regional monitoring program utilizing standard protocols to share data designed to track the status and trends of aggregations and the species that form them and thus contribute to local, national, and regional management efforts.
- Members of WECAFC call for **standardized and appropriate measures to protect Fish Spawning Aggregations (FSAs)** at the national, regional, and international scale, including strengthening enforcement of closed seasons, closed areas, sales bans during the closed season, and international collaboration and communication around law enforcement.
- Members of WECAFC agree upon and adopt, as a precautionary measure, a regional seasonal closure for all commercial and recreational fishing of Nassau grouper (*Epinephelus striatus*), at least for the period 1 December–31 March and that Members will not permit export or commercial sale of Nassau grouper or its products (e.g. roe, fillets) for the duration of the seasonal closure.
- Members of WECAFC **determine the status and timing of spawning seasons** known Fish Spawning Aggregation (FSA) sites with emphasis on FSAs of mutton snapper and Nassau grouper.
- WECAFC Secretariat supports an assessment of the direct and indirect economic value of FSA fisheries and FSA-associated species and the socio-economic impact of proposed management measures to inform future management decision-making.
- Members are encouraged to offer training and/or resources to fishers (displaced due to FSA closures) in monitoring, research, assessment, best practice for fish release (e.g. descending devices) and suitable economic alternatives. Fishers and other stakeholders to be involved in cooperative research and FSA management.
- The WECAFC Secretariat and Members support and promote a regional outreach and communication strategy on conservation and management of FSAs.
- Members of WECAFC prioritize FSAs, Nassau grouper, mutton snapper and other aggregating species for monitoring, conservation, and management based on status, vulnerability, interval since last assessment and Members' institutional capacity. Member states should provide information to the SAWG and WECAFC Scientific Advisory Group (SAG) to facilitate prioritization of FSAs for allocation of regional support.
- The WECAFC Secretariat, together with the Members of WECAFC, seek to **mobilize resources** to assist the Members in the implementation of priority research, monitoring, enforcement, management and conservation of FSAs and the species that form them, with particular focus on mutton snapper and Nassau Grouper.

• Recommends the establishment of a **Fish Aggregation Management Plan Coordination Committee** within the SAWG as recommended in the FSA regional management plan that could be comprised by no more than ten members with broad regional representation (one from the six WECAFC marine ecoregions, one from Cartagena Convention/SPAW-RAC, one from English-speaking fisher organization, one from Spanish-speaking fisher organization, and a general coordinator). This is considered a priority to support mainstreaming of the implementation of the Regional FSA Management Plan.

The SAWG recommends that Nassau grouper and mutton snapper be elevated to WECAFC Group 1 species for the implementation of the FSAMP.

Draft Amended Recommendation WECAFC/XVIII/2022/3 on increased efforts in the implementation of the regional Queen conch fisheries management and conservation plan in the WECAFC region

"Managing Queen conch fisheries presents a broad range of challenges, including the complex biology of the species, uncertainty of catch and effort data, illegal trade, weak surveillance and enforcement mechanisms, unsustainable fishing practices, and even the frequency of severe dive accidents impacting on the quality of life and living conditions of entire towns. Problems in the fishery are dynamic, adding to the complexity of the issues which fishery sector managers have to face and for which they typically do not have enough human, technical and/or financial resources." "Queen conch fisheries are believed to be fully developed in most areas, and that the alleged increase in levels of illegal fishing often occurs due to a lack of knowledge, awareness and enforcement."

The need for coordinated management of the Queen conch has long been recognized by fisheries scientists and managers in the Wider Caribbean region. The Regional Queen conch Fisheries Management and Conservation Plan provides a set of management measures that can be applied at the regional or sub-regional level for the sustainability of Queen conch populations, the maintenance of a healthy fishery and the sustenance of fishers and fishers' communities. As the Plan is progressively implemented, improvement in the long-term governance of Queen conch fisheries across the Caribbean is expected, as stated in strategy 4B of the Strategic Action Plan (SAP) of the "Sustainable Management of the Shared Marine Resources of the Caribbean Large Marine Ecosystem (CLME) and Adjacent Regions."

The 14 management measures recommended in this Regional Queen conch Fisheries Management and Conservation Plan were analyzed by experts participating in the Second Meeting of the WECAFC Working Group, held in Panama from 18 to 20 November 2014. Implementation status of the 14 management measures have been discussed at the Third and Fourth meetings of the WECAFC Working Group on Queen conch respectively held in 2018 and 2019. In general, member states have made improvements in the management of their Queen conch fisheries at the national level through implementation of the measures. However, given the differences in scales, gear types, products, markets and geographic locations of member states, harmonization of management measures at the regional level has not occurred yet. The degree of implementation of the Regional Queen conch Fisheries Management and Conservation Plan was preliminarily evaluated using quantitative values collected in 2019–2020, and the Queen conch Working Group found that some progress was made.

To help address the issue of illegal, unreported, and unregulated (IUU) fishing, it is important to note the management measure for traceability of Queen conch throughout the value chain identified in the Regional Queen conch Fisheries Management and Conservation Plan. Traceability can be advantageous by helping to ensure that seafood caught by legal versus illegal fishing practices can be distinguished, allowing legally harvested products to fetch higher prices. This management measure is also aligned with the objectives of the Regional Plan of Action to Prevent, Deter and Eliminate IUU Fishing in WECAFC Member Countries (RPOA-IUU) (2019–2029). These objectives aim to prevent, deter and eliminate IUU fishing in the area of competence of the WECAFC through effective information-sharing and regional cooperation; and contribute to promoting the effective conservation, management and development of the living marine resources in the WECAFC area, in accordance with the FAO Code of Conduct for Responsible Fisheries.

