

### Centre for Resource Management and Environmental Studies

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#### Final narrative report on

Services contributing to the implementation of the International Year of Artisanal Fisheries and Aquaculture (IYAFA) 2022 in the WECAFC region

31 January 2023

#### 1 IDENTIFICATION

**Project title**: Services contributing to the implementation of the International Year of Artisanal

Fisheries and Aquaculture (IYAFA) 2022 in the WECAFC region.

Contract type: Letter of Agreement (LOA)

Service provider: University of the West Indies (UWI) Centre for Resource Management and

Environmental Studies (CERMES)

Commencement: 31 January 2022

Completion: 31 December 2022

Project budget: BBD\$40,000

#### 2 OVERVIEW

As in the LOA, this project contributed to two FAO objectives for celebrating IYAFA 2022:

- To focus regional attention on the role that small-scale fishers, fish farmers and fish workers play in food security and nutrition, poverty eradication and sustainable use of natural resources, increasing regional understanding and action to support them.
- To enhance dialogue between different actors and to strengthen small-scale producers
  to partner with one another and make their voices heard so they can influence the
  decisions and policies that shape their everyday lives all the way from the local
  community level to international and global fora.

The Service Provider in this project contributed to these objectives through project outputs as outlined below focused on gender mainstreaming (especially including youth) and national intersectoral linkages:

• Enhanced gender mainstreaming and youth engagement within IYAFA 2022 as shown by participation of women and youth in events organized and their expressed interest in further engagement, especially through fisherfolk groups.

- Highlighted importance of intersectoral linkages in advancing small-scale fisheries and aquaculture (SSFA) as shown by feedback on information communicated and new interest in using national intersectoral coordinating mechanisms (NICs) to engage fisherfolk.
- Better coordinated and concerted IYAFA 2022 activities for the WECAFC region evidenced by the integration of UWI-CERMES activities into several of them.

This final narrative report supports the final payment to UWI-CERMES of BBD 8,000 upon acceptance by FAO. Activities and deliverables completed and finalized since the interim progress report are referenced below. A final financial report was also submitted. The report covers listed LOA and additional project outputs and outcomes.

#### 3 Activities and benefits

In this final report we focus upon some key points obtained from reflecting upon project implementation. Additional deliverables produced subsequent to interim reporting are listed in Section 4.

#### 3.1 Enhanced gender mainstreaming and youth engagement within IYAFA 2022

This focal area for UWI-CERMES IYAFA 2022 activities built on the applied research undertaken through the Gender In Fisheries Team (GIFT) since its inception. UWI-CERMES frequently develops social media campaigns and postings to share research outputs and perspectives. Similarly, webinars are events that have been engaged to raise awareness about certain regional (and global) topics such as Caribbean fisherfolk lives and livelihoods, National Intersectoral Coordinating mechanisms (NICs), the management of Sargassum influxes etc. It was therefore logical to use these media to successfully complete this activity. Research on the utility of Popular Theatre for transformation and social change in the fishing industry, and a focus on youth in fisheries, are growing interests of GIFT. This project provided an opportunity to explore these applied research areas for future development.

#### 3.1.1 Social media campaigns and webinar

UWI-CERMES utilized five UN designated international celebratory days (see Box 1) to highlight the need for and progress towards gender mainstreaming and youth engagement in small-scale fisheries (SSF) and aquaculture (SSA). Attractive social media campaigns incorporating the main themes of these international days intertwined with the IYAFA perspective were used to heighten the attention of regional and international audiences – including fisherfolk, NGOs, universities and research entities, fisheries and gender networks etc. – to the experiences of women, men and youth in SSF and SSA in the Caribbean.

#### Box 1: International UN designated days chosen for UWI-CERMES IYAFA promotion

- International Day of Women and Girls in Science (11 February)
- International Women's Day (8 March)
- International World Ocean's Day (8 June)
- International Youth Day (12 August)
- World Fisheries Day (21 November)

Content for the social media campaigns was derived from research outputs of regional and international entities such as, but not limited to, UWI-CERMES, Caribbean Regional Fisheries Mechanism (CRFM) and the FAO and the FAO Western Central Atlantic Fishery Commission (WECAFC), as well as from conversations with regional men and women fisherfolk. These social media posts have been fully documented in the interim project report.

