



Part I: Project Information

GEF ID

10997

Project Type

FSP

Type of Trust Fund

LDCF

CBIT/NGI

CBIT No

NGI No

Project Title

Strengthening the Resilience of Climate-Smart Agricultural Systems and Value Chains in the Union of Comoros

Countries

Comoros

Agency(ies)

UNDP

Other Executing Partner(s)

National Directorate of Agricultural Strategies and Livestock

Executing Partner Type

Government

GEF Focal Area

Climate Change

Sector

Climate Change Adaptation Sector

Taxonomy

Focal Areas, Climate Change, Climate Change Adaptation, Ecosystem-based Adaptation, Private sector, Livelihoods, Adaptation Tech Transfer, Small Island Developing States, Community-based adaptation, Innovation, Climate resilience, Least Developed Countries, Influencing models, Strengthen institutional capacity and decision-making, Deploy innovative financial instruments, Convene multi-stakeholder alliances, Demonstrate innovative approaches, Stakeholders, Beneficiaries, Civil Society, Non-Governmental Organization, Community Based Organization, Trade Unions and Workers Unions, Local Communities, Private Sector, SMEs, Individuals/Entrepreneurs, Type of Engagement, Partnership, Consultation, Participation, Information Dissemination, Gender Equality, Gender results areas, Awareness Raising, Access to benefits and services, Capacity Development, Participation and leadership, Knowledge Generation and Exchange, Access and control over natural resources, Gender Mainstreaming, Women groups, Sex-disaggregated indicators, Capacity, Knowledge and Research, Enabling Activities, Learning, Adaptive management, Indicators to measure change, Theory of change, Knowledge Generation, Targeted Research

Rio Markers

Climate Change Mitigation

No Contribution 0

Climate Change Adaptation

Principal Objective 2

Biodiversity

Land Degradation

Submission Date

Expected Implementation Start

7/1/2024

Expected Completion Date

6/30/2029

Duration

60In Months

Agency Fee(\$)

848,580.00

A. FOCAL/NON-FOCAL AREA ELEMENTS

Objectives/Programs	Focal Area Outcomes	Trust Fund	GEF Amount(\$)	Co-Fin Amount(\$)
CCA-1	Reduce Vulnerability and Increase Resilience through Innovation and Technology Transfer for Climate Change Adaptation	LDC F	4,466,210.00	11,757,179.00
CCA-3	Foster enabling conditions for effective and integrated climate change adaptation	LDC F	4,466,210.00	23,957,315.00
Total Project Cost(\$)			8,932,420.00	35,714,494.00

B. Project description summary

Project Objective

Increase the climate resilience of key agricultural value chains through innovation, diversification and strengthened capacities to sustainably improve the livelihoods of smallholders and contribute to the national economy

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
--------------------------	-----------------------	--------------------------	-------------------------	-------------------	----------------------------------	-----------------------------------

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
Component 1: Systemic, institutional and individual capacities for climate-resilient agriculture	Investment	<i>Outcome 1. Enhanced capacity of national institutions and value chain actors involved in agriculture development to guide, plan, supervise and implement climate-resilient practices</i>	<p><i>Output 1.1 Capacity development needs identified and addressed for key national and regional institutions and organisations to guide, plan, supervise and implement the development of resilient agricultural value-chains in Comoros</i></p> <p><i>Output 1.2 Technical capacities of CRDEs to disseminate and support the adoption of climate-smart agricultural practices among smallholder farmers and value chain actors increased</i></p> <p><i>Output 1.3. INRAPE's capacities to characterize new climate-adapted Comorian agrobiodiversity products, and control the quality of</i></p>	LDC F	1,948,050.00	4,726,000.00

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
			<i>export products, increased</i>			
			<i>Output 1.4 Climate-resilient agricultural land-use plans elaborated in 8 CRDEs</i>			
			<i>Output 1.5 Secured land tenure initiative piloted</i>			

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
Component 2: Diversification of climate-resilient value chains	Investment	Outcome 2 <i>Increased resilience of agricultural actors through the identification and promotion of new climate-resilient value chain options with good prospects for profitability, increased access to national and international market information and equitable benefit sharing</i>	<p><i>Output 2.1 Value chain development plans prepared with the private sector, cooperatives and other stakeholders</i></p> <p><i>Output 2.2 Climate resilient seed varieties selected and optimized technical itineraries developed and disseminated</i></p> <p><i>Output 2.3 Digital platform connecting agricultural producers and buyers in national and international markets functional</i></p> <p><i>Output 2.4 Climate-resilience of selected value chains reinforced through local processing and marketing of agricultural products</i></p>	LDC F	1,230,500.00	9,000,000.00

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
			<i>Output 2.5 Pilot traceability systems of agricultural value chains tested and evaluated and certification obtained for 2-3 cooperatives or private firms</i>			

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
Component 3: Implementation of agroecological practices adapted to climate change in targeted intervention areas	Investment	Outcome 3: <i>Increased adoption of climate-resilient practices and crops/varieties by smallholder farmers and value chain actors facilitated by support systems and adequate provision of inputs and resources</i>	<p><i>Output 3.1 Climate-smart agronomic approaches and practices developed and piloted by CRDEs to reduce climate vulnerability of the agricultural sector</i></p> <p><i>Output 3.2 Climate resilience of poultry and goat farming value chains strengthened</i></p> <p><i>Output 3.3 Local supply of agricultural inputs and small equipment disseminated</i></p> <p><i>Output 3.4 Access conditions explained and financial products made more accessible to smallholder farmers to support the adoption of climate-resilient practices</i></p>	LDC F	4,511,000.00	20,221,194.00

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
Component 4: Knowledge Management, Monitoring & Evaluation, and Gender and PWDs? inclusiveness	Technical Assistance	Outcome 4 <i>Improved development, management, and dissemination of knowledge related to gender-sensitive adaptation of the agricultural sector to climate change to support the replication of climate resilient solutions among CRDEs, and at national and regional scale</i>	<p><i>Output 4.1 Project M&E and lessons learned from project interventions documented and disseminated</i></p> <p><i>Output 4.2 Agro-climatic knowledge for climate adaptation developed through strengthened monitoring and research-action involving farmers</i></p> <p><i>Output 4.3 Tools for experience and knowledge-sharing among CRDEs and actors in value chains developed and operationalized</i></p> <p><i>Output 4.4 Gender and PWDs action plans based on comprehensive analyses implemented, monitored, and evaluated to promote an</i></p>	LDC F	572,005.00	67,000.00

Project Component	Financing Type	Expected Outcomes	Expected Outputs	Trust Fund	GEF Project Financing(\$)	Confirmed Co-Financing(\$)
			<p><i>inclusive approach to the adoption of a climate-resilient agriculture and mitigation measures of the identified Environmental and Social risks monitored</i></p> <p><i>Output 4.5 Awareness campaign conducted to enhance the attractiveness of the agricultural sector and promote climate-smart approaches</i></p> <p><i>Output 4.6 Project exit strategy prepared and validated</i></p>			
Monitoring and evaluation	Technical Assistance			LDCF	265,000.00	
Sub Total (\$)					8,526,555.00	34,014,194.00
Project Management Cost (PMC)						
	LDCF		405,865.00			1,700,300.00

Project Management Cost (PMC)

Sub Total(\$)	405,865.00	1,700,300.00
Total Project Cost(\$)	8,932,420.00	35,714,494.00

Please provide justification

C. Sources of Co-financing for the Project by name and by type

Sources of Co-financing	Name of Co-financier	Type of Co-financing	Investment Mobilized	Amount(\$)
Recipient Country Government	Government of Comoros	In-kind	Recurrent expenditures	2,293,300.00
GEF Agency	UNDP	Grant	Investment mobilized	200,000.00
Recipient Country Government	Government of Comoros / Ministry of Agriculture, Fisheries, Environment, Tourism and Handicraft (PIDC, PREFER,PASAICV, GCF-Water)	Public Investment	Investment mobilized	29,721,194.00
Recipient Country Government	INRAPE	Public Investment	Investment mobilized	3,500,000.00
Total Co-Financing(\$)				35,714,494.00

Describe how any "Investment Mobilized" was identified

Government of Comoros / Ministry of Agriculture, Fisheries, Environment, Tourism and Handicraft (PIDC, PREFER,PASAICV, GCF-Water): Investment mobilized totalling USD 29,721,194, based on the investments realized through 4 different projects implemented by MAPETA and which will directly contribute to the LDCF project results and enhance synergies and impacts between them: - PIDC Project (USD 5,000,000) - Integrated Development and Competitiveness Project (World Bank funding) - PREFER project (USD 3,000,000) - Family Farm Productivity and Resilience Support Project (IFAD funding) - PASAICV project (USD 5,000,000) - Project to Support Integrated Food Systems and Value Chains (AfDB funding) - GCF-Water project (USD 16,721,194) - Ensuring climate resilient water supplies in the Comoros Islands (GCF funding) INRAPE: The National Research Institute for Agriculture, Fisheries and the Environment (INRAPE) will contribute an amount of USD 3,500,000 to this project. This INRAPE's investment mobilized includes, in particular, bilateral support from the Japanese government to build INRAPE's capacities through the construction of a multidisciplinary laboratory for quality control, supply of equipment, and staff capacity building. This investment will provide a foundation to project interventions aiming at strengthening national capacities to characterize, certify and label unique Comorian varieties for the benefit of the people of the country. UNDP: UNDP investment mobilized will augment capacities of the PMU and build on and ensure synergies with other interventions supported by UNDP in the target areas of the LDCF project.

D. Trust Fund Resources Requested by Agency(ies), Country(ies), Focal Area and the Programming of Funds

Agency	Trust Fund	Country	Focal Area	Programming of Funds	Amount(\$)	Fee(\$)	Total(\$)
UNDP	LDC F	Comoros	Climate Change	NA	8,932,420	848,580	9,781,000.00
Total Grant Resources(\$)					8,932,420.00	848,580.00	9,781,000.00

E. Non Grant Instrument

NON-GRANT INSTRUMENT at CEO Endorsement

Includes Non grant instruments? **No**

Includes reflow to GEF? **No**

F. Project Preparation Grant (PPG)

PPG Required **true**

PPG Amount (\$)

200,000

PPG Agency Fee (\$)

19,000

Agency	Trust Fund	Country	Focal Area	Programming of Funds	Amount(\$)	Fee(\$)	Total(\$)
UNDP	LDC F	Comoros	Climate Change	NA	200,000	19,000	219,000.00
Total Project Costs(\$)					200,000.00	19,000.00	219,000.00

Meta Information - LDCF

LDCF true

SCCF-B (Window B) on technology transfer false

SCCF-A (Window-A) on climate Change adaptation false

Is this project LDCF SCCF challenge program?

false

This Project involves at least one small island developing State(SIDS). true

This Project involves at least one fragile and conflict affected state. false

This Project will provide direct adaptation benefits to the private sector. true

This Project is explicitly related to the formulation and/or implementation of national adaptation plans (NAPs). false

This Project has an urban focus. false

This Project covers the following sector(s)[the total should be 100%]:*

Agriculture	90.00%
Natural resources management	0.00%
Climate information services	5.00%
Coastal zone management	0.00%
Water resources management	5.00%
Disaster risk management	0.00%
Other infrastructure	0.00%
Health	0.00%
Other (Please specify:)	0.00%
Total	100%

This Project targets the following Climate change Exacerbated/introduced challenges:*

Sea level rise false

Change in mean temperature true

Increased climatic variability true

Natural hazards true

Land degradation true

Coastal and/or Coral reef degradation false

Groundwater quality/quantity false

Core Indicators - LDCF

CORE INDICATOR 1

Total

Male

Female

% for Women

Total number of direct beneficiaries

0

0

0

0%

CORE INDICATOR 2

Area of land managed for climate resilience (ha)

0.00

CORE INDICATOR 3

Total no. of policies/plans that will mainstream climate resilience

8

CORE INDICATOR 4

Male

Female

% for Women

Total number of people trained

14,440

7,474

6,966

48.24%

To calculate the core indicators, please refer to [Results Guidance](#)

OBJECTIVE 1

Reduce vulnerability and increase resilience through innovation and technology transfer for climate change adaption

OUTCOME 1.1

Technologies and innovative solutions piloted or deployed to reduce climate-related risks and / or enhance resilience



OUTCOME 1.2

Innovative financial instruments and investment models enabled or introduced to enhance climate resilience

[View](#)

OBJECTIVE 2

Mainstream climate change adaption and resilience for systemic impact

OUTCOME 2.1

Strengthened cross-sectoral mechanisms to mainstream climate adaption and resilience

[View](#)

OUTCOME 2.2

Adaptation considerations mainstreamed into investments

[View](#)

OUTCOME 2.3

Institutional and human capacities strengthened to identify and implement adaptation measures

[View](#)

OBJECTIVE 3

Foster enabling conditions for effective and integrated climate change adaption

OUTCOME 3.1

Climate-resilient planning enabled by stronger climate information decision-support services, and other relevant analysis, as a support to NAP process and/or for enabling activities in response to COP guidance



[View](#)

OUTCOME 3.2

Increased ability of country to access and/or manage climate finance or other relevant, largescale, pragmatic investment, as a support to NAP process and/or for enabling activities in response to COP guidance



[View](#)

OUTCOME 3.3

Institutional and human capacities strengthened to identify and implement adaptation measures as a support to NAP process and/or for enabling activities in response to COP guidance



[View](#)

Part II. Project Justification

1a. Project Description

Main changes in alignment with the project design outlined in the original PIF

Section/subject	Change as compared to PIF
Outcomes	<i>Outcome 4. Improved development, management, and dissemination of knowledge related to <u>gender-sensitive</u> adaptation of the agricultural sector to climate change to support the replication of climate resilient solutions among CRDEs, and at national and regional scale</i>
Outputs	<p>Outputs under all components have been reorganized and clarified to better match the delivery of the set Outcomes.</p> <p>PPG consultations and field visits have enabled to design concerted deliverables that in combination will reach the Outcomes, while better capturing the needs of different stakeholders and the contextual constraints.</p>
Cofinancing	The list of cofinancing partners has been confirmed. Cofinancing from the Government, through INRAPE (\$3.5M upgrade of the quality control lab with support from the Japanese government), has been added.
Social and environmental safeguards	During the PPG phase, the preparation of the SESP, the ESMF and the Gender Analysis and Gender Action Plan, have enriched the project document and approach, as described in the description of individual components below.