The Fifth meeting of the WECAFC Working Group on Queen conch was held during 13–14 December 2021 in Puerto Rico and virtually. The purposes of the meeting were to continue monitoring the implementation of the Regional Queen conch Fisheries Management and Conservation Plan, and to discuss implementation of the Recommendations developed by the Working Group and the Scientific, Statistical and Technical Advisory Group (SSTAG), as well as other items for collaboration called for in the Terms of Reference for the Working Group. Meeting participants also discussed the progress of

activities as called for in the Workplan for 2019–2021 and the implementation of Recommendation WECAFC/XVII/2019/12 on Improved Compliance with Trade Measures for Queen conch and Recommendation WECAFC/XVII/2019/13 on Queen conch Conversion Factor adopted at WECAFC17. An updated Workplan for 2021–2024 was also developed. The Fifth Meeting of the Working Group agreed that any gaps in implementation of the management measures in the Regional Queen conch Fisheries Management and Conservation Plan should be addressed, and continued monitoring of the implementation status was required. There was also discussion about the ongoing issue of IUU fishing and the possibility of using genetic techniques to determine the origin of queen conch products. The Fifth meeting agreed that the Queen conch Working Group should liaise with the IUU Working Group to develop a joint recommendation to address IUU fishing in Queen conch fisheries in the region.

The Sixth meeting of the WECAFC Working Group on Queen conch was held on 16 March 2023 in Puerto Rico and online. The purposes of the meeting were to monitor the implementation of the various Queen conch recommendations and resolutions and continue monitoring implementation of the Regional Queen conch Fisheries Management and Conservation Plan. The progress of activities as called for in the Workplan for 2023–2025 were discussed and some additional activities were added. A review of the CITES CoP19 decisions and recommendations was also provided. COP Decision 19.233 calls for Range States to provide progress reports on activities to the WECAFC working group on Queen conch. This led to an amendment in the Working Group Recommendation.

It is expected that additional human, technical and financial resources will be required by the Members and the WECAFC Secretariat to continue supporting the implementation of the management measures outlined in the Regional Queen conch Fisheries Management and Conservation Plan.

Failing to approve this amended recommendation will undermine the sustainable management and conservation of the Queen conch resource and hinder the development of genetic tools to help combat IUU fishing in the Queen conch fisheries.

Continued support for implementation of the QC regional management and conservation plan

The Western Central Atlantic Fishery Commission (WECAFC):

- RECALLING that the objective of the Commission is to promote the effective conservation, management and development of the living marine resources within the area of competence of the Commission, in accordance with the FAO Code of Conduct for Responsible Fisheries, the Voluntary Guidelines for Securing Sustainable Small-scale Fisheries in the Context of Food Security and Poverty Eradication and to address common problems of fisheries management and development faced by members of the Commission.
- RECALLING the establishment of the WECAFC Working Group on Queen conch by WECAFC 14 in 2012.
- REAFFIRMING the commitments made by Queen conch Range States at the sixteenth meeting of the Conference of the Parties to CITES (CoP16, Bangkok, 3–14 March 2013) to implement the Decisions on "Regional cooperation on the management of and trade in the Queen conch (*Strombus gigas*)" agreed at CoP16.
- FURTHER REAFFIRMING Recommendation WECAFC/16/2016/1 and the Decisions 17.285–17.290 related to Queen conch adopted at 17th Conference of the Parties to CITES (CoP17, Johannesburg, 24 September 4 October 2016) (see FAO Technical Paper No. 610), calling upon WECAFC members to implement the Regional Queen conch Fisheries Management and Conservation Plan.
- COGNIZANT of the fact that National CITES Management Authorities are required to make a "Legal Acquisition Finding" before issuing an export permit for Queen conch and noting that a resolution on guidance to CITES Parties for making Legal Acquisition Findings was adopted at CoP18 (Geneva, Switzerland 17–28 August 2019).

- ALSO COGNIZANT of COP 19.233 Decision directed to Range States of *Strombus gigas* which calls for Range States to provide progress reports on activities to the CFMC/OSPESCA/WECAFC/CFRM/CITES working group on Queen conch.
- RECALLING the outcomes of the Third and Fourth meetings of the CFMC/OSPESCA/WECAFC/CRFM/CITES Working Group on Queen conch, respectively held in Panama, 30 October–1 November 2018 with support from the European Union, NOAA Fisheries and FAO; and in San Juan, Puerto Rico, from 16 to 17 December 2019 with support from NOAA Fisheries and FAO.
- RECALLING that the Commission adopted Recommendation WECAFC/16/2016/1 "on the regional plan for the management and conservation of Queen conch in the WECAFC area addendum to recommendation WECAFC/15/2014/3 on the management and conservation of Queen conch in the WECAFC area; and Recommendations WECAFC/17/2019/12 on improved compliance with trade measures for Queen conch and WECAFC/17/2019/13 on Queen conch conversion factor.
- NOTING with concern the limited implementation of the conservation and management plan for QC to date and that some WECAFC Members are facing significant challenges in implementing the plan.
- NOTING the Regional Plan of Action to Prevent, Deter and Eliminate Illegal, Unreported and Unregulated (IUU) Fishing in WECAFC Member Countries (2019–2029) which was developed by the Joint WECAFC Regional Working Group on IUU (RWG-IUU) Fishing and endorsed at the 17th Session of the Commission.
- RECALLING that the RPOA-IUU Fishing sets out 28 measures and actions to prevent, deter and eliminate IUU fishing in the Wider Caribbean Region and to fulfil the WECAFC Members' obligations in the capacities as port, flag, coastal and market State under the aspects of Policy and legal framework, MCS and operations, Regional information-sharing and cooperation Capacity development.
- *ADOPTS* in conformity with the provision of Article 6 (h) of the Revised Statutes of the WECAFC the recommendation that:

Given the importance of evaluating the degree of implementation of the Regional Queen conch Fisheries Management and Conservation Plan, the qualitative values collected in 2019–2020 should be updated with additional data from all countries in the Wider Caribbean participating in the Queen conch fishery using the information presented at the 2021 Working Group meeting. The update on the implementation status should be completed by April 2023 and a progress report provided to the CITES Secretariat. Monitoring the plan's implementation should be done on an annual basis to increase communication, coordination, and planning towards the application of ecosystem-based approaches to fisheries of this valuable resource.