Social media and online communication through knowledge hubs (e.g. SSF Hub), email and webinars continue to be powerful communications media increasing the awareness of audiences globally about situations in specific parts of the world. However, the depth and breadth of the outreach is at times difficult to assess. Much of the reach given to the UWI-CERMES IYAFA social media campaigns was increased through its networks and distribution lists. When feedback was received from colleagues and partners, it was very positive and indicated a need for more and sustained communications on Wider Caribbean SSF and SSA.

The webinar, *Is Social Justice Just for Women in Fisheries?*, hosted by UWI-CERMES in collaboration with the CRFM to celebrate International Women's Day (IWD) was very successful in engaging women and men working in and for fisheries from across the Caribbean, Latin America and extra regionally. It was a good example of collaboration and a well-coordinated activity by two regional entities - The UWI and CRFM — and the intersection of UWI-CERMES research and outreach on social justice and social protection with current FAO research. The webinar highlighted the need for greater and more frequent discourse on gender in Caribbean SSF and SSA. Women working in the industry have ideas about practical solutions that should be considered when dealing with gender, fisheries and social justice. It is crucial that men should not be left out of the conversations on gender in fisheries as they can support women in seeking to achieve gender responsive or transformative social justice. Based on the reaction to this IWD webinar, there is no doubt that a webinar series on social justice for women in fisheries or even gender in fisheries would be well subscribed.

To complete the year of the IYAFA activities, UWI-CERMES recognized World Fisheries Day on 21 November 2022 with a special set of social media posts. To highlight the issues women face as small-scale fish processors locally in Barbados (but applicable regionally), a poem, *Fisherwoman's Lament*, written by small-scale processor, Sheena Griffith, (and an outcome of Popular Theatre capacity building – see below) started off the communications (see Appendix 1). This was followed by a compilation of quotes from fishermen on challenges they face, their suggested solutions and their thoughts on the future they want. The content of the six posts that comprised the latter set of communications were obtained by short interviews with four fishermen in leadership roles from Puerto Rico, Grenada, and Guyana. The main aim of the World Fisheries Day campaign was to highlight the voices of women and men in small-scale fisheries in the region.

## 3.1.2 Application of Popular Theatre for promoting change and transformation in SSF and SSA

Learned skills, increased confidence for self and collective representation, capitalizing on creative assets, comfort in sharing detailed experiences and challenges, formation of a branded theatre collective (group), and recognition at conferences, are just a few of the notable outcomes of the exploration of the utility of Popular Theatre for building agency for social justice and transformation within the fisheries sector.

Although this effort has yielded a core group of only three women flyingfish small-scale fish processors whose capacity is being developed to facilitate the application of Popular Theatre to awareness-raising, problem solving, and research within the fisheries sector, the activity has been very beneficial. The commitment of the women to exploring Popular Theatre for their and the fishing industry's benefit has been commendable. The women consistently devoted half of their days for at least one Saturday per month from March to December 2022 to learning about the Popular Theatre approach and its application. This is particularly noteworthy given that the women were actively working to recoup financial losses due to the Covid-19 pandemic and were in the midst of a very poor flyingfish season.

Although somewhat skeptical at first as to the value of this unique tool for exploring issues and attitudes, sharing knowledge and initiating action for positive social change, without exception, all of the women are now completely committed to learning more about how they can use Popular Theatre to transform the Barbados fishing industry. It should be noted that the relationship that UWI-CERMES has developed over many years with women working in the processing segment of the fisheries value chain in Barbados was credited by the women as one of the reasons for their decision to explore and participate in this capacity building activity. More information on the Popular Theatre activity is documented in the summary report, *Women fisherfolk learning to apply popular theatre for positive change in small-scale fisheries*.

This activity resulted in strengthening collaborative work between the UWI-CERMES led GIFT and the Regenerate Barbados Social Justice Group (a group within a national environmental network). GIFT research activities focus on understanding and documenting women's fisheries livelihoods for mainstreaming gender in Caribbean fisheries to help implement the international Small-Scale Fisheries Guidelines (SSF Guidelines). Regenerate Barbados and by extension, its Social Justice Group, aims to ensure that those who do not have strong agency and input into national or even sectoral economic development decisions, can contribute to how development proceeds for a socially just Barbados. Given that one of the members of the five-member Social Justice Group is a GIFT co-lead and another is an expert in Popular Theatre, the development of this collaboration was logical and served to (1) initiate the work of the Social Justice Group and (2) enriched and reinforced GIFT research activities.