Table 1: Changes since PIF

1/ Global environmental and/or adaptation problems, root causes and barriers that need to be addressed

Problem statement

A small island state of volcanic origin located off the eastern coast of Africa, the Union of Comoros is a lower middle-income country home to 869,595 inhabitants (2020), for a density of 467 inhabitants/km², of whom 29.16% live in urban areas (2019 est.). Comoros' economy is undiversified and among the most food-import dependent in the world. A 2019 World Bank study found that the country suffers from a challenging economic geography (smallness, remoteness, and inaccessibility of its territory), political fragility and weakness of formal institutions. Significant remittances from the diaspora have contributed to deepening a consumption-driven growth trajectory and uneven progress towards shared prosperity by raising many Comorians out of poverty while leaving those behind who

cannot rely on diaspora networks. In addition, the general investment climate in terms of supporting infrastructure and regulations is weak, the financial system (except for some micro-finance institutions) is not trusted and public sector led utilities deliver expensive services of weak quality. Despite important natural assets (fertile volcanic soil, good precipitation, beautiful scenery and an economic fishing zone 70 times the size of its land mass), the country is not leveraging its resource potential. As a very small open economy with limited exports and a large trade deficit, Comoros are vulnerable to external shocks[1]1.

Comoros are particularly vulnerable to climate change, like other Small Island Developing States (SIDS). The results of vulnerability analyses carried out in Comoros[2]2 show that the sectors most vulnerable to climate change are agriculture and biodiversity (very high vulnerability), forestry, coastal areas, fishing, water resources, health, and economic and social infrastructure (high vulnerability). Without ambitious measures, the cost of climate-related impacts was estimated in 2014 at US\$ 836 million by 2050, or an average annual cost until 2050 of US\$ 23 million[3]3. The lack of preparation of its institutions to face the climate threat and the biodiversity crisis, the high level of poverty and the economy's dependence on unsustainable and undiversified agriculture combine to make the Comoros particularly vulnerable to the global and local environmental degradation.

The *Study of climate risk and adaptation options in the agricultural sector in Comoros*[4]4 conducted during the PPG shows that average rainfall will continue to decrease over time, with direct consequences on available water for agriculture and livelihood. Climate projections are based on Shared Socio-economic Pathways (SSP) for three emission scenarios, RCP2.6 (low emission scenario, peaking before 2050), RCP4.5 (emissions stabilize before the end of the 21st century at a low level), and RCP8.5 (greenhouse gas emissions continue to increase at the current rate). Recent projections[5]5 anticipate a decrease in annual precipitation of 63.3 mm per decade for the 'pessimistic' scenario RCP8.5. In addition, changing rainfall patterns strongly perturbate agricultural calendars, leading to reduced agricultural production. At the same time, raising temperatures increase evaporation and require more water for irrigation. The increase is particularly significant in the case of the more pessimistic scenario SSP5 8.5 for which the temperatures of the Comoros will increase by +0.4°C in 2025 and +3.7°C in 2100, that is to say an increase of 0.28°C per decade.

The intensification of the rains over short periods will result in increased erosion of agricultural land, frequent flooding of plots, more frequent rockfalls and landslides. The increased frequency of strong winds and cyclones has destructive effects on agricultural production. The evolution of climatic conditions also favors the emergence of new pests and diseases, including an increased occurrence of fungal diseases in the rainy season. Sea-level rise, combined with coastal erosion, threatens coastal ecosystems, coastal groundwater, coastal forests, equipment, and infrastructure, especially roads, and most coastal communities. Combined with anthropogenic pressures (deforestation, land degradation, sand extraction, inappropriate agricultural practices, etc.) on natural resources, these hazards are likely to strongly compromise the development efforts undertaken by the country in recent years and worsen the vulnerability of already fragile ecosystems and populations. The country's vulnerability to climate

change is also linked to poverty, which is more prevalent in rural areas, unemployment, which particularly affects young people and women, and high demographic growth.

Indeed, current poverty levels and gender inequality directly affect the resilience of rural populations, who do not have the capacity to cope with the new climate conditions, including climate variability, climate extremes and foreseen long-term changes. Rural populations highly depend on natural resources, which is exacerbated by isolation in a SIDS context. Women, the youth and People With Disabilities (PWDs) have been identified during the project preparation as particularly vulnerable to climate change. Women are also key actors for improving climate resilience, as they are heavily involved in farmer cooperatives and associations, have better access to credit, and play an important role in marketing vegetable products and milk, to name a few examples.

The problem this project seeks to address is the high vulnerability to climate change of rural communities in the Union of Comoros, which results into food insecurity, increased poverty and scarce development perspectives. Addressing this problem will have direct positive consequences on poverty levels and is a vehicle to address inequality and exclusion.

Root causes

The first underlying root cause of vulnerability to climate change is **poverty**. The *Latest Report on Poverty in the Comoros*^[6] notes that while there has been a reduction in poverty in both urban and rural areas since 2014, several indicators for well-being point to persistent inequalities. The report stresses the need to make use of latent comparative advantages to create more productive employment to ensure sustainable progress, while reducing inequalities. Without alternative livelihoods or vocational employment, natural resources are often the only source of revenue, especially for women. This situation is leading to detrimental degradation and overexploitation of ecosystems and prevents targeted communities to implement long-term responses to climate shocks and changes.

High population density and demographic growth associated with **insufficient integrated management and inadequate governance of natural resources and landscapes** has led to increased pressure on ecosystems, in particular forests, water and land.

A narrow resource base, a small domestic market and a weak business environment have also made it challenging for Comoros to diversify its economy. These problems are further compounded by important infrastructure deficits, particularly in terms of access to electricity, and a weak international connectivity.^[7] As a Small-Island Developing State (SIDS), the Comoros' economy suffers from **isolation**.

Finally, although compulsory, primary **education remains insufficient** to provide future adults with a solid background. The literacy rate remains below 62%^[8], fueling the gap in capacities for enterprise development.

Drivers

Degradation of ecosystems, on which local populations heavily rely for their means of subsistence, negatively impacts the vulnerability of local communities. For example, in the three islands, **overexploitation of vegetation resources**, in particular forest land, is reported, agricultural soil fertility is decreasing, in addition to high erosion and frequent landslides. Since wood is the primary source of energy, the forest resources are greatly threatened by their overexploitation.

Traditional **agricultural practices** such as forest clearing for the extension of cultivated areas and extensive livestock practices are not adapted to actual biophysical conditions, in particular on steep terrain, with limited use of anti-erosion techniques, leading to land degradation, soil erosion and loss of soil fertility.

Therefore, there is an urgent need to reverse these land and ecosystem degradation trends that further aggravate the magnitude and intensity of climate extremes, their impacts and to adopt climate-smart strategies and practices at farm level to increase soil fertility and resilience to climate shocks. Such transformative change in land use can be achieved at scale through linking land use and management with livelihood development opportunities, by taking value chain approaches and enterprise development to alleviate livelihood options.

To this end, the proposed project objective is to *increase the climate resilience of key agricultural value chains through innovation, diversification and strengthened capacities to sustainably improve the livelihoods of smallholders and contribute to the national economy*. Using an integrated approach, the project will promote climate-smart practices at all levels of the agricultural value-chains to limit the adverse impacts of climate change. It will also contribute to increasing the resilience and the overall living conditions of populations by proposing alternative and diversified agricultural value-chains offering climatic and environmental co-benefits.

Barriers

Barrier 1. Insufficient capacities at different levels to plan and implement innovative agro-pastoral practices adapted to changing climatic conditions, oversee their adoption and train relevant parties.

CRDEs (Centre ruraux de développement économique / Economic Development Rural Centres) have limited capacities to provide local advisory, extension and agricultural support services to adapt practices to climate change. Capacity limitations prevent them from adequately fulfilling their mandate, which is to supervise agricultural development, mostly due to limited human capacities (number of workers, and availability of skill) as well as infrastructure and equipment capacities. As a result, most CRDEs are not sufficiently operational, are understaffed and have insufficiently qualified staff. In addition, the insufficient capacities of the various actors responsible for planning, developing and disseminating climate-resilient practices is another key obstacle to their widespread adoption and implementation. Main capacity gaps identified include: insufficient technical capacity of state actors (DNSAE, regional directorates of Agriculture, CRDEs), local authorities (municipalities - mayors and councillors), non-state actors (national NGOs), and the private sector (especially for cash crops: collectors, vanilla preparers, exporters) to identify, develop and implement long-term climate change adaptation strategies and tools. Third, farmers' vulnerability is linked in particular to a lack of knowledge, know-how and weak entrepreneurial capacities. Farmers and breeders have little mastery of

smart agricultural practices that improve fertility and resilience to climate shocks. Traditional practices and calendars are no longer adequate in the face of new climate conditions. In addition, short-term weather conditions are available and adequately cover the country, but the data is not translated into a crop calendars. Knowledge of parasite and disease infestations is insufficient and inadequately disseminated. Farmers also lack information on prices (especially for cash crops), limiting their capacity to negotiate and obtain fair prices for their products.

Barrier 2. Lack of knowledge of alternative climate-adapted options with the potential to support a prosperous, diversified and equitable agricultural economy and insufficient political and private support for their adoption.

The agricultural sector in Comoros is heavily relying on a narrow base limited to three cash crops and a few vegetable and food crops that are vulnerable to the effects of climate change. Comorian food products, which are mainly de facto organic^[9], are more expensive than imported products, despite the transport costs. Imported food and vegetable crops, mainly from Tanzania and Madagascar, are grown industrially and come at a lower cost. Consumers who can afford it prefer local products, but most consumers cannot afford it. As a result, traditional agriculture is poorly profitable, particularly in most remote rural areas given transport difficulties to access urban markets (bad roads, undeveloped boat transport between islands). These difficulties strongly limit young people's interest in agriculture as a job. Constraints to the fluidity of national markets, limited market connectivity (national and international), and lack of access to market information also limit sustainable economic opportunities for smallholder farmers, due in particular to the country's insular nature, geographic remoteness, lack of reliable and regular transportation means between islands and suitable port infrastructure and lack of connection with reliable and predictable buyers. The profitability of agricultural activity is even more limited for smallholder farmers who are not integrated into cooperatives. They are therefore particularly vulnerable to other actors in the value chains who may take precedence in determining the conditions of production and the prices granted for the products, resulting in an inequitable sharing of profits. Another significant limitation to the profitability of Comorian agricultural products is the lack of processing and marketing capacities.

Barrier 3. Limited use of technologies and approaches to mitigate climate-related risks and low access to credit on appropriate terms to support smallholder farmers? shift towards climate resilient agricultural value chains.

The adoption of resilient agricultural practices and approaches is hampered by the weak capacity to manage risks and uncertainties generated by climate change which is linked to the lack of knowledge on alternative options (barrier 2), on risk management approaches and on agricultural practices that increase resilience to climate change. Low financial autonomy and the difficulty of access to credit on appropriate terms for farmers, especially for men, worsens vulnerability to climate risks, and the culture of savings is insufficiently widespread in rural areas. Insufficient or lack of savings makes smallholder farmers very vulnerable to the effects of climate change since they do not have the resources to, for example, buy seeds for a second sowing following the failure of the first due to shifted or adverse weather conditions, or to purchase the equipment needed to adopt agricultural practices that increase climate resilience.

The lack of autonomous and timely local production of quality seeds and local supply of low-cost equipment maintains the dependence of farmers on external suppliers and results in prohibitive costs for the supply of suitable seeds, micro-irrigation equipment and with suitable tools

The lack of access to arable land due to the shortage and degradation of agricultural land require restoration of soil fertility through soil conservation techniques. In addition land tenure insecurity (for example, farmers operating on State land pay a rent based on an annual contract) prevents any long-term fertility building investments to be made by farmers.

Barrier 4: Limited consolidation and dissemination of knowledge on successful models and strategies (including developed by farmers) for the adaptation of agricultural practices to climate risks hinders their large-scale replication and limits the impact of efforts aimed at climate adaptation of agricultural value chains.

CRDEs and national institutions concerned with climate adaptation of the agricultural sector do not have access to a sound knowledge base built from reliable data to support expert advice to manage climate risks appropriately and integrate it into agricultural land development plans and other guidance tools to support farmers in their decision-making. Farmers are thus left to resort to their traditional knowledge and non-adapted crop calendars and tools leading to inappropriate timing for agricultural works and maladapted practices.