Genetic work utilizing the Single Nucleotide Polymorphisms (SNPs) technique or other similarly advanced genetic techniques should be considered in order to develop appropriate and validated genetic markers. The SNPs technique has the potential to identify spatial distribution of the species, and thus would provide useful information for Queen conch connectivity and traceability. This would also support the development of Legal Acquisition Findings as required under CITES. The SNPs technique also has the potential to map the genes and provide information about population genetic structure and thus allow for identification of spatial variability (or distribution) of the species.

WECAFC Members are strongly encouraged to participate in the development of this genetic work. In order for the genetic work to be statistically robust, at least 15 countries would be required to provide genetic samples of Queen conch.

The Queen conch Scientific, Statistical and Technical and Advisory Sub-group (SSTAG) should liaise with the Regional Working Group on IUU Fishing to further strengthen activities to counteract IUU fishing of Queen conch and advance implementation of the 28 measures and actions identified in the RPOA-IUU fishing.

References

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- **Prada, M. C.; Appeldoorn, R. S.; Van Eijs, S. & Pérez, M. M.** 2017. Regional Queen conch Fisheries Management and Conservation Plan. FAO Fisheries and Aquaculture Technical Paper No. 610. Rome, FAO. 70 pp.

APPENDIX F - WORKPLANS OF THE WESTERN CENTRAL ATLANTIC FISHERY COMMISSION WORKING GROUPS

WECAFC working group on spawning aggregations

Activity	Proposed Activity Timetable	Responsible Entity	Status	Group/ Theme	Link to Commission Strategic Objective	Priority (low, medium, high)	Estimated cost	Notes
Convene the 5th meeting of the SAWG (Panama)	Jan-23	WECAFC + CFMC as coordinator; meeting supported by NOAA Fisheries	Complete	coordination/ Collaboration	1, 2, 3	High	ТВО	Organization of a meeting/ meeting report
Publish and distribute Report of 5th SAWG meeting (2023)	Fall 2023	WECAFC + CFMC supported by NOAA Fisheries	In progress	technical/ Scientific/ Advisory	1, 2, 3	Medium	No cost	Dissemination of the meeting report (mail and WECAFC website)
Maintain the SAWG network intersessional communications by regularly posting FSA news and events to the GCFI, CAMPAM, and other lists	2021–2025	GCFI(Acosta) Ongoing – ListServe established; postings ongoing	In progress	Education/ Outreach	2	Medium	No cost	Regularly posting FSA news and events to the GCFI, CAMPAM, and other lists(monthly/ bi-monthly etc.)
Final cooperative monitoring program and database (AFTER PILOT PROJECT)	2nd Qtr 2024	WECAFC, CFMC, NOAA Fisheries, SAWG members and researchers, and others	Pending	coordination/ Collaboration	2, 3	Medium	USD 70 000	Final Database set
Develop a FSA Protocol to: 1) report on the status of spawning aggregations and associated environmental factors, and 2) evaluate local management initiatives. Identify lessons learned and apply positive outcomes.	Present draft at 6th SAWG meeting; adopt at 7th SAWG meeting 2023–2025	WECAFC/-FDS/ SAWG, CFMC, SAWG members and researchers, and others, WCS EU DG MARE Funded	Pending	technical/ Scientific Advisory	1, 2	High	USD 25 000	of FSA protocol

Notes	Mainstreaming the results of the status and need assessment of the FSA sites	Guidance adopted and disseminated	Funding mobilized and available/ project start up	Operationalization of the Digital hub	International Broadcasting of the film
Estimated cost	USD 100 960	USD 87 300			
Priority (low, medium, high)	Medium	High	High	Medium	Medium
Link to Commission Strategic Objective	1, 2	1,2	4	4	4
Group/ Theme	Technical/ Scientific Advisory	technical/ Scientific Advisory	coordination/	education/ Outreach	Education/ Outreach
Status	Pending	Pending	In progress	In progress	Complete
Responsible Entity	WECAFC, CFMC, SAWG members and researchers, and others, WCS Funding available for pilot; requires funding beyond pilot	WECAFC/-FDS/ SAWG, CFMC, SAWG members and researchers, and others, WCS EU DG MARE Funded	WECAFC, CFMC, NOAA Fisheries, SAWG members, and others Initiated summer 2021	SAWG, CFMC (support to A. Salceda, BelugaSmile) EU DG MARE partial funding, Requires additional funding USD 100 000	Ana Salceda, BelugaSmile Productions, supported by The Howard Hughes Medical Institute (HHMI), Terra Mater and PBS
Proposed Activity Timetable	2023–Onwards	2023–2024	2021–2025	2023–2024	2023
Activity	Conduct a regional and national status and needs assessment of FSA sites in the WECAFC region (will continue beyond EU DG MARE)	Establish clear and simple guidance to: 1) update and/or verify the status (timing and location, fish numbers, catches) of known spawning aggregations at the national level, and 2) facilitate prioritization of those spawning aggregations most urgently needing protective action.	Mobilize resources from bilateral and international agencies to assist with Activities called for in SAWG Workplan	Secure financial support to develop Digital Hub in support of Communication Plan with downloadable resources and resource library	Production of one-hour film for International Broadcast