The activity has demonstrated that there is much more work to be done in building agency and advocacy for social justice and transformation in the fishing industry. Funding is needed for a

number of important activities that will enhance and reinforce the Popular Theatre capacity building efforts so far implemented. These include but are not limited to:

- 1. Continuing skills development of a core group of persons and training of others to apply the Popular Theatre approach to fishing industry issues;
- 2. Expansion of the current group, *Voices from the Shore Theatre Collective*, to include more women and youth;
- 3. Organizing and hosting community workshops for awareness-raising, promotion and to gain buy-in from other fisherfolk and industry stakeholders;
- 4. Advocating the positions of fisherfolk regarding relevant industry situations or issues;
- 5. Providing opportunities for the *Voices from the Shore Collective* to participate in regional and international conferences and similar events for information sharing;
- 6. Developing small projects to achieve tangible outcomes.

A timeline of the Popular Theatre capacity building activities from March to October 2022 was provided in the interim project report. One final activity to end the year of IYAFA 2022 activities was a small social to celebrate the accomplishments of the Popular Theatre activity. Nine persons (all women) attended the event on 11 December 2022 from 4:30-6:30 pm in the CERMES Building, UWI Cave Hill Campus.



Figure 1 Some of the participants of the Popular Theatre social engaged in an interactive session

#### 3.1.3 Country youth chats

To better understand and document the issues and views of youth and young adults in fisheries and aquaculture in the region, UWI-CERMES organized in-country half-day Youth in Fisheries Country Chats in Jamaica, St. Lucia, Barbados and Guyana in October and November 2022. These discussion sessions were hosted by IYAFA Champions – Shellene Berry (Jamaica), Kaygianna Tousssaint-Charlery (Saint Lucia), Melissa Taitt (Barbados) and Rabani Gajnabi (Guyana) — all but the last being women. All sessions were designed with a focus on the seven IYAFA pillars useful for prompting youth discussion on relevance to them.

Each Country Chat comprised three main sections — an ice breaker designed to collect information on youth in fisheries to develop preliminary youth in fisheries per country;

an introduction to the seven pillars of IYAFA 2022 and the IYAFA Global Action Plan; prioritization of three pillars of relevance to youth and young adults per country and discussion of each; and development of a statement for youth and young adults in Caribbean fisheries based on the vision question, *Imagine it is 2032, what do Caribbean fisheries look like for youth and young adults?* 

The Country Chats were well received both by the facilitators and participants. Across all four countries 28 young people (13 women and 15 men) engaged in the fisheries and aquaculture sectors participated in the sessions. Participants were between the ages of 18-34 years old. See Table 1 for gender disaggregated data on the Country Chat participants.

Table 1 Number of participants per youth in fisheries country chat disaggregated by gender

Country	Chat date	Participants		Total
		Female	Male	
Jamaica	21 October	5	2	7
Saint Lucia	27 October	0	4	4
Barbados	25 November	3	5	8
Guyana	26 October	5	4	9
	Total	13	15	28

These Country Chats (see accompanying summary reports) have indicated that there are young people in fisheries and aquaculture in the region who are interested in the industry, are observant and have many varied ideas for improving fishing industry operation, environmental and economic sustainability, resilience, governance, food security and nutrition, and gender equality and equity, among other things. There however seems to be limited awareness among youth in fisheries about fishing regulations, collective action, regional and international fisheries policy etc. These preliminary events have only just touched on interests, issues and concerns of youth and young adults involved in SSF and SSA, providing a basic profile on a small proportion of youth in fisheries. More research is needed to thoroughly document and understand the characteristics of this important demographic, the opportunities available to them and the barriers or challenges they face. Should additional funding have been available, a series of Country Chats culminating in a regional discussion forum would have allowed for greater breadth and depth of information sharing, learning and investigation; it would be worthwhile to undertake such research soon. The fishing industry across the region needs to be reenergized with youth if it is to contribute substantially to food security and improved wellbeing and livelihoods for fisherfolk and their families.