Knowledge of climate-smart practices by all agricultural stakeholders is limited and not adequately recorded and disseminated. There is hardly any research being done in agriculture, and even less on the adaptation of the agricultural environment to climate change, whether by INRAPE, the University of the Comoros or the National Horticultural Center. In recent years, rare agricultural censuses have been carried out sporadically. There is currently no systematic monitoring of agricultural production at the national level, nor any involvement of producers in the monitoring and evaluation of productions resulting from the adoption of new practices. Currently, the collection of data on agricultural production by CRDEs is limited and not following standard methodologies. Dissemination of knowledge developed by CRDEs is mainly done through relay-farmers and limited to farmers in their territory. It is not shared with the other CRDEs, even less so with other farmers, so that farmers who depend on poorly performing CRDEs have limited exposure to adaptation solutions that could improve the climate resilience of their activities. Capacities to develop and access best practices, information and technical know-how to support the development of guidelines for climate change adaptation in agriculture are nascent and need to be strengthened.

Barrier 5: Limited understanding of challenges and barriers specific to women and persons with disabilities (PWDs) in adopting practices that promote agricultural climate resilience.

Limited understanding of women and PWDs specific challenges and barriers limits the design and implementation of appropriate measures to address them and adopt an inclusive approach when strengthening agricultural resilience. Statistics show that the agricultural sector employs more women than men in the Comoros (CDN 2021). According to an ongoing project^{[10]¹⁰}, 75% of farmers in Mwali are women. However, although women work more than men, men are much more often the owners of agricultural land and cultural traditions reduce the participation of women in decision-making. Women are mainly responsible for food crops and market gardening, as well as family poultry farming. They also work in cash crops but very little in their marketing. Gender-specific differences,

needs, roles, climatic and socio-economic vulnerabilities and priorities regarding different tasks across agricultural value chains have evolved in recent years, may vary among islands, and are not clearly documented. People living with disabilities (PWDs) are present in all communities but are mostly kept out so that they cannot earn a fair living, nor contribute to the economy and national growth. Although their representation within the population is not adequately documented in the absence of a comprehensive demographic census, it is estimated that over 60% of PWDs have never attended school and 67% are inactive^[11]. Although new approaches and techniques that are less labor intensive are now available, PWDs are not encouraged to get involved in value chains. Lack of awareness of the obstacles to the integration of PWDs into agricultural value chains and their equitable access to the resulting benefits limits the development of solutions. Such knowledge is essential for designing interventions where women and PWDs will be fully involved in all stages of the project, including those that involve decision-making and planning, capacity building that meets their specific needs, and concrete support for the application of climate-resilient agricultural practices. Also, women representation in governance bodies within CRDEs, cooperatives, unions, and other instances across the value chains is not representative of their actual participation in the sector. Without adopting a fully inclusive and participatory approach with particular attention to women, youth and PWDs, projects cannot ensure that vulnerable community members benefit equitably from the CRDEs extension services, such as demonstrations and close support for the adoption of climate-adapted practices and varieties that contribute to a sustainable development of agriculture in the future.

2/ Baseline scenario and any associated baseline projects

Adaptation of the agriculture, forestry, livestock, fisheries, water resources sectors are central to the Climate Change Policy, Strategy and Action Plan elaborated in 2015. The *Plan Comores ?mergents (PCE)* identifies climate and disaster resilient development as a key success factors in the ambition to make Comoros "a country resilient to shocks in all dimensions of sustainable development". In terms of agriculture, the vision of the PCE is to promote more productive, climate resilient, competitive and sustainable agricultural systems that ensure food security. In line with this, the National Agricultural Investment Plan (PNIA) 2020-2024 aims to ensure the agricultural sector is "competitive, sustainable and resilient to climate change, contributing to economic growth, job creation and food security?".

The government of Comoros recognizes the need to tackle major obstacles to the performance of the agricultural sector, and will continue to invest over the next 5 years in new projects to address them. The contribution of these investments, with a strong focus on the infrastructure needed to ensure access to national and regional markets, and sustainable access to water, to the project outcomes over the 5-year project period (2024-2029) is estimated at US\$ 35,714,494. This includes initiatives supported by development partners (GCF, WB, IFAD and AfDB) which will come as cofinancing to the proposed LDCF project, as follows:

? WB Integrated Development and Competitiveness Project (PIDC) (2019-2024), aims at promoting business development, supporting actors in the value chains, and the development of micro,

small and medium-sized enterprises. This project will contribute to the LDCF project outcomes 1 and 2 through strengthening institutional capacities for the development of agricultural value chains and supporting private sector enterprises for processing and marketing of agricultural products.

? IFAD's Family Farm Productivity and Resilience Support Project (PREFER)(2017-2025) aims at helping vulnerable smallholder farmers improve agricultural production and their capacity to cope with climate change, increase their income and strengthen food and nutrition security. This project will contribute to the LDCF project outcomes 3.

? AfDB's Project to Support Integrated Food Systems and Value Chains (PASAICV) for nutrition security and resilient livelihoods (2022-2027), aims at improving food system by promoting sustainable investment in fisheries, agriculture and livestock. Interventions under Component 2 relating to the integrated development of agriculture and livestock will contribute to the LDCF project Outcome 3.

? The Green Climate Fund/UNDP project (GCF-Water) (2019-2027) aims at strengthening a climate-resilient water supply and irrigation in 15 vulnerable areas in Comoros, covering 7 of the 8 CRDEs targeted by the LDCF project. As such, GCF investments will directly contribute to LDCF Outcome 3 achievement, through water supply for production. It will be completed by the LDCF project to reach farmers' plots for irrigation, and to achieve water supply in Mledjele CRDE currently not covered by GCF interventions.

? Current investments to reinforce INRAPE's operational capacities (quality control lab), in particular regarding quality control of imported and export products, are estimated at \$3,500,000 (with support from the Japanese government).

In addition, other ongoing initiatives complement the baseline situation of the proposed LDCF project. Those include in particular:

? AFD/Expertise France Support for export industries and rural development in the Union of the Comoros (AFIDEV) project (June 2021- Sept 2027). The AFIDEV project aims to improve the competitiveness of the vanilla, ylang-ylang and clove export sectors and to support rural development. AFIDEV supports in particular the capacities of the Comorian office for export products (OCPR), which will contribute to the proposed LDCF expected results (component 2) regarding traceability, certification and marketing of the concerned products.

? UNDP/GEF Biodiversity protection through the Effective Management of the National Network of Protected Areas (2022-2027) which aims to conserve terrestrial and marine biodiversity by strengthening management of the Union of Comoros newly created Protected Areas Network through effective co-management with communities for sustainable development. Strong interactions with this project will be organized, in particular under Component 1 of the proposed LDCF (specific work on spatial planning in the 8 CRDEs)

? An upcoming new AFD project is also in the pipeline to work on island-level spatial planning (Support to the sustainable management of resources and territory of the Comoros (AGDRT) project), based on previous work done in Moheli under the Adapt?action facility. Specific support of the LDCF project on spatial planning within CRDEs will be linked to this AFD initiative when it starts.

3/ Proposed alternative scenario

Under the alternative scenario, national institutions and actors involved in agriculture development have the capacity to guide, plan, supervise, and adopt practices that are resilient to the impacts of climate change. Eight agricultural land use plans to the areas supported by the target CRDEs and climate-adapted agricultural calendars updated annually are available to guide the choices of farmers. Through intersectoral institutional partnerships, enhanced support is provided to all value chain actors and farmers in adapting their agricultural activities to climate change. The Comorian commercial supply of agricultural products is based on an expanded range of profitable value chains integrating sustainable and climate-smart agroecological practices that are competitive in local, national and international markets and which feasibility has been demonstrated. Farmers apply climate-smart agroecological practices and approaches in their plots and value chain actors use climate-adapted infrastructure. Their vulnerability to the effects of climate change is reduced through their understanding and adoption of risk management strategies and enhanced adaptability through increased local supply of agricultural inputs such as seeds for adapted varieties, and small equipment and tools. Traceability and certification processes are tested provide additional incentives for the adoption of climate-smart and sustainable practices, thus giving access to added value related to specific markets. The dissemination of new knowledge on best practices and innovations for climate adaptation developed through the project interventions supports their replication within and outside target sites, across CRDEs in the country. Women and people with disabilities have equal access to information and benefits resulting from the support provided by the project, both in terms of awareness-raising, training, access to adapted tools, and support for adopting climate resilient practices.

Therefore, the project objective is to increase the climate resilience of key agricultural value chains through innovation, diversification and strengthened capacities to sustainably improve the livelihoods of smallholders and contribute to the national economy.

In order to achieve the above, the following project components and outcomes are proposed:

- ? Component 1: Systemic, institutional and individual capacities for climate-resilient agriculture
 - *Outcome 1. Enhanced capacity of national institutions and value chain actors involved in agriculture development to guide, plan, supervise and implement climate-resilient practices*
- ? Component 2: Diversification of climate-resilient value chains
 - *Outcome 2. Increased resilience of agricultural actors through the identification and promotion of new climate-resilient value chain options with good prospects for profitability, increased access to national and international market information and equitable benefit sharing*
- ? Component 3: Implementation of climate-resilient practices in targeted intervention areas

•*Outcome 3. Increased adoption of climate-resilient practices and crops/varieties by smallholder farmers and value chain actors facilitated by support systems and adequate provision of inputs and resources*

? Component 4: Knowledge Management, and Gender and PWDs? inclusiveness

•*Outcome 4. Improved development, management, and dissemination of knowledge related to gender-sensitive adaptation of the agricultural sector to climate change to support the replication of climate resilient solutions among CRDEs, and at national and regional scale*

Theory of Change (ToC)

The project's Theory of Change (ToC) was developed from the above analyses and is shown in Figure 1. It illustrates the logical path from the problem statement, through the identified barriers to effective climate change adaptation, to the intended project results to overcome those barriers (outputs leading to the 4 outcomes to achieve the project goal), including a set of assumptions for project success. It also illustrates the medium-term outcomes and long term impacts the project intends to achieve.

Assumptions:

A1 - National Institutions, INRAPE and CRDE are actively collaborating to increase their capacity by integrating new personnel, equipment and competencies into their respective structures

A2 - DNSAE, INRAPE, and CRDEs build strong collaboration channels to achieve efficient project implementation

A3 - Value chain actors (farmers and their cooperatives, private sector, NGOs, exporters and institutions) show willingness to develop selected climate resilient value chains through adapted production, processing, marketing and export of products

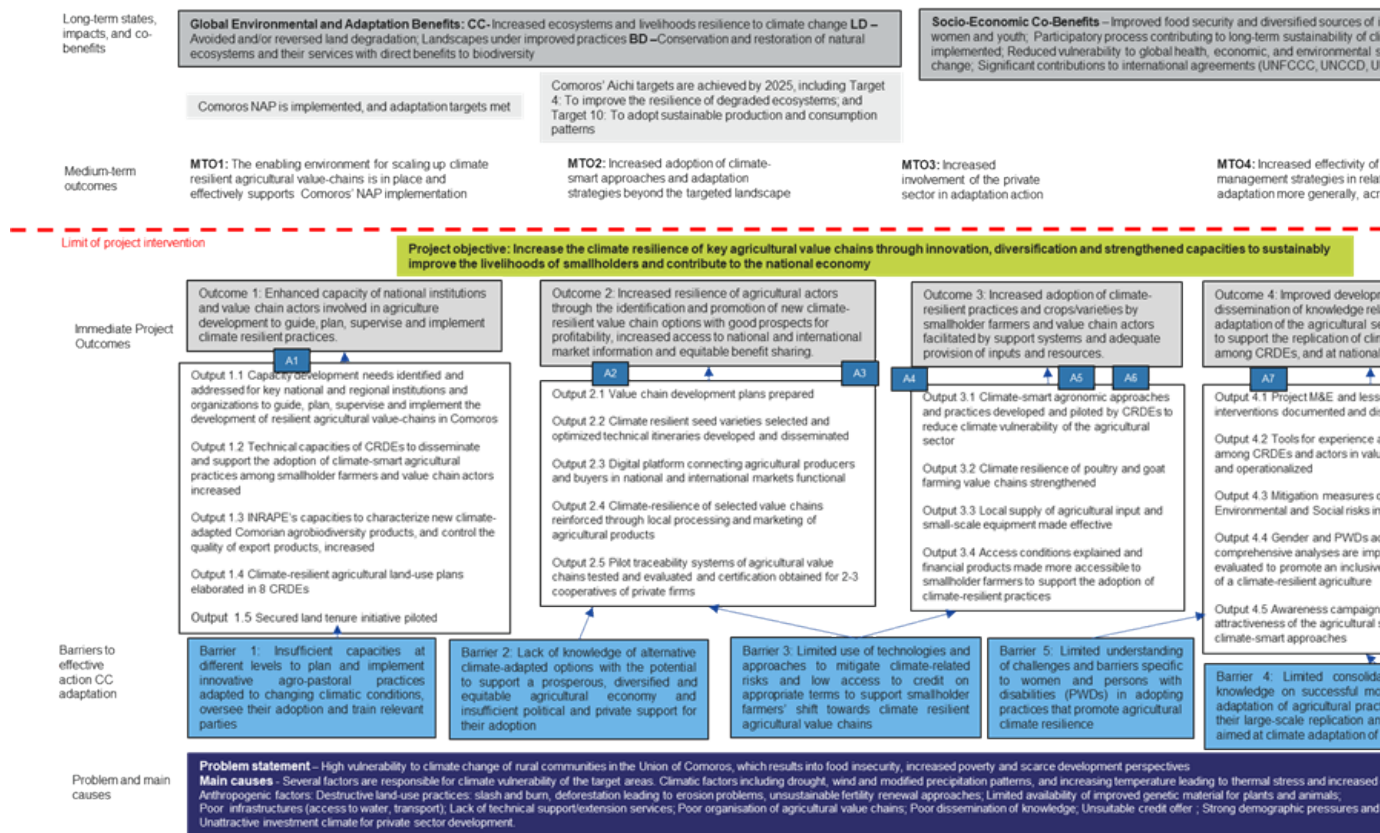
A4 - Women and youth are able and willing to participate in new business initiatives

A5 - Farmers, with support from CRDEs, show interest in adopting climate-smart production practices to reduce climate vulnerability

A6 - Local suppliers of agricultural inputs and tools, as well as financial institutions, use project support to expand their business or collaboration with farmers and contribute to the climate resilience of agricultural value chains

A7- All stakeholders involved in the project actively contribute to social and environmental safeguards and gender action plan implementation

Figure 1. Project Theory of Change (ToC)



Expected results

The project will be executed in the territory of 8 CRDEs. CRDEs (Centre ruraux de développement économique / Economic Development Rural Centres) have been established by law to cover the entire country's territory. The word 'CRDE' can therefore refer to the territory managed or to the CRDE administrative structure (office and team).