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Notes		rial deve	identifie schnical		rholders r educate ne 02 ou
		The material developed and disseminated helps in raising awareness around the mutton snapper to avoid catches during spawning season	New FSA identified through technical capacity		The stakeholders are effectively educated through the 02 outreach plans
ated			2 = 0		F ⊕ # C
Estimated	cost				
Priority (low,	medium, high)				
Priorit		High	Low	Low	Low
to	Commission Strategic Objective				
Link to	Commission ategic Object				
		4	a		4
Group/	Theme	Outreach Outreach	technical/ Scientific/ Advisory	Technical/ Scientific/ Advisory	education/ Outreach
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Status		In progress	ding	In progress	In progress
			Pending		
e Entity		CFMC (support to A. Salceda, BelugaSmile) Funding Required for French translation of radio kit	ing	WECAFC – task for FSAMP Coordination group under their TOR Requires funding	s /ith HHMI
Responsible Entity		CFMC (support to A. Saloeda, BelugaSmile Funding Required for radio kit	WECAFC Requires funding	WECAFC – task for FSAMP Coordination group under their TO Requires funding	Beluga Smile Productions will continue its coordination with HHI & PBS.
		CFMC (e Salceda, Funding French tr radio kit	WECAFC Requires	WECA FSAM group Requii	Beluga Produ will co coordi & PBS
Activity	able	4	2	ಬ	2
Proposed Activity	Timetable	2022–2024	2021–2025	2021–2025	2023–2025
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		naterials Science imed and and int officie s & distri n Spanis h; 2) distribu ilms: a) i.e. "call to naimed an mmunitie of apper; ar at calls of groupei er during	FSAs where not bet d or red (e.g.	cource r membe uild cap: aggreg: specially \s have mented red (e.g.	tation of adcastin Outreach Outreach () The Lighes stitute's ience
Activity		Develop materials for Citizen Science Program aimed at fishers and enforcement officials: 1) Produce & distribute radio kits in Spanish and French; 2) Produce & distribute two short films: a) a 30-minute "call to action" film aimed at fishing communities to stop decline of mutton snapper; and b) a film that calls on the general public to protect FSAs by not consuming grouper and snapper during spawning periods	Share resources to identify FSAs in regions where FSAs have not been documented or characterized (e.g. Eastern Caribbean)	Create resource channel for member states to build capacity to manage aggregating species, especially where FSAs have not been documented or characterized (e.g. Eastern Caribbean)	Implementation of 1) Public Broadcasting Service's Outreach plan and 2) The Howard Hughes Medical Institute's (HHMI) Science Outreach Plan.
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Notes	Effective implementation of the FSAMP in most urgent actions	a) Design of TOR b) First Meeting of FSAMP-CC		
Estimated cost			TBD	
Priority (low, medium, high)	High	High	Low	
Link to Commission Strategic Objective	1, 2, 3, 4			
Group/ Theme	coordination/ 1, 2, 3, 4 Collaboration	Coordination/ Collaboration	Coordination/ Collaboration	
Status	In progress	Pending	Pending	Pending
Responsible Entity	WECAFC, CFMC, SAWG members and researchers, and others, WCS, NOAA Fisheries Funding available for pilot; requires funding beyond pilot	СҒМС, WЕСАҒС	WECAFC, NOAA Fisheries, CFMC Requires Funding; CFMC can host if in MIA or PR	WECAFC, CFMC, GCFI Requires Funding
Proposed Activity Timetable	2022–2023	2023–2025	Tentative Q3 2024 WECAFC, NOAA Fisheries, CFMC Requires Funding CFMC can host if MIA or PR	Q4 2024
Activity	Secure support to assist WECAFC members with FSAMP Implementation for most urgent actions needed	Charter of a 10-person FSAMP Coordination Committee (FSAMP-CC)	6 th Meeting of the WECAFC-SAWG (in Miami?)	Workshop at GCFI 2024 – Involve fishers and scientists – Mobilise around FSAMP

WECAFC fisheries data and statistics working group

Activity Proposed activity timeframe 1. Vessel mapping Content 2023–2025 a. Liaise with FDS WG focal points for additional submissions	Odionono be						
		Status	Group/Theme	Link to Commission strategic objective focus area	Priority (low, medium, high)	Link to other activities	Estimated cost
a. Liaise with FDS WG focal points for additional submissions	25 WECAFC- FIRMS and member countries	ongoing	Technical	1, 2	medium	Needed for 6	Unknown
		ongoing					
b. Review submissions from WECAFC Members and highlight where revisions are needed		ongoing					
c. Implementations in the WECAFIS database with corresponding metadata		ongoing					
d. Discussion of adding vessel type information into FIRMS tables, including vessels images when available		ongoing					
2. WECAFC Subarea Boundaries 2023–2025	25 FDS-WG and member countries	ongoing	Technical/Coordination	1, 2	medium	Needed for 6	Unknown
a. Finalize the proposal in the Honduras, Nicaragua and Guatemala sub-region under the OSPESCA umbrella		ongoing					
b. Review feedback from member countries on sub-areas related to area 31 and 41, and if the case appears feasible, prepare for presentation at CWP		ongoing					
c. Discuss a recommendation for SAG and the Commission, or any other plan to move forward		ongoing					
d. Conduct intersession discussions on Venezuela sub area delimitations and Bahamas		Intersession workshop convened June and May 2023					

Estimated cost	6 Unknown (FIRMS)				Unknown			
Link to other activities	Needed for 6							
Priority (low, medium, high)	high				low			
Link to Commission strategic objective focus area	1, 2				1, 2			
Group/Theme	Technical/Collaborative				Technical/ Collaboration			
Status	ongoing	ongoing	Pending	Pending	No new progress			
Responsible entity	WECAFC- FIRMS and member countries				FAO and FDS-WG			
Proposed activity timeframe	2023–2025				2023–2025			
Activity	3. FIRMS Inventories	a. Continue to review and Summarize inputs by member countries, highlight latest submissions, discuss/elaborate specific FIRMS services for the region (delivered through WECAFC map viewer)	b. discuss/identify/implement a path for updating inventories in OSPESCA region- e.g. consultant to further inventory development on a country by country basis possibly, considerations of focus groups working with fleet segments (across multiple member countries) to enrich inventories	c. Also noting that FIRMS Secretariat may develop a pilot demonstrating how a possible future addition of FIRMS fishery lds (optional) in certain Tasks of the DCRF can be exploited, for presentation at next FDS-WG	4. Small-scale Fisheries Matrix	a. Summarize list of member countries which submitted highlighting latest submissions and new pilot testing	b. Present a synthesis of the level of adaption of the SSF matrix to the WECAFC region and what would need to be changed in the SSF matrix for it to be of practical application for the region	c. Discuss a recommendation for submitting to FAO for consideration WECAFC DCRF

