INTRODUCTION

A mission was carried out to analyze the midway data collection process and digital transformation in the southwest region of Madagascar, just 10 months after initiating the process. Adjustments and modifications were made to continuously improve the data collection method. It was also an opportune moment to gather all the Data Collectors (DCs) and consult their opinions on the data collection aspect, as well as the behaviors of fishermen in the villages and the weather.

The affected villages are distributed among 3 Locally Managed Marine Areas (LMMAs): Teariake, Velondriake, and Manjaboake. There are 11 villages involved in octopus data collection and 3 villages for fish data.

Simultaneously, together with the staff and the DCs, we prepared the next feedback session after extracting all the quarterly data from the server.

Below is the list of villages:

Octopus Data Collection: Morombe, Andavadoaka, Tampolove, Bevato, Ambatomilo, Bevohitse, Andranombala, Nosy.Ve, Antsepoke, Ankitambagna, Ambohibao. Fish Data Collection: Lamboara, Belavenoke, and Andavadoaka.

Objectives

DC grouping (refresh, kobo form update) Prepare the next feedback session for octopus Data and finfish Deploy and teach to all DCs the new kobo form replacing abalobi application Collecting the remaining book for finfish Update the activity with Science team about fishing site survey finalize the GPS point collection of Temporary closure and

Approach :

We have used our kobo server to download the data sent by our data collector during the period of February until June (Where January was not considered due to the National closure period). We have run the merging, cleaning and analysis of data with R software and excel to gain more time.

Then we have launched a Q & A session to listen to the feedback from them and update directly the kobo form depending on the recommendations.

TEAM IMPLICATED:

Fisheries, CLO TVM staff, outreach team

DEROULEMENT AND CONTENT

After updating the kobo form, we ran 4 days of training including practice and repetition. We have finished preparing the support for the feedback session and have done a simulation to refresh the skill in terms of facilitation.

we have practiced also a gonad sample on fish, length and weight measurements

find here (tutorial video support for finfish) and here (tutorial video for octopus)

find here the template used to analyze data

<u>CPUE</u> per village

PRODUCTION per village

CONCLUSION

We actively engage in a comprehensive process loop, encompassing diligent data collection, meticulous analysis, and impactful feedback sessions, all tailored specifically for the benefit of the local community. Our dedication to this cyclical approach ensures that we maintain a consistent and fruitful flow of information by conducting regular feedback sessions every three months. Moreover, we have achieved mastery over the entire process, employing efficient strategies to ensure its smooth operation.

Furthermore, in our commitment to embrace technological advancements, we have successfully digitized all data collections within the TVM (Teariake, Velondriake, Manjaboaky) Locally Managed Marine Area.

Based on the recommendations made by the Data Collectors (DCs) during the dissemination phase, it is strongly advised to conduct feedback sessions with a minimum of two DCs present at all times.

NEXT STEP

• The next will be the village tour program for the 11 villages remaining to gain their perceptions and recommendations.

- Reorganize data collectors in Andavadoaka, Ambatomilo, Morombe and transform 4 of them into finfish DC.
- follow the progress of program with science team to map the GPS point of all fishing site in TVM zone and defining together the site to be monitored regularly

Annexes and photo:

Question	Why do octopus and finfish data decrease ?					
Village	Note answers					
BEVOHITSE	Fishermen migrate from the southern to the northern region of Madagascar. The number of gleaners venturing out for fishing is declining. The presence of octopuses is noticeably scarce. Inclement weather, known as "tai-draty," frequently occurs, impeding the ability of gleaners to engage in fishing activities					
BEVATO	The catch diminishes by March. Fishermen relocate to the northern coast of Madagascar. One DC was in bad health, forcing her buddy to work alone. Frequent inclement weather obstructed the ability of gleaners to venture out. The most frequently visited fishing site underwent a temporary closure. Bevato temporarily suspended its operations.					
TAMPOLOVE	The number of octopuses has decreased. The gleaners resorted to fishing instead of gleaning. The water temperature has dropped, and as a result, the gleaners refrained from diving. The weather was frequently unfavorable					
ANTSEPOKE	The majority of gleaners and fishers head towards Maintirano and Mahajanga. The sea frequently becomes rough or turbulent. The octopus gleaners targeted the Gamo species for fishing. The occurrence of "Tsioky atimo" was common.					
ANDRAGNOMB ALA	The number of octopuses decreased in March. The weather was cold, causing people to stay inland. The gleaners went fishing instead of diving. Andranombala did not undergo a temporary closure.					
NOSY VE	The number of octopuses decreased in March. The weather was cold, causing people to stay inland. The gleaners went fishing instead of diving. Nosy Ve did not undergo a temporary closure.					