Interventions will target the local communities served by 4 CRDEs which have been supported under the UNDP-GEF-LDCF CRCCA project (GEF ID 4974) (Ngazidja: Hamalengo-Diboini and Sidjou; Ndzواني: Pomoni; Mwali: Mibani) to build on the results of the CRCCA project and continue strengthening these CRDEs. The project will also target local communities served by 4 additional CRDEs (Ndzواني: Bambao Mtsanga and Bandramaji, Mwali: MI'dj?!?, and Ngazidja: Cembenoi). The CRDEs of Bambao Mtsanga, Cembenoi, MI'dj?!? and Bandramaji have received significant support for the construction of an irrigation network including water storage. The inclusion of these communities will enable building synergies with interventions that develop such critical infrastructure for agriculture (GCF-UNDP project on water and FIDA's PREFER project).

Description of the project components

Component 1: Systemic, institutional and individual capacities for climate-resilient agriculture

Outcome 1. Enhanced capacity of national institutions and value chain actors involved in agriculture development to guide, plan, supervise and implement climate-resilient practices

The strategy for achieving outcome 1 is based on 3 outputs related to capacity development of (i) key national and regional institutions responsible for planning, supervising and implementing the development of resilient agricultural value-chains in Comoros; (ii) CRDEs, which must play a key extension role in disseminating and supporting the adoption of climate-smart agricultural practices among smallholder farmers and value chain actors through a farmer field school approach; (iii) INRAPE, as the main research and quality control vehicle, linking science base experimentation with field work and production through CRDEs and farmers. This is completed with a fourth output aiming to complete participatory land-use planning processes in each of the 8 CRDEs to ensure an efficient and widely accepted organization of land-uses over the territory of each CRDE, taking due consideration of different population needs, conservation requirements and efficiency of the infrastructure.

The implementation of activities under component 1 will be facilitated by the parallel development of a Strategic Environmental and Social Assessment (SESA), as safeguards measure, with the aim to identify the main strengths and weaknesses of the governance and institutional mechanisms related to the agricultural sector. The SESA will facilitate the identification of gaps and weaknesses in terms of communication, participation and decision-making processes and the related mitigation measures that will ensure all the involved stakeholders can be part of the implementation of the project. The SESA will also identify the main strengths of the institutional framework ? such as institutional actors with strong capacities of working with local communities and CRDEs - to ensure the sustainability of the project. The SESA will give indications and guidance on the identification of any partners involved in the project implementation, including private sector entities. Therefore, the SESA will indicate if any Social and Environmental Commitment Plan will be needed for ensuring the compliance of private sector entities approach with UNDP SES. The SESA will address the first barrier, identified in this document.

Without the project interventions under Component 1, the lack of capacities in terms of knowledge, equipment and technical resources will continue to strongly limit initiatives to support adaptation to climate change of agricultural value chains. In addition, without proper spatial planning, and organized extension services, rural communities will remain without a clear and support development path, vulnerable to climate change.

Several initiatives will contribute to the success of this outcome through cofinancing of capacity building efforts: in addition to the in-kind contribution of the Ministry of agriculture (MAPETA, estimated cofinancing amount for Component 1: \$726,000), the World Bank Integrated Development and Competitiveness Project (PIDC, estimated cofinancing amount for Component 1: \$2,000,000), the AfDB Project to Support Integrated Food Systems and Value Chains (PASAICV, estimated cofinancing amount for Component 1: \$1,500,000) and INRAPE lab development project (estimated cofinancing amount for Component 1: \$500,000) will contribute to component 1 results achievements.

Expected outputs:

- *Output 1.1 Capacity development needs identified and addressed for key national and regional institutions and organisations to guide, plan, supervise and implement the development of resilient agricultural value-chains in Comoros*
- *Output 1.2 Technical capacities of CRDEs to disseminate and support the adoption of climate-smart agricultural practices among smallholder farmers and value chain actors increased*
- *Output 1.3. INRAPE's capacities to characterize new climate-adapted Comorian agrobiodiversity products, and control the quality of export products, increased*
- *Output 1.4 Climate-resilient agricultural land-use plans elaborated in 8 CRDEs*
- *Output 1.5 Secured land tenure initiative piloted*

Component 2: Diversification of climate-resilient value chains

Outcome 2. Increased resilience of agricultural actors through the identification and promotion of new climate-resilient value chain options with good prospects for profitability, increased access to national and international market information and equitable benefit sharing

To achieve Outcome 2, the project will support interventions to identify new value chain options which are climate-resilient and profitable on national and/or international markets, in the context of the establishment of the African Continental Free Trade Area (AfCFTA). This will entail (i) the preparation of detailed value-chain development plans for new, climate-resilient and high-potential agricultural value chains, (ii) research and technical work on seeding material to improve climate-resilience of agricultural crops, (iii) specific work to better connect agricultural producers and buyers and improve transparency of pricing practices, to the benefit of small-holder farmers, (iv) targeted support to local processing and marketing of agricultural products, increasing farming products value on markets and replacing imports where relevant, and (v) testing pilot traceability systems of agricultural value chains and working on certification schemes to reinforce the marketing value of Comorian products in the long-term. Overall, work under Component 2 will prepare the ground for Component 3 activities with farmers in order to ensure a large adoption of climate-resilient practices. Without the project interventions under Component 2, crop diversification opportunities and access to value-added markets will remain low, while the necessary adaptation of crop species and varieties to face climate impacts will hardly be supported.

The WB Integrated Development and Competitiveness Project (PIDC, estimated cofinancing amount for Component 2: \$3,000,000), the AfDB Project to Support Integrated Food Systems and Value Chains (PASAICV, estimated cofinancing amount for Component 2: \$2,500,000), IFAD's Family Farm Productivity and Resilience Support Project (PREFER, estimated cofinancing amount for Component 2: \$2,000,000) and INRAPE lab development project (estimated cofinancing amount for Component 2: \$1,500,000) will contribute to component 2 results achievements through their specific work on value-chains development, improvement of communication routes and support to private sector development.

The compliance with UNDP Social and Environmental Standards (SES) of activities implemented under component 2 will be ensured through the following processes:

? A **Gender Analysis and Action Plan** has been developed during PPG and will ensure gender equity in project activities, especially during the phase of the identification and promotion of new climate-resilient value chain options.

? The **Comprehensive Stakeholder Engagement Plan (CSEP)**, including a Stakeholder Engagement Plan section for each island (that will be updated at project inception phase), will ensure the identification, analysis, and engagement of all the stakeholders into the new climate-resilient value chains. The Stakeholder Engagement Plan section for each island will integrate the findings of the **Conflict Analysis and Assessment** that will be developed during the first year of the implementation of the project. This analysis will take into consideration any tensions or conflicts already in place related to the presence in the project areas of individuals or groups coming from different islands and will identify any mitigation measure needed to avoid the exacerbation of the tensions or the creation of new conflicts based on the profits coming from the project activities.

? An **Economic Displacement risk assessment** will be developed during the first year of the implementation of the project, to identify the impacts of changes in the context due to project activities focused on value chains.

? The risk assessment will identify any economic displacement, and strategies will be included to avoid, minimize, or manage any such impacts.

? Where necessary, a **Livelihood Action Plan (LAP)** will be produced to ensure that any such impacts are appropriately managed.

? The compliance with SES will be ensured also by the **Grievance Redress Mechanism (GRM)** that will take into consideration the local grievance mechanisms already in place and will be implemented during the project's implementation and will support the mitigation of the identified social and environmental risks.

Expected outputs:

- *Output 2.1 Value chain development plans prepared with the private sector, cooperatives and other stakeholders*
- *Output 2.2 Climate resilient seed varieties selected and optimized technical itineraries developed and disseminated*
- *Output 2.3 Digital platform connecting agricultural producers and buyers in national and international markets functional*
- *Output 2.4 Climate-resilience of selected value chains reinforced through local processing and marketing of agricultural products*
- *Output 2.5 Pilot traceability systems of agricultural value chains tested and evaluated and certification obtained for 2-3 cooperatives or private firms*

Component 3: Implementation of climate-resilient practices in targeted intervention areas

Outcome 3. Increased adoption of climate-resilient practices and crops/varieties by smallholder farmers and value chain actors facilitated by support systems and adequate provision of inputs and resources

The strategy to achieve this outcome is based on initiating smallholder farmers to the concept of risk management, identifying approaches and practices which effectiveness in reducing climate vulnerability has been demonstrated by CRDEs and supporting their adoption by farmers, supporting the renewal of poultry and goat farming for better resilience and productivity, improving the local supply of agricultural inputs for increased adaptability and facilitating access to microcredit. The increased adoption of climate-resilient practices by farmers, a process started under the CRCCA and other projects, will not only benefit farmers directly but the entire country population as a result of improved environmental practices, reduced deforestation and better preserved water-sources and streams. CRDEs will work hand in hand with the DNSAE Department of Livestock and INRAPE to ensure the adoption of climate-resilient practices among farmers. Without the project intervention under Component 3, few farmers will adopt climate-smart agricultural approaches, and the work conducted in previous projects will not be sufficiently reinforced for widespread changes in the 3 islands.

Co-financing from the AfDB Project to Support Integrated Food Systems and Value Chains (PASAICV, estimated cofinancing amount for Component 3: \$1,000,000), IFAD's Family Farm Productivity and Resilience Support Project (PREFER, estimated cofinancing amount for Component 3: \$1,000,000), GCF-Water project (estimated cofinancing amount for Component 3: \$16,721,194) and INRAPE lab development project (estimated cofinancing amount for Component 2: \$1,500,000) will contribute to component 3 results achievements through support to smallholder farmers in adopting climate-smart agricultural practices and investments into water infrastructure.

The compliance with SES of the activities included in the component 3 has been ensured during PPG, and the project has been designed considering the social and environmental risks related to this component. Considering the findings of stakeholders consultations and of the PPG field visits, the need for a **Waste and Pesticides Management Plan** has been identified. Therefore, the plan will be developed and integrated in the project implementation plan.

Expected outputs:

- *Output 3.1. Climate-smart agronomic approaches and practices developed and piloted by CRDEs to reduce climate vulnerability of the agricultural sector*
- *Output 3.2 Climate resilience of poultry and goat farming value chains strengthened*
- *Output 3.3 Local supply of agricultural inputs and small equipment disseminated*
- *Output 3.4 Access conditions explained and financial products made more accessible to smallholder farmers to support the adoption of climate-resilient practices*

Component 4: Knowledge Management, and Gender and PWDs? inclusiveness

Outcome 4. Improved development, management, and dissemination of knowledge related to gender-sensitive adaptation of the agricultural sector to climate change to support the replication of climate resilient solutions among CRDEs, and at national and regional scale

Component 4 will enable mainstreaming transversal issues of knowledge management and gender and PWDs inclusiveness into other project components and outputs focusing on knowledge and on gender. Knowledge management is critical not only for the achievement of the project's objective, but for the

sustainability of achieved results and replicability of climate-resilient solutions. Documenting, analyzing and addressing gender and PWD issues as cross-cutting elements will allow to develop inclusive solutions to the climate adaptation challenge in agriculture. It will ensure that men, women and PWDs benefit equally from the project support and that the concerns and experiences of women and of PWDs are an integral part of the implementation and monitoring and evaluation of the project. Lessons and successful experiences will be captured through the participatory monitoring and evaluation as part of the project annual planning process, through the participatory development of agroclimatic knowledge involving actively farmers, CRDEs, and researchers in a co-learning process, and recording and disseminating successful experiences among CRDEs, and with other relevant stakeholders in the country and in the region. Component 4 is key to the widespread and equitable dissemination of knowledge across the country and beyond.