Activity	Proposed activity timeframe	Responsible entity	Status	Group/Theme	Link to Commission strategic objective focus area	Priority (low, medium, high)	Link to other activities	Estimated cost
5. WECAFC Reference list of aquatic species, annotation of important Subareas by species and DCRF tasks	2023–2025	FDS-WG and member countries	ongoing		1, 2	medium	Needed for 6	Unknown
a. Review submissions by member countries and WGs for additional species, and sub-areas for species, and proceed with member countries endorsements for the proposals. The use of the F.IRMS map viewer will help to obtain additional input on annotation of area by species.			Two new species added to group 1					
b. Review inputs from relevant Working groups, for the list of species and their sub-areas and identification of specific DCRF tasks			Two new species added to group 1					
c. Annotation of relevant standard conversion metrics by species/ subarea for inclusion in DCRF catalogue (Tables) of conversions			No new progress					
d. Annotation of relevant biological parameters for select set of species in main list of species by important subareas (e.g. reproductive ogives, growth parameter estimates) for inclusion in DCRF catalogue (Tables) of biological parameters			Ongoing					
6. DCRF	2023–2025	FDS-WG and member countries	DCRF finalized as v1.0 and FAO Circular under preparation	Technical	1, 2	high		Unknown
Proposed e-TWGs:								
a. for elaboration on measures of fishing effort per Fleet segment or Gear type			Pending					
 b. for refinement of Biological tasks – member countries with experience invited to be part of this WG 			Ongoing					
I. Operationalization of the DCRF and Contributions to WECAFIS	2023–2025	FDS-WG and member countries	ongoing	Technical/ Collaboration	1, 2	high		Unknown

Activity	Proposed activity timeframe	Responsible entity	Status	Group/Theme	Link to Commission strategic objective focus area	Priority (low, medium, high)	Link to other activities	Estimated cost
a. Finalize the Maps viewer (through e-TWG?) for public release as soon as possible			ongoing					
b. Identifying member countries willing to commit in the intersession, to populate the WECAFIS using local statistics in 2020 and 2021. Local statistics uploaded to WECAFIS. Identification of local country data manager.			Statistics submitted from 8 countries for some DCRF tasks					
c. Liaising with and identifying Regional species WGs to combine their expectations for data with the member countries contribution (Shrimp and Groundfish, Lobster,), and organize joint activities			Ongoing					
d. Identifying issues/challenges with member countries committing data to WECAFIS during pilot tests			Ongoing					
e. Developing road map including pilot data sets for implementing data uploads to WECAFIS DB by end of 2023			Ongoing					
II. Discussion of how the WECAFIS information can contribute to informing SDG 14.4.1	2023–2025	FAO and FDS-WG	Ongoing	Technical/scientific advisory	1,2	high		Unknown
a. Consider if a sub-committee needed- perhaps focus on one of the pilots (e.g. OSPESCA lobster)			Ongoing					
III. Fostering Growth of FDS-WG throughout region	2023–2025	FDS-WG	Ongoing	Communication/ Outreach	1, 2	medium		Unknown
a. Co-convener shadow training to develop leadership in WG			Pending					
IV. How can this WG interact or begin to interact with other regional/ international WGs (species, topical, RFMOs) to further improve the regional statistics and information on fisheries	2023–2025	FDS-WG	Pending	Collaboration/ Coordination/Outreach	1, 2	low		Unknown

Activity	Proposed activity timeframe	Responsible entity	Status	Group/Theme	Link to Commission strategic objective focus area	Priority (low, medium, high)	Link to other activities	Estimated cost
a. Under MoU /agreement with ICCAT- contribute to the planned joint ICCAT-WECAFC working group where respective species list might be examined			Pending		1, 2			
b. Should this WG contact ICCAT re' participating in ICCAT statistics WG as observer to learn how ICCAT develops/prioritizes and carries out its tasks/intersessional work on the topic of statistics (a question to ask to the participants? would anyone volunteer)			Pending					
V. Capacity building- other needs- this work is .ongoing	2023–2025	FDS-WG, WECAFC- FIRMS, FAO- FIRMS	Ongoing	Communication/ Coordination/ Collaboration	1, 2	high		Unknown
a. Finalize the list of selection criteria and propose a short list of WECAFC Members meeting these criteria for final selection			Ongoing					
b. For the selected WECAFC member(s), define the workplan and related budget for support			Ongoing					
c. Seek for co-funding from other regional projects and agree on the shared investments			Pending					

WECAFC working group on fisheries using anchored/moored fish aggregating devices (aFADs)

Notes	Hybrid Meeting held 17–19 April. Key documents reviewed by participants, to be tabled at SAG and WECAFC			Discussed at the 5th WG Meeting. For the existing manuals to be finalized, follow up action was taken by the Secretariat with the representative of IFREMER. These are Manuals on best practices on (1) fishing and business strategies for sustainable aFAD fisheries, (2) safety and working conditions of aFAD fisheries, and (3) the governance of aFAD fisheries, which was presented at the 5th meeting and tabled at SAGXII, then to be finalized for WECAFC19.
Estimated cost			USD 30 000	USD 20 000
Priority (low, medium, high)	High	High	Medium	High
Link to Commission	Strategic objective 2, 3, 4		1, 2, 3	1, 2, 3
Status Group/Theme	Coordination/ Collaboration	Technical/ Scientific/ Advisory	Technical/Scientific/ Advisory	Technical/Scientific/ Advisory
	Accomplished	In preparation	Ongoing	Ongoing
Responsible entity	WECAFC Secretariat	WECAFC Secretariat	Convener with CRFM, OSPESCA, WECAFC Secretariat, and IFREMER.	Convener with CRFM, OSPESCA, WECAFC Secretariat
Proposed activity	timetable 2023	Summer 2023	December 2022–June 2024	September 2022–February 2024
Activity Proposed Responsible entity	5th Working Group Meeting	Publish and distribute Report of 5th aFAD WG meeting (2023)	Collect data on aFAD fishery from WECAFC members. Conduct analysis on aFAD fishery data	Identify suitable experts/ consultants. Develop manuals in collaboration with fisheries authorities in member states engaged in aFAD fishery