Country Chat participants were eager to participate in more meetings, workshops and other events targeting youth in fisheries on various topics. Local and regional entities need to capitalize on this enthusiasm to engage youth in SSF and SSA to foster improved innovation and increased sustainability and viability of regional fisheries. GIFT is keen to develop research and outreach targeting youth in fisheries.

IYAFA Champions were pivotal to the initiation and facilitation of these events and were enthusiastic to engage youth in these discussions. They were all capable of leading the Country Chats without intervention from UWI-CERMES.

#### 3.2 Highlighted importance of intersectoral linkages in advancing SSF and SSA

Following the UWI-CERMES hosted webinar, *National Intersectoral Links with Caribbean Artisanal Fisheries and Aquaculture* on 21 April, two countries (Guyana and St. Vincent and the Grenadines) created case studies to illustrate intersectoral linkages and also share information on their national intersectoral committees (fisheries advisory committees). The studies focused on key economic sectors identified in a discussion paper (agriculture, tourism, manufacturing, transport and energy) compiled from a desk study and used as the basis for discussion in the introductory regional webinar. The webinar was attended by 6 women and 5 men.

After the webinar participants validated and expanded information in the discussion paper which was then finalized into a CERMES Technical Report. WECAFC IYAFA 2022 Champions led two NIL case studies in this publication. Comprising an overview followed by two case study chapters from Guyana and St Vincent and the Grenadines, the technical report got its viewpoint from the resource users rather than from academics or the governments. To achieve this, the St Vincent and the Grenadines case study authors included IYAFA 2022 Champion Winsbert Harry, a national fisherfolk leader, assisted by a young local consultant, Clonesha Romeo. The Guyana case engaged IYAFA 2022 Champions Pamashwar Jainarine, Rabani Gajnabi and Terrence Philips covering both fisheries and aquaculture. These IYAFA Champions were nominated and selected based on their contribution to SSF and SSA throughout their work in the WECAFC region. They took the NIL concepts and applied them to the cases in each country to provide a more tangible demonstration of how fisherfolk and aquaculturists can think about livelihoods especially in the context of the Blue Economy. As Caribbean countries contemplate their Blue Economy futures it is expected that attention will turn to optimizing intersectoral linkages, but this should not be to the disadvantage of small-scale fisheries and aquaculture.

The case studies were shared at the 75th GCFI, 7-11 November 2022, Fort Walton Beach, Florida as a presentation during the special session, *Linking the International Year of Artisanal Fisheries and Aquaculture to Sustainable Blue Economy Development in The Gulf And Caribbean Region*. The session was organized by the Western Central Atlantic Fishery Commission (WECAFC) through financing from the European Union, Gulf Caribbean Fisheries Institute.

3.3 Better coordinated and concerted IYAFA 2022 activities for the WECAFC region

As outlined in the interim project report, from the implementation of its LOA, UWI-CERMES indicated willingness and availability to collaborate with the WECAFC Secretariat and members and partners of the IYAFA WECAFC Coordination Committee to assist in planning and implementing IYAFA 2022 activities integrated with those of the UWI department. Such collaboration was limited to a few activities as partners were content to proceed with their own activities independently, which was acceptable to UWI-CERMES and quite efficient.

The primary collaboration throughout the project was on the organization of the inaugural Regional Women in Fisheries Forum organized by the WECAFC, the Gulf and Caribbean Fisheries Institute (GCFI) and UWI-CERMES and held on 6 November 2022 at the 75<sup>th</sup> meeting of GCFI, Fort Walton Beach, Destin, Florida. UWI-CERMES was invited by FAO to participate in the forum's planning committee along with other key partners - the Caribbean Network of Fisherfolk Organisations (CNFO), the Caribbean Regional Fisheries Mechanism (CRFM), SAEDI Consulting (Barbados).

Given its GIFT research and outreach activities, UWI-CERMES looks forward to assisting FAO and other relevant entities in the organization of subsequent forums. Such events focusing on women in fisheries are crucial to gender mainstreaming and transformative fishing industries in the region. The momentum gained at the inaugural forum must not be lost.