Expected outputs:

- *Output 4.1. Lessons learned from project interventions documented and disseminated*
- *Output 4.2. Agro-climatic knowledge for climate adaptation developed through strengthened monitoring and research-action involving farmers*
- *Output 4.3. Tools for experience and knowledge-sharing among CRDEs and actors in value chains developed and operationalized*
- *Output 4.4 Gender and PWDs action plans based on comprehensive analyses implemented, monitored, and evaluated to promote an inclusive approach to the adoption of a climate-resilient agriculture and mitigation measures of the identified Environmental and Social risks monitored*
- *Output 4.5 Awareness campaign conducted to enhance the attractiveness of the agricultural sector and promote climate-smart approaches*
- ? *Output 4.6 Project exit strategy prepared and validated*

4/ Alignment with the GEF focal area

The project is aligned to the GEF-7 Adaptation Strategy that is to strengthen resilience and reduce vulnerability to the adverse impacts of climate change in least developed countries and support their efforts to enhance adaptive capacity. The project was formulated in compliance with LDCF guidelines and is aligned with the GEF7 Results Framework for climate change adaptation. More specifically, the project is in line with Objective 1: Reduce vulnerability and increase resilience through innovation and technology transfer for climate change adaptation / Outcome 1.1 Technologies and innovative solutions piloted or deployed to reduce climate-related risks and/or enhance resilience and Objective 2: Mainstream climate change adaptation and resilience for systemic impact / Outcome 2.3 Institutional and human capacities strengthened to identify and implement adaptation measures.

5/ Incremental/additional cost reasoning and expected contributions from the baseline, the GEFTF,

LDCF, SCCF, and co-financing;

Under the baseline scenario, all actors involved in the agricultural sector will still lack the individual and institutional capacities, including the knowledge and tools required, to adapt agricultural practices to changing climatic conditions. Agricultural production will rest on the same narrow base of climate

vulnerable cash crops, food crops and market gardening, aggravating the country's dependence on food imports.

Under the alternative scenario, national institutions and actors involved in agriculture development have the capacity to guide, plan, supervise, and adopt practices that are resilient to the impacts of climate change. Eight agricultural land use plans to the areas supported by the target CRDEs and climate-adapted agricultural calendars updated annually are available to guide the choices of farmers. Through intersectoral institutional partnerships, enhanced support is provided to all value chain actors and farmers in adapting their agricultural activities to climate change. The Comorian commercial supply of agricultural products is based on an expanded range of profitable value chains integrating sustainable and climate-smart agroecological practices that are competitive in local, national and international markets and which feasibility has been demonstrated. Farmers apply climate-smart agroecological practices and approaches in their plots and value chain actors use climate-adapted infrastructure. Their vulnerability to the effects of climate change is reduced through their understanding and adoption of risk management strategies and enhanced adaptability through increased local supply of agricultural inputs such as seeds for adapted varieties, and small equipment and tools. Traceability and certification processes are tested provide additional incentives for the adoption of climate-smart and sustainable practices, thus giving access to added value related to specific markets. The dissemination of new knowledge on best practices and innovations for climate adaptation developed through the project interventions supports their replication within and outside target sites, across CRDEs in the country. Women and people with disabilities have equal access to information and benefits resulting from the support provided by the project, both in terms of awareness-raising, training, access to adapted tools, and support for adopting climate resilient practices.

The baseline projects identified will contribute to the 4 components of the proposed LDCF project as described in *Section 1a-2 Baseline scenario*. In particular, interventions under Component 2 of the AfDB Project to Support Integrated Food Systems and Value Chains (PASAICV) relating to the integrated development of agriculture and livestock will contribute to the proposed LDCF project Outcomes 1, 2 and 3. The proposed LDCF project will in particular support INRAPE further to enhance the research center's capacity to produce improved seeds for potatoes, maize and other crops.

Similarly, the IFAD's Family Farm Productivity and Resilience Support Project (PREFER)(2017-2025), which is mainly focused on improving agricultural productivity, will contribute to the LDCF project Outcome 3, and expand the geographical scope of the intervention to other CRDEs (e.g. by integrating value-chain development plans established under the LDCF project). During implementation, the LDCF-project will ensure that climate-smart approaches are central to the interventions of PREFER on the ground, and that farmers in CRDEs where PREFER operate have the opportunity to get involved in the supported climate-resilient value-chains. This will be ensured through regular exchanges between project implantation teams, and planned monitoring activities of cofinancing projects.

6/ Global adaptation benefits (LDCF);

Global adaptation benefits from the proposed LDCF project include:

? **A total of 14,440 people trained** for climate-resilient value-chain development. This includes 13,500 farmers from the CRDEs (6,864 men and 6,636 women) directly supported by the reinforced CRDE teams to implement climate-smart agriculture practices, adopt new crops or varieties, and contribute to reinforced value-chains (production, processing, traceability). It also includes training to members of MSEs, cooperatives and NGOs processing and marketing of agricultural products, and training related to the traceability system piloted. Finally, training will target the main executing partner institutions, namely DNSAE, , Regional Directorates for Agriculture, Regional Chambers of Agriculture, National Office of Cash Products and INRAPE, as well as staff within CRDEs.

? **8 agricultural land-use plans will be elaborated in the 8 CRDEs targeted by the project**, taking into account projections of climate change and its impacts, as well as the potentials and vulnerabilities of current and new crops. Those plans will be crucial to the sustainable development and climate resilience of CRDE territories, improving agricultural production efficiency while preserving resources and ecosystem services.

? A total of **7254 ha of land will benefit from improved management for climate resilience**. This will be achieved through the establishment of agricultural land-use plans, the dissemination of climate-smart agricultural practices, the distribution of climate-resilient seed material (crops, trees, animals) and small equipment and infrastructure (e.g. for irrigation)

? All together, it is estimated that **108,000 people (50% women) will be direct beneficiaries** of the project, a vast majority of them being members of the communities living in the 8 target CRDEs.

7/ Innovativeness, sustainability and potential for scaling up

Thousands of smallholder farmers in Comoros need access to climate-smart agricultural practices to adapt to changing climatic conditions. To achieve this, scaling up mechanisms and approaches will be critically important. The project will include all the elements necessary for scaling-up its outputs and outcomes, first among the smallholder farmers supported by the target CRDEs, then across the areas supported by all CRDEs in the country, and finally in other countries in the region sharing similar challenges. Innovativeness is part of the objective of the project and will reside in the new climate-smart approaches proposed to farmers, based on research and development activities conducted under the leadership of INRAPE as a central research center in Comoros for identifying, testing and disseminating new genetic material and adapted technical itineraries, supporting traceability and ensuring sanitary controls of imported and export products. INRAPE will be working hand-in-hand with CRDEs for the development phase of its research and dissemination among farmers.

Sustainability and replication elements include i) developing a common vision through agricultural land use plans based on sound knowledge regarding the most sustainable, profitable and climate-resilient agricultural production options, shared and disseminated among stakeholders at all levels (output 1.4), including farmers who will implement the land-use plans at the local level, CRDEs who will provide extension services including training, demonstration and inputs, INRAPE who will implement the necessary applied research and actively coordinate the dissemination of climate resilient

plant and animal genetic material, and national institutions such as DNSAE and its 3 regional directorates for agriculture, Chambers of agriculture and UCCIA, who will contribute to monitoring and knowledge development, ii) involving all actors in decision-making, planning, monitoring, evaluating and learning, iii) building capacities at all levels to ensure effective access to information, participation and implementation of recommended solutions by all stakeholders, including women, youth, PWDs and elders, iv) strengthening capacities of the CRDEs as extension centers to demonstrate new approaches, crops and technologies and to provide support and supervision to farmers, and involving relay-farmers to enhance knowledge transmission to a large number of smallholder farmers, which approach could be replicated across all country's CRDEs, v) establishing reference CRDEs in each island with the capacity to provide technical and entrepreneurial leadership through all CRDEs, vi) developing incentives linking certification of products to climate-smart agricultural practices in a manner that is scalable and commercially viable, and vii) implementing an awareness raising campaign to ensure the large dissemination of project successes and initiatives, and encourage young men and women to invest effort into climate-smart agriculture as a decent and sustainable livelihood.

[1] World Bank, 2019. Towards a More United and Prosperous Union of Comoros : Systematic Country Diagnostic

[2] MAPETA 2021. id.

[3] MAPETA 2021. Contribution d?termin?e au niveau national (CDN actualis?e). Rapport de synth?se. 2021-2030.

[4] Baastel/Kinom?, 2023. *Study of climate risk and adaptation options in the agricultural sector in Comoros*. PPG technical report.

[5] Based on data provided in the Third Communication on Climate Change, June 2021.

[6] World Bank, 2018.

[7] Ibid.

[8] <https://www.macrotrends.net/countries/COM/comoros/literacy-rate#:~:text=Adult%20literacy%20rate%20is%20the,a%203.17%25%20increase%20from%202018.>

[9] The use of pesticides is limited in Comoros due to their unavailability and high cost.

[10] PREFER project, quoted on March 13, 2022 in the Gazette des Comores.

[11] UNDP 2021, Country Programme Document

1b. Project Map and Coordinates

Please provide geo-referenced information and map where the project interventions will take place.

Georeferences of each CRDE:

Island	CRDE	Coordinates	
		Longitude	Latitude
Mwali	Mi?dj?l?	43.46555?	-12.17354?
	Mibani	43.77640?	-12.33909?
Ndzواني	Pomoni	44.40513?	-12.28013?
	Bandramaji	44.51462?	-12.35919?
	Bambao Mtsanga	44.51370?	-12.19574?
Ngazidja	Hamalengo-Diboini	43.27671?	-11.44729?
	Sidjou	43.41379?	-11.68060?
	Cembenoi	43.25771?	-11.68185?