Activity	Proposed activity timetable	Responsible entity	Status	Group/Theme	Link to Commission strategic objective	Priority (low, medium, high)	Estimated cost	Notes
Advocate for the reporting of aFAD fisheries statistics at relevant regional fisheries forums WECAFC Reporting to the Coordinating WG Party (CWP)—June 2023	2023–2025	FDS Working Group CRFM, WECAFC Secretariat	To start soon	Coordination/ Collaboration	7	Medium		An important milestone would be that ICCAT adopts the reporting of aFADs fisheries statistics
Identify ongoing co-management initiatives among aFAD members Create synergies and linkages	2023–2025	CRFM with assistance of CFMC (to be confirmed), OSPESCA, and relevant fisherfolk organizations and National Fishery Authorities	Ongoing	Collaboration/	1, 2, 3			
Assessment/review of ICT applications in aFAD states such as Dominica and Montserrat Replicate in aFAD countries with relevant/ applicable Review the aFADs monitoring standards and integration into DCRF.	2023–2025	WECAFC Secretariat and Fisheries Data and Statistics Working Group		Technical/Scientific/ Advisory	1, 2, 3	Medium		
Liaise with FAO/CRFM/ ICCAT to establish mechanism for sharing of aFAD data	2023–2025	CRFM with assistance of CFMC, OSPESCA, and relevant fisherfolk organizations and National Fishery Authorities		Coordination/ Collaboration	2	Medium		Permanent Data/ information sharing
Liaise with FAO/CRFM/ ICCAT to establish mechanism for sharing of aFAD information on designs	2023–2025	WECAFC Secretariat and Fisheries Data and Statistics Working Group, in connection with		Coordination/ Collaboration	2, 3	Medium		This will give stakeholders access to information and experiences related to aFAD designs in the region and outside the region

ated Notes	Mainstreaming of the Regional Management Plan for aFAD Fisheries in the Caribbean, the guide for improved monitoring of aFADs, and the guide for implementation of local aFAD fishery management plans	Effective technical support to Members to develop (sub-) national aFAD (co-) management plans and improved monitoring systems for aFADs			
Estimated cost					
Priority (low, medium, high)	High	High	Medium	High	Medium
Link to Commission strategic objective	1, 2, 3	1, 3	1, 2, 3	2, 4	1, 2, 3
Group/Theme	Technical/Scientific/ 1, 2, 3 Advisory	Technical/Scientific/ Advisory	Outreach/Education	Outreach/Education 2, 4	Outreach/Education 1, 2, 3
Status	Ongoing, presented at this 5th WG; will be re-submitted to sag and WECAFC plenary				
Responsible entity	WECAFC Secretariat	OSPESCA, CRFM, and WECAFC Secretariat, WECAFC members, FDS Working Group	WECAFC Secretariat, in collaboration with FAO Fisheries Division, Fish4ACP	WECAFC Secretariat	CRFM , WECAFC Secretariat (with IFREMER)
Proposed activity timetable	2022–2023	March 2023– July 2023	2024	2023–2025	2023
Activity	Engage consultant for review and finalization of aFAD Regional MGT Plan, the guide for improved monitoring of aFADs, and the guide for implementation of local aFAD fishery management plans	Local aFAD fishery management plan developed for Dominica	Undertaking E-leaming course on aFADs manuals	Producing a Registry of experts, resource persons in aFADs in the region	Support to aFAD Fishery Assessment training

WECAFC working group on caribbean spiny lobster

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	Notes	Changes in the proposed timeframe due to delays		Requires budget and effective implementation mechanism	First draft submitted to OSPESCA Fundraising required	Development every 5 years (as per MARPLESCA Plan)	Development of a training and extension programme every year (as per MARPLESCA Plan)	Every 2 years (as per MARPLESCA Plan)
	Estimated cost	USD 5 000 - 7 000 (estimated budget for 3-day online meeting)	Free of charge		USD 353 000 (proposed fund for project implementation)	USD 70 000 (as per MARPLESCA Plan)	USD 100 000 (as per MARPLESCA Plan)	USD 5 000–7 000 7 000 (estimated budget for 3–day online meeting)
	Priority (low, medium, high)	High	High	Low	High	Medium	Medium	Low
	Link to Commission strategic objective	~	-	2	7	-	1, 2	~
	Group/Theme	Implementation and monitoring by the countries of the actions of the Regional Management Plan (MARPLESCA Plan)	Preparation and adoption of the CSL-WG Workplan	Detection of PaV1 in selected countries of the WECAFC region	Update breeding season and size at first sexual maturity of this species	Coordination for review by CSL-WG at a regional meeting	Training in the use of the stock assessment tool for member countries	Implementation and monitoring by the countries of the actions of the Regional
	Status	Not carried out	Ready for presentation and endorsement	Not started	Ongoing	Not started	Not started	Not started
spiny lobster	Responsible entity	WECAFC OSPESCA	CSL-WG	FAO/OSPESCA/ CRFM Interim Coordination Mechanism with support from CFMC	OSPESCA CSL-WG	Interim Coordination N	WECAFC OSPESCA CSL-WG	WECAFC OSPESCA
oup on caribbean	Proposed activity timeframe	December 2022 at the latest	December 2022	July-December 2023	2022–2023	2024	2024	First quarter 2025
WECATC Working group on cariobean spiny lobster	Activity	Organize and hold the third meeting of the Caribbean Spiny Lobster Working Group		Conduct sampling for possible presence of locust virus PaV1	Prepare the proposal for a Caribbean Spiny Lobster Reproductive Regional Survey in OSPESCA countries	Review Regional Management Plan (MARPLESCA Plan)	Extend the updates of the Caribbean spiny lobster stock assessment model of the MARPLESCA Plan	Organize and hold the fourth meeting of the Caribbean Spiny Lobster Working Group