### 4 Challenges and lessons

The project did not suffer any challenges during implementation. The lifting of government-imposed restrictions for the COVID-19 pandemic ensured the return to hosting in-person country events such as the Popular Theatre capacity building sessions, Youth in Fisheries Country Chats and Regional Women in Fisheries Forum. All of these events benefited from the social interactions generated.

Effective execution of the project was made possible by the UWI-CERMES IYAFA project team comprising four persons. The two research assistants contracted to provide project assistance were invaluable to the completion of project activities and production of deliverables.

Caribbean fisherfolk, both women and men, are eager to participate in trainings, research and other similar activities that will assist in improved sustainability and viability of the fisheries they depend on for their livelihoods and well-being. They are particularly responsive to entities with whom they have developed long lasting relationships, partnerships and trust.

The two UWI-CERMES focal areas for IYAFA 2022 – gender mainstreaming and youth engagement, and intersectoral linkages – are two areas that require deeper and broader research and outreach for advancing SSF and SSA in the Caribbean.

#### **5 DELIVERABLES**

All project deliverables submitted are referenced below. Highlighted deliverables are those that were previously listed in the interim project report.

Berry, S. 2022. IYAFA Youth Country Chat – Jamaica. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. Project Report. 11pp.

- Blackman, K., S Compton, P McConney, M Pena and B Simmons. (Eds.) 2022. National intersectoral links with Caribbean artisanal fisheries and aquaculture: considerations and cases. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. CERMES Technical Report No 107. 69 pp.
- CERMES. 2022. UWI-CERMES and partners celebrate the International Year of Artisanal Fisheries and Aquaculture (IYAFA 2022). Gender in small-scale fisheries: Message from Leisa Perch, CEO SAEDI Consulting Barbados Inc. IYAFA promotional video. Duration: 2:46. Visit the CERMES IYAFA webpage
- CERMES. 2022. UWI-CERMES and partners celebrate the International Year of Artisanal Fisheries and Aquaculture (IYAFA 2022). It's all about sustainable Caribbean small-scale fisheries: Message from Sheena Griffith, Central Fish Processors Association, Barbados. IYAFA promotional video. Duration: 1:01. Visit the CERMES IYAFA webpage
- CERMES. 2022. UWI-CERMES and partners celebrate the International Year of Artisanal Fisheries and Aquaculture (IYAFA 2022). Policy and Caribbean small-scale fisheries and aquaculture. Message from Peter A. Murray, CRFM Secretariat. IYAFA promotional video. Duration: 2:47. Visit the CERMES IYAFA webpage
- Gajnabi, R. and R. Arjune 2022. IYAFA Youth Country Chat Guyana. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. Project Report. 8p.
- Griffith, Sheena. 2022. "Fisherwoman's Lament". Poem inspired by Popular Theatre capacity building sessions.
- Pena, M. 2023. Women fisherfolk learning to apply popular theatre for positive change in small-scale fisheries. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. Project Report. 8pp.
- Pena, M. and M. Barrow. Voices from the Shore Theatre Collective: Women fisherfolk learning to apply Popular Theatre to transform small-scale fisheries. Poster presented at 75<sup>th</sup> Gulf and Caribbean Fisheries Institute (GCFI), Fort Walton, Destin, Florida, 7-11 November 2022.
- Simmons, B. 2022. Is social justice just for women in fisheries. International Women's Day webinar summary report. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. 2p.
- Toussaint-Charlery, K. 2022. IYAFA Youth Country Chat Saint Lucia. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. Project Report. 9p.

Taitt, M. 2022. IYAFA Youth Country Chat – Barbados. Centre for Resource Management and Environmental Studies, The University of the West Indies, Cave Hill Campus, Barbados. Project Report. 11pp.

#### **6 APPENDICES**

#### Appendix 1 - World Fisheries Day - social media promotional images

# World Fisheries Day 2022

#### Fisherwoman's lament

By Sheena Griffith, Central Fish Processors Association, Barbados

From early morning we up in hey,

Cooking and cleaning is how we start we day,

We get the children ready and we on we way.

On to the market hoping something dey 'cause you know we got bills to pay.

Sometimes there is nothing and all we can do is walk away

Hoping that tomorrow would a better day.

We work and we toil the season from November to June,

Could be longer or shorter 'cause we moving to the flyingfish tune.

Even when you get fish it is a bitter pill

People complain they don't like them bill.