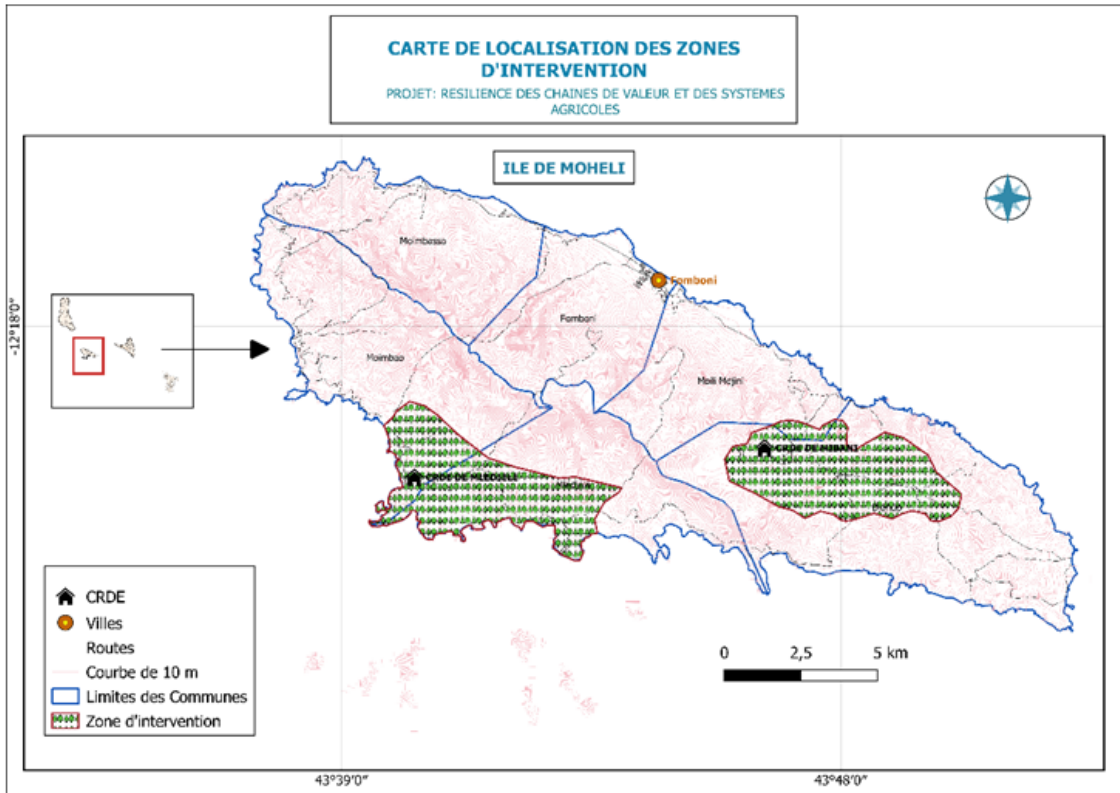


Figure 2. Location map of project intervention areas on Mwali Island

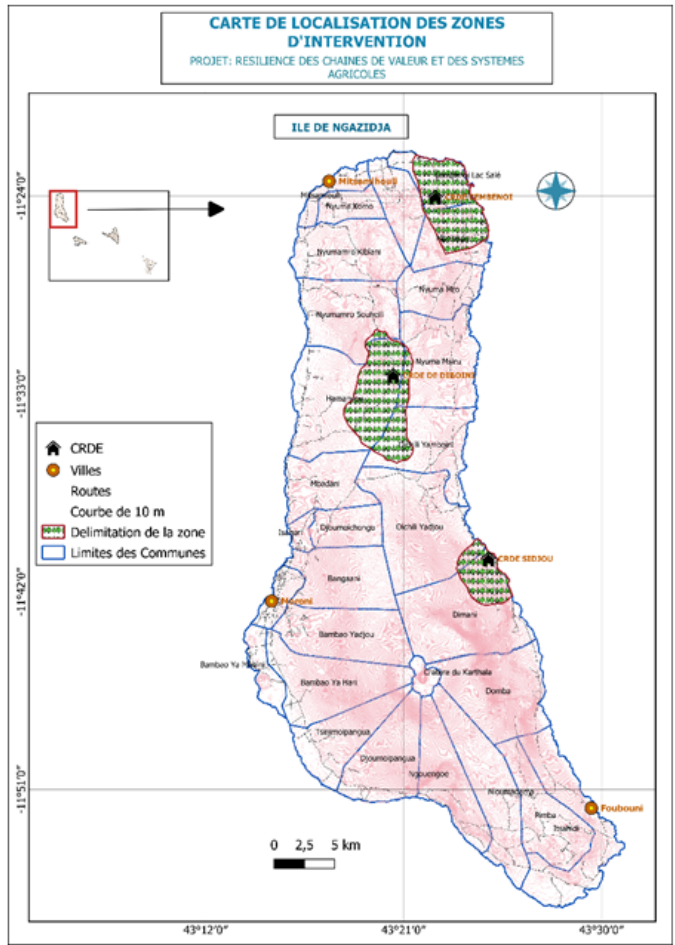


Figure 3. Location map of project intervention areas on Ngazidja Island

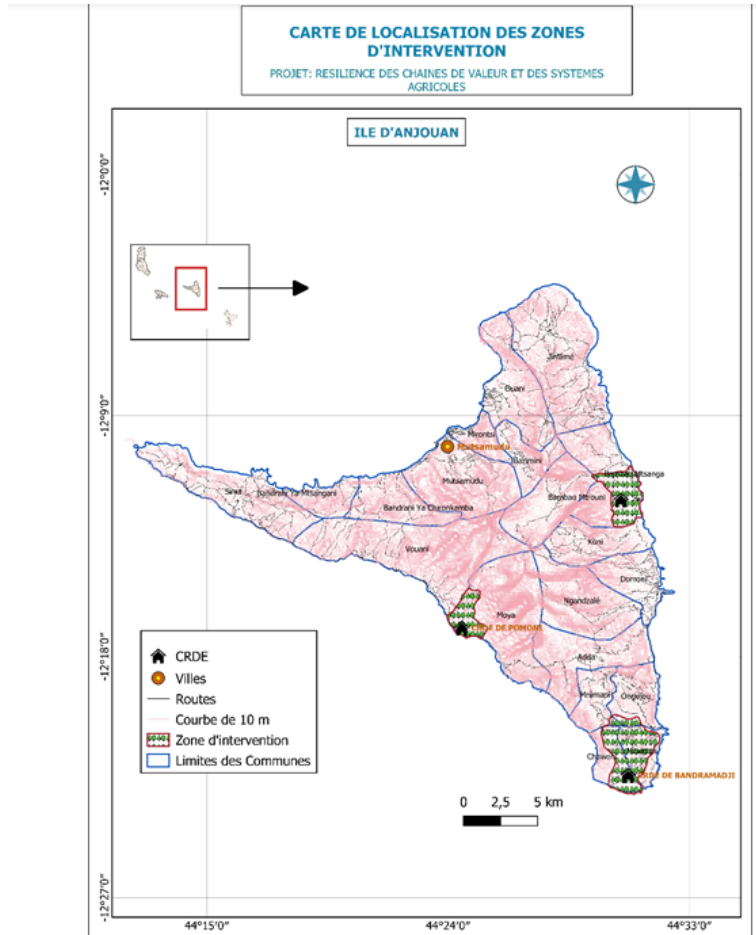


Figure 4. Location map of project intervention areas on Ndzuani Island

1c. Child Project?

If this is a child project under a program, describe how the components contribute to the overall program impact.

2. Stakeholders

Select the stakeholders that have participated in consultations during the project identification phase:

Civil Society Organizations Yes

Indigenous Peoples and Local Communities Yes

Private Sector Entities Yes

If none of the above, please explain why:

The Stakeholder Engagement Plan plan recognizes the importance of effective participation for the different stakeholders as a way to improve the transparency, accountability, integrity, effectiveness and

sustainability of the project. In addition, such participation will, on the one hand, promote national, regional and local interests to forge stronger relationships, particularly with civil society, local communities and the private sector; on the other hand, respect for human rights, gender equality, diversity and environmental sustainability is ensured during project implementation activities.

The stakeholder consultation processes began during the project's PPG phase. Likewise, in order to successfully achieve the proposed objectives, these processes will continue to be sustained throughout the project cycle. The project design included participation mechanisms such as: interviews, forum meetings, focus group meetings, workshops, site visits, exchanges of experiences, community networks, consultations with experts, Trainings and capacity building activities planned as project activities. Participation and consultation with relevant groups such as women, youths, the elderly, and other marginalized groups will be taken into account throughout the project's implementation. These stakeholders will participate in project inception workshops, in annual progress meetings, and in the project closure workshop. Participatory methodologies will be used, to collect all the opinions and feedback.

The project will work with key national and regional State actors. At the local level, the most relevant stakeholders are the following (as detailed in the CSEP (Comprehensive Stakeholder Engagement Plan)):

- ? DNSAE
- ? CRDEs
- ? UNDP
- ? INRAPE
- ? Regional agriculture directorates
- ? Chamber of agriculture
- ? Farmers
- ? Youth
- ? Women (individuals)
- ? CSOs and NGOs
- ? Women's organization/cooperatives/informal groups
- ? PWDs
- ? Financial institutions (e.g. SANDUKs)
- ? Other ongoing projects and programs

- ? International partners (WB, AFD, FAO, IFAD, etc.)
- ? Universities, research organizations and the private sector

The following main strategic actions to ensure stakeholder engagement throughout the project duration are proposed:

- ? The project will have different professionals within its management unit to coordinate the project, with whom the full and effective participation of stakeholders will be promoted. A Safeguards and Gender specialist will be hired to establish intercommunication mechanisms for project stakeholders and to ensure the successful implementation of the project. This specialist will ensure the involvement of different stakeholders, especially vulnerable groups (women, youth, elderly), to support the local consultation and participation activities of each of the project components, ensure their participation in the project life cycle and communicate the results of this work.
- ? Local facilitators, in particular the personnel of the CRDEs, will work closely with communities, ensuring strong relationship with the actors of the territory, and stimulating the implementation of project activities under each of its components.
- ? The project will have several spaces for participation, such as: workshops, trainings and community and institutional meetings, exchange visits between CRDEs, among others.
- ? Different information and consultation meetings will be organized at island level and at national level, paying attention to the diversity of stakeholders.
- ? The national and local authorities will play a central role during the project, directly contributing to the project success.
- ? Community-based organizations (CSOs) and NGOs that have roots and projects in the intervention areas will also play a central role in the implementation of the project. To this end, different ways of articulating agreements, alliances, grants will be analyzed to work together and take advantage of the presence, knowledge, capacities and specific local practices, as well as the network of actors within each area targeted by the project.
- ? There are several microfinance institutions supporting development projects. The involvement of these microfinance institutions will be strategic for achieving the project's outcomes and objectives.
- ? There are several national NGOs, associations and cooperatives, with a strategic role for project implementation, given their knowledge of local communities. These associations will be strongly involved throughout the project, for the implementation of activities, monitoring and evaluation.

Resources for engaging stakeholders have been budgeted in each relevant activities, which will ensure that finance does not come as a limiting factor. The project has a strong knowledge management component (Component 4) which includes specific outputs and activities relating the dissemination of information to all types of stakeholders at all stages of the project.

The participation and the engagement in the decision-making processes of women, youths, PWDs or any marginalized groups will be ensured especially through the Gender and PWDs Action Plan.

Please provide the Stakeholder Engagement Plan or equivalent assessment.

Please find attached the Stakeholder Engagement Plan (Annex 8 to the ProDoc)

In addition, provide a summary on how stakeholders will be consulted in project execution, the means and timing of engagement, how information will be disseminated, and an explanation of any resource requirements throughout the project/program cycle to ensure proper and meaningful stakeholder engagement

Please refer to the Stakeholder Engagement Plan for full information.

Select what role civil society will play in the project:

Consulted only;

Member of Advisory Body; Contractor;

Co-financier;

Member of project steering committee or equivalent decision-making body; Yes

Executor or co-executor; Yes

Other (Please explain)

3. Gender Equality and Women's Empowerment

Provide the gender analysis or equivalent socio-economic assesment.

According to the UNDP Gender Marker Rating, the project is categorized as GEN2: gender equality as a significant objective. During the PPG, a gender analysis a detailed Gender Action Plan (included as Annex 10) were developed to ensure gender mainstreaming in the project; specific gender-disaggregated indicators will be used for monitoring and a Safeguards and Gender specialist will be part of the Project Management Unit (PMU) to facilitate improvements to gender equality and women's empowerment.

The Gender Analysis and Action Plan has been developed with secondary data and primary data collected through women and stakeholders consultations done in the field (in the three islands) by the PPG team supported by UNDP, DNSAE and CRDE staff.

The main highlights of the **gender analysis** are related to the following topics:

? A preliminary identification of the **division of tasks** between men and women shows that specific work is reserved for them according to the arduous nature of the work. For example, plowing and all work using tools is done by men while sowing, watering, plant maintenance and marketing are done by women.

? **Decisions on land use and livestock management** are made equitably by men and women in households. The man manages the income from the sale of livestock while the woman is responsible for the marketing of market garden products and milk and manages the related income.

? Overall, the **income at household level is managed by men**, especially in terms of decision making process. In Ndzuani, some women work independently from men in market gardening, doing all the work including plowing.

? The advent of **mechanization**, enables women to free themselves from the contribution of men.

? Women seem to have more **access to microcredits**.

? The Union of Comoros social structure is defined as **matrilinear**, although the practices regarding use of land and access to resources are not supporting women roles.

? **Access to land** in the Union of Comoros falls under civil, customary, and religious rights. The coexistence of these three sources of law creates further ambiguity, sometimes to the detriment of women, clearly illustrated by questions of inheritance. Traditionally, the will was a decision of the owner transmitted orally to the beneficiaries and enforceable against third parties. However, in the absence of a written will, men increasingly assert Muslim law, the distribution of which benefits men who benefit from a greater share of the inheritance, contrary to customary law.

? Practices are **different in rural and urban areas**. In rural areas, customary laws still prevail, and the mother's property is transferred to her daughters upon her death.

? The superimposition of the three rights creates the possibility **to adapt the law to each situation**.

? Women inherit the land, for construction of houses. In practice, although **women are owners of lands, men are the ones who are managing the land for livelihood** activities and are the ones who take decisions about incomes at households? level.

Following the gender analysis, the main actions identified in the action plan aim to:

- ? **Empowering** women/girls and youth.
- ? Ensure **equitable representation** of women and men in project activities and vulnerable groups.
- ? Ensure the **active participation** of women in project activities.
- ? Ensure **capacity building** of women/girls and youth in climate resilient agricultural sector.
- ? Ensure women's participation in CRDE's decision making processes.

- ? Ensure participation in project activities of **women groups, women cooperatives and individuals.**
- ? Facilitate women **economic empowerment.**
- ? Facilitate the **reduction of the burden of women's domestic and productive tasks**, which may eventually increase their free time that may be allocated to other activities.
- ? Involve women in **awareness raising on climate change impacts and mitigation measures**, considering they can have a strong role as influencers in the communities, considering they are the ones very often involved in practices that have impacts on the environment, such as chopping wood and producing charcoal.
- ? Strengthen the role of women in **facilitating the inclusion of vulnerable groups**, such as the youth and PWDs, in the project's activities and in the stakeholders consultation and engagement processes.

During project implementation, the Gender Analysis will be updated, and a Gender Action Plan will be developed for each value chain targeted by the project, using the Mind your step! Tool focusing on mainstreaming gender in the value chains. The project includes gender-responsive measures to address gender gaps and promote gender equality and women's empowerment.

The project's results framework includes gender-responsive indicators in terms of benefits from the projects. Indicators included in the Gender Action Plan have been developed based on GEF guidelines .

Does the project expect to include any gender-responsive measures to address gender gaps or promote gender equality and women empowerment?

Yes

Closing gender gaps in access to and control over natural resources; Yes

Improving women's participation and decision making Yes

Generating socio-economic benefits or services or women Yes

Does the project's results framework or logical framework include gender-sensitive indicators?

Yes

4. Private sector engagement

Elaborate on the private sector's engagement in the project, if any.

Private sector is a direct beneficiary of the project interventions. Private sector will be directly involved into component 2 ? Output 2.1 for the preparation of value-chain development plans; - Output 2.3 Digital platform connecting agricultural producers and buyers; - Output 2.4 where private sector

(including cooperatives and possibly NGOs) will directly benefit from project support through training, small equipment and other necessary activities to bring them to the next step of their development along the value-chain development plans prepared; and ? Output 2.5 Pilot traceability systems.