Activity	Proposed activity timeframe	Responsible entity	Status	Group/Theme	Link to Commission strategic objective	Priority (low, medium, high)	Estimated cost
1. Address any gaps in implementation of the management measures in the Regional Queen conch Fisheries Management and Conservation Plan (endorsed by WECAFC 17, CRFM, OSPESCA and CFMC), and continue to monitor implementation of the plan.	January 2022 onwards	CFMC, WECAFC, and CRFM, OSPESCA and the WG members	Ongoing	Technical/ Scientific Advisory/ Collaboration	1; 2; 3	High	USD 5k (at least two online workshops and active communication with country representatives) USD 20–30k if translation costs (documents) are included
2. Finalize, publish and disseminate the report of the hybrid WG meeting hosted in Puerto Rico (in hard copies and on-line on http://www.strombusgigas.com/index.htm and at www. WECAFC. org; including the national summary reports).	March 2022	CFMC and FAO with inputs from meeting participants	Complete	Communication/ Dissemination	2	ı	
3. Provide technical and scientific advice to national governments, and support national consultations as needed in the region, to advance implementation of the Regional Queen conch Fisheries Management and Conservation Plan and relevant decisions and recommendations adopted by CITES and WECAFC.	January 2022 onwards	WG members (national fisheries and CITES authorities), CRFM, OSPESCA, CITES, CFMC, FAO/ WECAFC, SSTAG	Ongoing	Technical/ Scientific Advisory/ Collaboration	1; 2; 3	High	USD 15K (for expert consultation to conduct regional analysis) based on intersessional activities and needs identified
and mes ing: 22; the and and ga a nittee, and of of	In advance of deadlines for reporting required	CITES/Fisheries authorities of QC range States attending these meetings (as appropriate); CITES and WECAFC Secretariats	Ongoing	Communication/ Dissemination/ Collaboration	1; 2; 3	High	USD 20–30 K for training of range states on reporting

Estimated cost		Prepared as a Working Group recommendation		Funding required	USD 200–250k Genetic study- Pilot project cost - USD 80k- additional funding to be acquired	USD 15–20K One in person workshop plus online follow-up
Priority (low, medium, high)	High	T %	1	High	High U) O 6
Link to Commission strategic objective	1; 2; 3; 4	1; 2; 3	2	1; 2; 3	1; 2; 3	1,2;3
Group/Theme	Capacity Building	Technical/ Scientific Advisory/ Collaboration	Communication/ Dissemination	Technical/ Scientific Advisory/ Collaboration	Technical/ Scientific Advisory/ Collaboration	Technical/ Scientific Advisory/ Collaboration
Status	Ongoing	Complete	Complete	Outstanding	Ongoing	Completed
Responsible entity	NOAA Fisheries/ CFMC and FAO with the fisheries authorities in the region	WECAFC/FAO with CRFM and OSPESCA		OSPESCA, CRFM, NOAA Fisheries/ CFMC with CITES, WECAFC/FAO and the fisheries authorities in the region	SSTAG with support of WECAFC/FAO and CITES	SSTAG, WECAFC, CFMC, CRFM, OSPESCA
Proposed activity timeframe	January 2022 onwards	January 2022– February 2022	January– September 2022	January 2022 onwards	January 2022 onwards	January 2024 – February 2024
Activity	5. Support fishers and fisheries administrations in addressing the decent work, employment, and safety-at-sea problems in the Queen conch fisheries, in particular; fisher organizations should be engaged as much as possible for these activities.	6. Prepare a recommendation on the promotion of decent work, health, and safety in the fisheries sector for potential endorsement by the Commission at WECAFC18.	7. Support publication of the health and safety study and proposed project.	8. Continue the review and consideration of options for the development of a transparent "chain of custody" procedure to track catches from their harvest location to their eventual destination.	9. Advance research to determine genetic connectivity of Queen conch across the Caribbean, identify stocks, and design/implement a protocol to trace illegally harvested queen conch in trade. Engage countries to identify points of contact to assist with sample collection and participation in this research.	10. Create a Task Force – comprised of members from the QCWG and Regional Working Group on IUU fishing – to intersessionally draft a recommendation prioritizing genetic identification of Queen conch to improve traceability and combat IUU fishing in the region for the QCWG to consider for potential endorsement by the Commission at WECAFC 18.