But before y'all start cast the blame let me explain

How our day begins, out on the dock in the sun sometimes the rain.

Pulling that big box for ice must be brought to secure our fish

To make sure that consumers can have a healthy dish.

One hard job done on to the next

To stand up and debone the flying fish and we don't get vex.

From seven in the morning to six in the night

Sweating to get the fish done right and tight.

On our feet we stay

The whole day

Till it's time to be on our way.

You think that is the end, no my dear

Cause the family, the house and other obligations still bout there.

When you go to bed to rest sometimes it's in vain

For that is the time you feel the pain.

The wear and tear on we body for those six months alone

Telling on us right down to the bone

Carpal tunnel, arthritis and poor circulation.

Threatening to put us out of commission.

Pain, rested or not we still got to get to work cause fish in the box

And we racing against time cause the fish don't care if we well rested or not.

So we push and press on putting we body to test and to the limit

In this job people especially men think it is a gimmick

To hear comments they say to you

Like what hard work women really do?

You just standing up there moving your hands, that's all they shout And it's that kind of ignorance we could do without.





# World Fisheries Day 2022

Fishermen face challenges in their daily role in the harvest sector. Here are a few quotes from fishermen in the region about the main challenges they face in the fishing industry.

demanding the government to place conch under endangered status which will affect our livelihoods without presenting the proper research and assessments.



Cost of operations, fuel, bait, storage, ice and marketing.



ANDRÉS MALDONADO, PUERTO RICO



Young persons in the industry have a lot of competition from the older folks because they feel like them have more rights to the resources, know more and have more needs. Young fishers work just as hard.

TYLON JOSEPH, GRENADA



"Efforts to educate stakeholders (boat owners and workers) on moving away from the current path they are following in not complying with the best practices needed for long term survival of the industry have been the most frustrating.

BANASHWAR IAINARINE SUVANA





#IYAFA2022 #ArtisanalFisheriesAquaculture

# World Fisheries Day 2022

Fishermen face challenges in their daily role in the harvest sector. Here are a few quotes from fishermen in the region about the main challenges they face in the fishing industry.

Crew (workers) attitude to the trade.

CECIL MARQUEZ, GRENADA

Climate change is real and the effects are devastating to the industry...There is not much one can do to combat these problems. This is leading to hopelessness and frustration.

PAMASHWAR JAINARINE, GUYANA



There is no legal structure in place, no laws that governs how fishers should be paid and not just leaving it at the discretion of a captain, unlike on land where there is an established minimum wage. \*\*\*

TYLON JOSEPH, GRENADA

As a young person, it's practically impossible to access funds to develop a business.

TYLON JOSEPH, GRENADA



Government inefficiency when it comes to defending fishers. I had to visit politicians to demand that they show us the data used to make a decision that will affect my livelihood.

ANDRÉS MALDONADO, PUERTO RICO

Skilled workers are getting old and workers replacing them don't have the work ethics as previous workers.

PAMASHWAR JAINARINE, GUYANA





#IYAFA2022 #ArtisanalFisheriesAquaculture

## **World Fisheries** Day 2022

Fishermen also give input and ideas on how to overcome some of the challenges they face in fishing industry. They are not waiting on the government to provide solutions.

We need to insert fisheries into a curriculum and have some sort of school to trained fishers so people stop seeing fishing as a side hustle. This would help people see fishing as a livelihood and it would change the outlook of how fisherfolks are perceived. 99



More lucrative and sustainable markets for their products must be developed thus building confidence and belief in the sector. 99

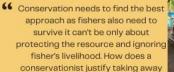
CECIL MARQUEZ, GRENADA



66 I will continue my advocacy work, demanding protection for alternatives ways to protect the resource, assisting with research. I am open to been part of the solution. 99

study to have reliable data on the abundance of conch. It must be done jointly with fishers; conch don't stay in one place so we cannot survey the same area all the time. 99

66We need continuous census or



people's livelihood? 99



66 Fishers and potential fishers must be trained, and mindsets developed to absorb the fishing trade as an important tool for growth and development. They must see their role as a scientific profession casting aside the image that was created as a job that was only for the lower folks of society. 99





#IYAFA2022 #ArtisanalFisheriesAquaculture