MSEs manufacturing and/or selling agricultural equipment and supplies will also be supported in their development through Outcome 3 - Output 3.3 Local supply of agricultural inputs and small equipment disseminated.

Communication and outreach activities planned under Outcome 4 will also involve private sector to some relevant extent.

5. Risks to Achieving Project Objectives

Elaborate on indicated risks, including climate change, potential social and environmental risks that might prevent the project objectives from being achieved, and, if possible, the proposed measures that address these risks at the time of project implementation.(table format acceptable):

As per standard UNDP requirements, the Project Manager will monitor risks quarterly and report on the status of risks to the UNDP Country Office. The UNDP Country Office will record progress in the UNDP ATLAS risk log. Risks will be reported as critical when the impact and probability are high (i.e., when impact is rated as 5, and when impact is rated as 4 and probability is rated at 3 or higher). Management responses to critical risks will also be reported to the GEF in the annual PIR.

The below Risk Register includes some risks identified during the PIF and the PPG phases:

UNDP ERM - Risk Matrix					
Impact	5				
	4				
	3				
	2				
	1				
		1	2	3	4
Likelihood					
<div style="display: flex; justify-content: space-between; width: 100%;"> HIGH SUBSTANTIAL MODERATE LOW </div>					

#	Description	Risk Category	Impact & Probability	Risk Treatment / Management Measures	Risk Owner
	<p>Enter a brief description of the risk. Risk description should include future event and cause.</p> <p>Risks identified through HACT, PCAT, SES, Private Sector Due Diligence, and other assessments should be included.</p>	<p>Social and Environmental Financial Operational Organizational Political Regulatory Strategic Other</p> <p>Subcategories for each risk type should be consulted to understand each risk type (see UNDP Enterprise Risk Management Policy)</p>	<p>Describe the potential effect on the project if the future event were to occur.</p> <p>Enter likelihood based on 1-5 scale (1 = Not likely; 5 = Expected)</p> <p>Enter impact based on 1-5 scale (1 = Negligible 5 = Extreme)</p> <p><i>Based on Likelihood and Impact, use the Risk Matrix to identify the Risk Level (high, Substantial, Moderate or Low)</i></p>	<p>What actions have been taken/will be taken to manage this risk.</p>	<p>The person or entity with the responsibility to manage the risk.</p>

1	<p>Due to its geographical location, fragile soils and volcanic activity (for Ngazidja), Comoros is prone to cyclones, heavy rains, landslides, long periods of drought, habitat disturbances, and floods. Climate variability and extreme events may lead to disruption of project implementation and destruction of agroecosystems and resources, including benefits accrued from the project</p>	Environmental	<p>Moderate</p> <p>L = 3 I = 3</p>	<p>Risk of climate-related disasters is moderate as those events are usually limited to specific areas and not affecting the entire country at once. The risk is mitigated given that project sites are located in different islands and not close to each other.</p> <p>In addition, this risk will be mitigated by reducing the vulnerability of agroecosystems to climate change and increase resilience to the effects of climate change through the various investments and activities planned. The project will promote a risk management strategy based on crop diversification and adoption of climate-smart agricultural practices.</p>	CRDEs
2	<p>DNSAE does not have the real capacity to implement the project through the NIM modality</p>	Operational	<p>Substantial</p> <p>L =4 I = 4</p>	<p>Specific support to the implantation of the HACT recommendations is planned during the project and UNDP project assurance role will be specifically reinforced for this project which is the first in Comoros using the NIM modality.</p>	DNSAE; UNDP

3	<p>Insufficient institutional capacity to support the development of climate-resilient agricultural value chains and the conversion of current practices to climate-smart ones.</p>	Operational	<p>Substantial</p> <p>L =4 I = 4</p>	<p>DNSAE, INRAPE and CRDEs are key players of the actual support of climate resilient agricultural value-chains and have already gained experience during the previous CRCCA project. Component 1 of this project will specifically aim to fill capacity gaps of those 3 players, through specific training and coaching along the project duration by external experts, as well as through investments in equipment and re-staffing.</p>	DNSAE, INRAPE and CRDEs
4	<p>Falling international market prices for products developed through the value chains (e.g. relating to free-trade agreements) could reduce the benefits to the local farmers involved.</p>	<u>Economic</u>	<p>Substantial</p> <p>L =3 I = 4</p>	<p>Under component 2, the project will conduct an in-depth analysis of most relevant value-chains in Comoros, based on their resilience to climate change, their contribution to food security, and the potential markets. In the latter dimension, specific attention will be paid to the potential impacts of the application of new free-trade agreements by the government of Comoros such as the AfCFTA. This analysis will enable the preparation of adapted value-chain development plans adapted to the current and the likely future context of local and international market prices.</p>	DNSAE, CRDEs

5	Discrimination against women in access to land could prevent them from benefiting equitably from the opportunities offered by the project. Access to land in the Comoros is complex and falls under civil, customary and religious rights.	<u>Socio-economic and regulatory</u> -	Substantial L =3 I = 4	Women will be direct and indirect beneficiaries of the resilience strategies promoted by this project. Component 4 will be specifically designed to mainstream a gender perspective. Within its gender action plan, the project will specifically ensure that project Output 1.5 delivery does not affect women rights on land. The entire land titling pilot process will be designed to assess the level of risk and take protective measures as necessary.	DNSAE; Gender Commissariat;
6	Land use conflicts between different stakeholders limit the implementation of the solutions recommended by the project, in particular for territories that are included in protected areas	Operationnal	Low L =3 I = 2	A participatory land-use planning exercise will be implemented under output 1.4. It aims at ensuring that communities in each CRDE jointly agree on land uses over the CRDE territory, including specific contexts such as being part of a protected area. Conductin gthis exercise at project start will ensure there is a shared understanding of upcoming project investments and respect of decisions taken.	DNSAE, CRDEs

7	Resistance of the targeted beneficiaries to change and to the climate-smart solutions proposed by the CRDEs in the framework of the project.	Social/cultural	Low L =2 I = 2	Project preparation was done in a largely participatory manner in the 8 CRDEs, ensuring there is a significant contribution of beneficiary farmers to the project design. The development and implementation of the stakeholder engagement plan also ensures that smallholder farmers, including older ones, are informed and integrated in all participatory planning and decision-making processes regarding the use of land and resources within community lands, which will ensure the integration of their priorities and concerns.	DNSAE, CRDEs
---	--	-----------------	--------------------------	--	--------------

6. Institutional Arrangement and Coordination

Describe the institutional arrangement for project implementation. Elaborate on the planned coordination with other relevant GEF-financed projects and other initiatives.

Section 1: General roles and responsibilities in the projects? governance mechanism

Implementing Partner: The Implementing Partner for this project is the National Directorate of agricultural Strategies and Livestock (DNSAE), under the support to NIM modality in accordance with the agreement between the Comorian Government and UNDP.

The Implementing Partner is the entity to which the UNDP Administrator has entrusted the implementation of UNDP assistance specified in this signed project document along with the assumption of full responsibility and accountability for the effective use of UNDP resources and the delivery of outputs, as set forth in this document.

The Implementing Partner is responsible for executing this project. Specific tasks include:

- Project planning, coordination, management, monitoring, evaluation and reporting. This includes providing all required information and data necessary for timely, comprehensive and evidence-based project reporting, including results and financial data, as necessary. The Implementing Partner will strive to ensure project-level M&E is undertaken by national institutes and is aligned with national systems so that the data used and generated by the project supports national systems.
- Overseeing the management of project risks as included in this project document and new risks that may emerge during project implementation.

- Procurement of goods and services, including human resources.
- Financial management, including overseeing financial expenditures against project budgets.
- Approving and signing the multiyear workplan.
- Approving and signing the combined delivery report at the end of the year; and,
- Signing the financial report or the funding authorization and certificate of expenditures.

Responsible Parties: responsible parties for the implementation of the project activities are as follows:

- INRAPE
- Land and property department
- UCCIA
- Department of Livestock (MAPETA)

Responsible parties will provide goods and services to the project, carry out project activities and produce outputs using the project budget, taking advantage of their specialized skills and to relieve administrative burdens.

Project stakeholders and target groups:

The project will rely on institutional structures (State services, local authorities) and civil society organizations at the central and local levels.

DNSAE, in conjunction with the PMU, will ensure the implementation of activities, coordination and monitoring and evaluation and will work in close collaboration with the technical departments of the MAPETA, INRAPE, 8 CRDEs and other relevant institutions (UCCIA, Chamber of agriculture). DNSAE will sign partnership agreements as necessary.

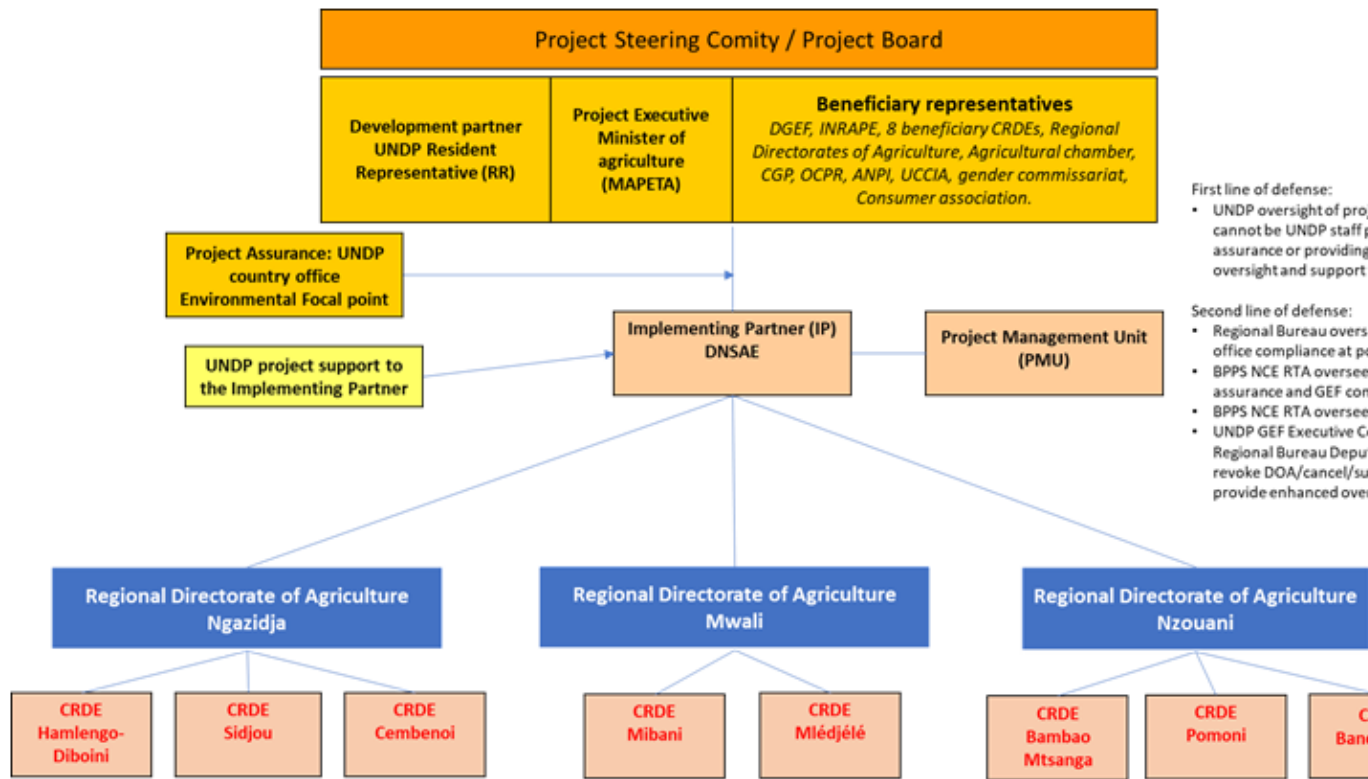
Other sectoral structures will be involved in the implementation of the project through specific activities on the basis of memoranda of understanding, notably the NGOs and private sector small businesses, in particular for delivery of Output 2.1 *Value chain development plans prepared*, Output 2.4 *Climate-resilience of selected value chains reinforced through local processing and marketing of agricultural products* and Output 3.3 *Local supply of agricultural inputs and small-scale equipment disseminated*.

UNDP: UNDP is accountable to the GEF for the implementation of this project. This includes overseeing project execution undertaken by the Implementing Partner to ensure that the project is being carried out in accordance with UNDP and GEF policies and procedures and the standards and provisions outlined in the Delegation of Authority (DOA) letter for this project. **The UNDP GEF Executive Coordinator, in consultation with UNDP Bureaus and the Implementing Partner, retains the right to revoke the project DOA, suspend or cancel this GEF project.** UNDP is responsible for the Project Assurance function in the project governance structure and presents to the Project Board and attends Project Board meetings as a non-voting member.

A firewall will be maintained between the delivery of project oversight and quality assurance performed by UNDP and charged to the GEF Fee and any support to project execution performed by UNDP (as requested by and agreed to by both the Implementing Partner and GEF) and may be charged to the GEF project management costs (only if approved by GEF). The segregation of functions and firewall provisions for UNDP in this case is described in the next section.