Estimated cost	USD 15–20K (for compiling existing information and plan to collect new and standardized info)	USD 15–25K (Pilots already covered, need funding for higher coverage, values depending on level of the expansion)	USD 35–50K (Pilots already covered, need funding for higher coverage, values depending on level of the expansion)	Additional funding required	USD35–50K (Research on QC reproduction dynamics and changes at the regional level) Funding required	USD 35–45K (Microplastic pilots covered, need to expand at the regional level or inclusion of other pollutants; degradation of habitat quality in coastal areas which would impact recruitment)
Priority (low, medium, high)	High	High	High		High	High
Link to Commission strategic objective	1;2;3	2; 3	1, 2; 3		ಣ	ო
Group/Theme	Technical/ Scientific Advisory/ Collaboration	Technical/ Scientific Advisory/ Collaboration/ Capacity Building	Technical/ Scientific Advisory/ Collaboration		Technical/ Scientific Advisory/ Collaboration	Technical/ Scientific Advisory/ Collaboration
Status	Outstanding	Outstanding	13 (i) Completed; 13 (ii) Outstanding		Outstanding	Outstanding
Responsible entity	CFMC, WECAFC, and CRFM, OSPESCA and the WG members	SSTAG with support from CFMC, WECAFC/FAO	SSTAG with support from CFMC, WECAFC/FAO		WG members with support from CFMC, WECAFC/FAO	WG members with support from CFMC, WECAFC/FAO
Proposed activity timeframe	January 2022 onwards Completed for Blue Biotrade project countries & Jamaica	January 2022 onwards	January 2022		January 2023 onwards	January 2023 onwards
Activity	11. Expand the collection of socioeconomic information to analyze the contribution of Queen conch fisheries to income, livelihoods, and trade.	12. Provide training on the use of modules for the assessment of Queen conch stocks through a regional conference.	determination of fishery production as the basis for further analysis of the long-term sustainability of the species and its associated fisheries.	(ii) Conduct a similar pilot to 13.(i) in an OSPESCA country.	14. Investigate and consider the impacts of climate change on the Queen conch resources and the fishery.	15. Investigate the ecological and biological impacts of pollution on Queen conch resources.

Activity	Proposed activity timeframe	Responsible entity	Status	Group/Theme	Link to Commission strategic objective	Priority (low, medium, high)	Estimated cost
16. Continue/expand the scientific support to apply updated conversion factors by all countries with a Queen conch fishery. For this purpose, the Scientific and Statistical Sub-Group (SST Sub-group) has: Elaborated a series of technical documents on conversion factors that need to be applied and updated when reporting conch production / trade data across the region.	Work in progress initiated in 2019 and will continue over the next two years.	CFMC/WECAFC, SST Sub-group membership, CITES	Ongoing	Technical/ Scientific Advisory/ Collaboration	1; 2; 3	High	USD 20–35K (Linked with act. 12, need add funding for field work and expert support, depending on level of expansion and secure matching funds) After QCWG-SSTAG expert meeting to be updated.
17. Continue review of existing Queen conch NDFs and guidance in order to develop a simplified template for making non-detriment findings for Queen conch, in consultation with the CITES Animals Committee, dissemination of the template to the Working Group membership for their consideration, and supporting selected countries in applying the templates and sharing the results at the regional level.	Work in progress initiated in 2019 and will continue over the next two years.	CFMC/WECAFC, SST Sub-group membership, CITES, GCFI	Outstanding	Technical/ Scientific Advisory/ Collaboration/ Capacity Building	1; 2; 3	High	USD15–20K (Need a task force with country representatives for final agreements) Parties to participate in technical NDF workshop sessions are needed
18. Determine priority next steps to implement education and outreach as stated in the Regional Queen conch Fisheries Management and Conservation Plan.	January 2022 onwards	CFMC/WECAFC Secretariat and the Working Group	Outstanding	Communication/ Collaboration/ Education and Outreach	1; 2; 3	High	
19. Consult with the PROCARIBE+ project to identify potential areas for improving the sustainability of the Queen conch fishery including contributions to the State of the Marine Environment and Associated Economies (SOMEE) reporting mechanism, habitat impacts/ restoration and an updated Strategic Action Program Monitoring and Evaluation framework.	January 2022 onwards	CFMC, the WECAFC Secretariat too and/ or the relevant sub- regional partners (CRFM, OSPESCA, Coordination Mechanism for Integrated Ocean Governance in the Wider Caribbean)	Outstanding	Monitoring/ Evaluation/ Collaboration	1; 2; 3	High	OSPESCA & CRFM to follow up with PROCARIBE+

Estimated cost	Linked with activ. 8)		
	(Linked \		
Priority (low, medium, high)	High	ı	ı
Link to Commission strategic objective	1; 2; 3	1; 2; 3; 4	1; 2; 3; 4
Group/Theme	Collaboration	Collaboration	Collaboration
Status	Ongoing	Ongoing	Completed
Responsible entity	January 2022 CFMC/WECAFC onwards Secretariat and the Working Group	January CFMC/WECAFC 2022– Secretariat and the February 2022 Working Group	CFMC/WECAFC Secretariat and the Working Group
Proposed activity timeframe	January 2022 onwards	January 2022– February 2022	January CFMC/WECAFG 2022— Secretariat and February 2022 Working Group
Activity	20. Collaborate with the Blue BioTrade Project regarding improved trade and value-chain activities.	21. Continue support to the development January of the WECAFC Strategic Plan 2021– 2027 February	22. Review and finalize the new TORs for the QCWG

The twelfth session of the Scientific Advisory Group (SAG) of the Western Central Atlantic Fishery Commission (WECAFC) was held virtually from 19 to 20 June 2023. The SAG considered the outcomes of the work carried out by various joint working groups between 2022 and 2023 and their recommendations to the 19th Session of WECAFC (WECAFC19). A revised version of the Caribbean Regional anchored FAD Management plan and a revised version of the Guide for improved monitoring of anchored/moored FAD catches and improved assessment of anchored FADs impact on stocks first reviewed at SAG XI were tabled.

During the meeting, the working groups and other regional experts presented reviews of draft fishery management plan, a monitoring guide, and a review of a governance document as follows:

- Caribbean Regional Management Plan for the anchored fish aggregating device (aFAD)".
- WECAFC guide for improved monitoring of aFAD catches and improved assessment of aFAD impact on stocks.
- Anchored FAD fisheries Governance with application to other fisheries in the insular Caribbean.

Further, amended recommendations were presented and reviewed for the Spawning Aggregation and Queen conch Working Groups. Additionally, the review of the SAG considered outputs from activities of several working groups during the intersession, as summarized in the reports of the working groups, which also included draft recommendations to the 19th plenary of WECAFC and 2023–2025 workplans.

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