MOROMBE	 People in Morombe diversify their livelihoods and adapt their strategies based on seasonal products. For instance, currently, they engage in night fishing due to the abundance and visibility of nocturnal fish. The catch of octopuses decreases in April, May, and June. The southern wind frequently occurs. FID organized a HIMO (High-Intensity Labor) project in Morombe, and the women gleaners prefer to participate because it allows them to earn money directly on a daily basis. The appearance of stars named "Kania" and "Vono" creates turbulent weather and sea conditions. Morombe implemented a temporary closure.
ANKITAMBAGN A	The catch is insufficient and not meeting expectations. The majority of octopuses observed in June were still small, indicating a prevalence of baby octopuses. The weather conditions were unfavorable. The gleaners relocated to the northern region of Madagascar. They implemented an octopus closure
AMBOHIBAO	The catch during March and May was below expectations. The data primarily comes from women gleaners. The gleaners relocated to the northern region of Madagascar. They implemented an octopus closure
ANDAVADOAK A	The gleaners consistently went fishing, but the catch was consistently insufficient. Instead of catching octopuses, the gleaners caught species known as "liva" and "katra." They preferred to fish for "goja" due to its tolerance for colder temperatures. The weather frequently turned unfavorable. Women gleaners exclusively focused on Tehaky for their gleaning activities, while men continued diving during the "lemirano" period, which had a negative impact on the octopus stock for the women gleaners.
AMBATOMILO	The catch of octopuses is declining. Half of the people are engaged in seaweed farming, while the other half goes out fishing. The majority of octopuses observed in June were small, prompting the decision to temporarily close the area. In April, a seaweed disease outbreak occurred, requiring the gleaners to dedicate time to tending to their seaweed farms. Inclement weather has been frequent over the past three months.
FINFISH ANDAVA	Inclement weather persists. Overall, the quantity of products is decreasing. The fish species known as "goja" is highly abundant, but due to high demand, fishermen are selling it as early as 4:00 am, making data collection challenging.

FINFISH BELAVENOKE	The product availability is decreasing. The fish species known as "geba" is highly abundant between May and June. Fisher migration towards the north occurs from March to December
FINFISH	The fish population has decreased in number.
LAMBOARA	Fishermen migrate to the north from March to December.

Find below the annual typical budget if we want to run a correct and regular feedback session

budget type pour dissemination trimestriel dans l'année						
TOTAL CASH	Q1	Q2	Q3	Q3		
	1184000.	1184000.	1184000.			
4736000.00	00	00	00	1184000.00		
TOTAL IMPREVUE	ANNEES					
	264000.0					
264000.00	0					
ACTIVITE FISHERIES DANS LE	E COURA	NT D'UNI	E ANNEE			
Items	<u>Unity</u>	<u>Nbre</u>	<u>Qty</u>	<u>PU</u>	<u>Amount</u>	
Indemnité DC VDK	day	4	24	8500.00	816000.00	
Indemnité 14 DC MJB	day	4	14	8500.00	476000.00	
Indemnité 06 DC TRK	day	4	6	8500.00	204000.00	
Pause café pêheur Bevato	day	4	79	500.00	158000.00	
Pause café pêcheurs Belavenoke -						
Finfish	day	4	111	500.00	222000.00	
Pause café pêcheurs Andranombala	day	4	100	500.00	200000.00	
Pause café pêcheurs Nosy ve	day	4	75	500.00	150000.00	
Pause café pêcheurs Andavadoaka -						
Octopus	day	4	177	500.00	354000.00	
Pause café pêcheurs Andavadoaka -						
Finfish	day	4	119	500.00	238000.00	
Pause café pêcheurs Lamboara -						
Finfish	day	4	241	500.00	482000.00	

Pause café pêcheurs Tampolove	day	4	81	500.00	162000.00
Pause café pêcheurs Ankitambagna	day	4	72	500.00	144000.00
Pause café pêcheurs pêcheurs					
Antsepoke	day	4	53	500.00	106000.00
Pause café pêcheurs Bevohitse	day	4	141	500.00	282000.00
Pause café pêcheurs Amboibao	day	4	84	500.00	168000.00
Pause café pêcheurs Ambatomilo	day	4	145	500.00	290000.00
Pause café pêcheurs Morombe	day	4	142	500.00	284000.00
TOTAL					4736000.00
IMPREVU					264000.00
TOTAL GENERAL					500000.00