Section 2: Project governance

The project is nationally implemented by DNSAE with support from UNDP (Support to NIM). The project governance structure is as presented below:



The UNDP Resident Representative assumes full responsibility and accountability for oversight and quality assurance of this Project and ensures its timely implementation in compliance with the GEF-specific requirements and UNDP's Programme and Operations Policies and Procedures (POPP), its Financial Regulations and Rules and Internal Control Framework. A representative of the UNDP Country Office will assume the assurance role and will present assurance findings to the Project Board, and therefore attends Project Board meetings as a non-voting member.

UNDP project support: The Implementing Partner and GEF OFP have requested UNDP to provide support services in the amount of USD\$210,865 against UNDP resources/co-finance for the full duration of the project, and the GEF has agreed for UNDP to provide such execution support services and for the cost of these services to be charged to the project budget under PMC]. The execution support services whether financed from the project budget or other sources - have been set out in detail and agreed between UNDP Country Office and the Implementing Partner in a Letter of Agreement (LOA). This LOA is attached to this Project Document.

To ensure the strict independence required by the GEF and in accordance with the UNDP Internal Control Framework, these execution services will be delivered independent from the GEF-specific oversight and quality assurance services.

Section 3: Segregation of duties and firewalls vis-?-vis UNDP representation on the project board:

As noted in the [Minimum Fiduciary Standards for GEF Partner Agencies](#), in cases where a GEF Partner Agency (i.e. UNDP) carries out both implementation oversight and execution of a project, the GEF Partner Agency (i.e. UNDP) must separate its project implementation oversight and execution duties, and describe in the relevant project document a: 1) Satisfactory institutional arrangement for the separation of implementation oversight and executing functions in different departments of the GEF Partner Agency; and 2) Clear lines of responsibility, reporting and accountability within the GEF Partner Agency between the project implementation oversight and execution functions.

In this case, UNDP's implementation oversight role in the project ? as represented in the project board and via the project assurance function ? is performed by Mr Mouslim Saadi, Programme Analyst. UNDP's execution role in the project (as requested by the implementing partner and approved by the GEF) is performed by Mr Ali Issmail, Operations Specialist, who will report Mr John Ranaivoson, Operations Manager

Section 4: Roles and Responsibilities of the Project Organization Structure:

a) **Project Steering Committee (PSC) or Project Board:** All UNDP projects must be governed by a multi-stakeholder board or committee established to review performance based on monitoring and evaluation, and implementation issues to ensure quality delivery of results. The Project Board (also called the Project Steering Committee) is the most senior, dedicated oversight body for a project.

The two main (mandatory) roles of the PSC are as follows:

- 1) **High-level oversight of the execution of the project by the Implementing Partner** (as explained in the [?Provide Oversight?](#) section of the POPP). This is the primary function of the project board and includes annual (and as-needed) assessments of any major risks to the project, and decisions/agreements on any management actions or remedial measures to address them effectively. The Project Board reviews evidence of project performance based on monitoring, evaluation and reporting, including progress reports, evaluations, risk logs and the combined delivery report. The Project Board is responsible for taking corrective action as needed to ensure the project achieves the desired results.
- 2) **Approval of strategic project execution decisions of the Implementing Partner** with a view to assess and manage risks, monitor and ensure the overall achievement of projected results and impacts and ensure long term sustainability of project execution decisions of the Implementing Partner (as explained in the [?Manage Change?](#) section of the POPP).

Requirements to serve on the Project Board:

- ? Agree to the Terms of Reference of the Board and the rules on protocols, quorum and minuting.
- ? Meet annually; at least once.
- ? Disclose any conflict of interest in performing the functions of a Project Board member and take all measures to avoid any real or perceived conflicts of interest. This disclosure must be documented and kept on record by UNDP.
- ? Discharge the functions of the Project Board in accordance with UNDP policies and procedures.
- ? Ensure highest levels of transparency and ensure Project Board meeting minutes are recorded and shared with project stakeholders.

Responsibilities of the Project Board:

- ? Consensus decision making:

- o The project board provides overall guidance and direction to the project, ensuring it remains within any specified constraints, and providing overall oversight of the project implementation.
- o Review project performance based on monitoring, evaluation and reporting, including progress reports, risk logs and the combined delivery report;
- o The project board is responsible for making management decisions by consensus.
- o In order to ensure UNDP's ultimate accountability, Project Board decisions should be made in accordance with standards that shall ensure management for development results, best value money, fairness, integrity, transparency and effective international competition.
- o In case consensus cannot be reached within the Board, the UNDP representative on the board will mediate to find consensus and, if this cannot be found, will take the final decision to ensure project implementation is not unduly delayed.
- ? **Oversee project execution:**
- o Agree on project manager's tolerances as required, within the parameters outlined in the project document, and provide direction and advice for exceptional situations when the project manager's tolerances are exceeded.
- o Appraise annual work plans prepared by the Implementing Partner for the Project; review combined delivery reports prior to certification by the implementing partner.
- o Address any high-level project issues as raised by the project manager and project assurance;
- o Advise on major and minor amendments to the project within the parameters set by UNDP and the donor and refer such proposed major and minor amendments to the UNDP BPPS Nature, Climate and Energy Executive Coordinator (and the GEF, as required by GEF policies);
- o Provide high-level direction and recommendations to the project management unit to ensure that the agreed deliverables are produced satisfactorily and according to plans.
- o Track and monitor co-financed activities and realisation of co-financing amounts of this project.
- o Approve the Inception Report, GEF annual project implementation reports, mid-term review and terminal evaluation reports.
- o Ensure commitment of human resources to support project implementation, arbitrating any issues within the project.
- ? **Risk Management:**
- o Provide guidance on evolving or materialized project risks and agree on possible mitigation and management actions to address specific risks.
- o Review and update the project risk register and associated management plans based on the information prepared by the Implementing Partner. This includes risks related that can be directly managed by this project, as well as contextual risks that may affect project delivery or continued UNDP compliance and reputation but are outside of the control of the project. For example, social and environmental risks associated with co-financed activities or activities taking place in the project's area of influence that have implications for the project.
- o Address project-level grievances.
- ? **Coordination:**
- o Ensure coordination between various donor and government-funded projects and programmes.
- o Ensure coordination with various government agencies and their participation in project activities.

Composition of the Project Board: The composition of the Project Board must include individuals assigned to the following three roles:

1. **Project Executive:** This is an individual who represents ownership of the project and chairs (or co-chairs) the Project Board. The Executive usually is the senior national counterpart for nationally implemented projects (typically from the same entity as the Implementing Partner), and it must be UNDP for projects that are direct implementation (DIM). In exceptional cases, two individuals from different entities can co-share this role and/or co-chair the Project Board. If the project executive co-chairs the project board with representatives of another category, it typically does so with a development partner representative. The Project Executive is the General Secretary of the Ministry of Agriculture, Fisheries, Environment, Tourism and Handicrafts, Mr Sa'd Mmadi Bacar.
2. **Beneficiary Representative(s):** Individuals or groups representing the interests of those groups of stakeholders who will ultimately benefit from the project. Their primary function within the

board is to ensure the realization of project results from the perspective of project beneficiaries. Often representatives from civil society, industry associations, or other government entities benefiting from the project can fulfil this role. There can be multiple beneficiary representatives in a Project Board. The Beneficiary representatives are: DGEF, INRAPE, 8 beneficiary CRDEs, Chamber of Agriculture, Regional Directorates of Agriculture, CGP, OCPR, ANPI, UCCIA, Gender Commissariat and Consumer association.

3. **Development Partner(s):** Individuals or groups representing the interests of the parties concerned that provide funding, strategic guidance and/or technical expertise to the project. The Development Partner(s) is the UNDP Deputy Resident Representative who will ensure the policies of UNDP and the GEF are complied with.

-

b) **Project Assurance:** Project assurance is the responsibility of each project board member; however, UNDP has a distinct assurance role for all UNDP projects in carrying out objective and independent project oversight and monitoring functions. UNDP performs quality assurance and supports the Project Board (and Project Management Unit) by carrying out objective and independent project oversight and monitoring functions, including compliance with the risk management and social and environmental standards of UNDP. The Project Board cannot delegate any of its quality assurance responsibilities to the Project Manager. Project assurance is totally independent of project execution.

A designated representative of UNDP playing the project assurance role is expected to attend all board meetings and support board processes as a non-voting representative. It should be noted that while in certain cases UNDP's project assurance role across the project may encompass activities happening at several levels (e.g. global, regional), at least one UNDP representative playing that function must, as part of their duties, specifically attend board meeting and provide board members with the required documentation required to perform their duties. The UNDP representative playing the main project assurance function is Mr Mouslim Saadi .

c) **Project Management ? Execution of the Project:** The Project Manager (PM) (also called project coordinator) is the senior most representative of the Project Management Unit (PMU) and is responsible for the overall day-to-day management of the project on behalf of the Implementing Partner, including the mobilization of all project inputs, supervision over project staff, responsible parties, consultants and sub-contractors. The project manager typically presents key deliverables and documents to the board for their review and approval, including progress reports, annual work plans, adjustments to tolerance levels and risk registers.

-

A designated representative of the PMU is expected to attend all board meetings and support board processes as a non-voting representative.

7. Consistency with National Priorities

Describe the consistency of the project with national strategies and plans or reports and assessments under relevant conventions from below:

NAPAs, NAPs, ASGM NAPs, MIAs, NBSAPs, NCs, TNAs, NCSAs, NIPs, PRSPs, NPFE, BURs, INDCs, etc.

The project strategy is consistent with national strategies and plans. In 2006, the National Adaptation Programmes of Action (NAPA) underlined the potential accelerated decrease in agricultural and fisheries production due to climate change, and identified barriers such as the limited knowledge of development actors on climate change and institutional weaknesses as important barriers to overcome. Adaptation of the

agriculture, forestry, livestock, fisheries, water resources sectors are central to the Climate Change Policy, Strategy and Action Plan elaborated in 2015. The *Plan Comores ?mergents (PCE)* identifies climate and disaster resilient development as a key success factors in the ambition to make Comoros "a country resilient to shocks in all dimensions of sustainable development". In terms of agriculture, the vision of the PCE is to promote more productive, climate resilient, competitive and sustainable agricultural systems that ensure food security. In line with this, the National Agricultural Investment Plan (PNIA) 2020-2024 aims to ensure the agricultural sector is "competitive, sustainable and resilient to climate change, contributing to economic growth, job creation and food security?". The proposed LDCF project fully aligns with this objective and will directly contribute to the objectives of the updated Nationally Determined Contribution (NDC, 2022) which aims to ensure that by 2030, 100% of farmers use techniques and varieties and have a water management system adapted to the evolution of climate change. Finally, regarding biodiversity conservation, the project will contribute to the 5 strategic directions of the Updated National Biodiversity Strategy and Action Plan (June 2016), namely: i) Reducing the root causes of biodiversity loss; ii) Reducing direct pressures on biodiversity and encouraging sustainable use; iii) Improving the status of biodiversity by safeguarding ecosystems, species and genetic diversity; iv) Enhancing the benefits to all from biodiversity and ecosystem services; and v) Strengthening implementation through participatory planning and capacity building.

8. Knowledge Management

Elaborate the "Knowledge Management Approach" for the project, including a budget, key deliverables and a timeline, and explain how it will contribute to the project's overall impact.

Component 4 of the project is dedicated to Knowledge Management, and Gender and PWDs? inclusiveness, seeking to secure the long-term adoption of climate-resilient approaches within the 8 CRDEs and beyond, as well as laying the foundation for scaling up climate-smart agriculture and climate-resilient value chain development in the Comoros. This will be achieved through the development of a knowledge management and communications strategy at project start, and the capturing of M&E data and lessons learned from the first three components for dissemination through diverse communication products and stakeholder engagement.

Six outputs are targeted :

- Output 4.1. Lessons learned from project interventions documented and disseminated*
- Output 4.2. Agro-climatic knowledge for climate adaptation developed through strengthened monitoring and research-action involving farmers*
- Output 4.3. Tools for experience and knowledge-sharing among CRDEs and actors in value chains developed and operationalized*
- Output 4.4 Gender and PWDs action plans based on comprehensive analyses implemented, monitored, and evaluated to promote an inclusive approach to the adoption of a climate-resilient agriculture and mitigation measures of the identified Environmental and Social risks monitored*
- Output 4.5 Awareness campaign conducted to enhance the attractiveness of the agricultural sector and promote climate-smart approaches*
- ? *Output 4.6 Project exit strategy prepared and validated*

While this component is preparing the exit strategy of the project by capitalizing the knowledge acquired in the three first components, the activities will be carried-out all along the project implementation.

The budget for this component is USD 572,005.

9. Monitoring and Evaluation

Describe the budgeted M and E plan

Project-level monitoring and evaluation will be undertaken in compliance with UNDP requirements as outlined in the UNDP POPP (including guidance on GEF project revisions) and UNDP Evaluation Policy. The UNDP Country Office is responsible for ensuring full compliance with all UNDP project M&E requirements including project monitoring, UNDP quality assurance requirements, quarterly risk management, and evaluation requirements.

Additional mandatory GEF-specific M&E requirements will be undertaken in accordance with the [GEF Monitoring Policy](#) and the [GEF Evaluation Policy](#) and other [relevant GEF policies](#)[1]. The M&E plan and budget included below will guide the GEF-specific M&E activities to be undertaken by this project.

In addition to these mandatory UNDP and GEF M&E requirements, other M&E activities deemed necessary to support project-level adaptive management will be agreed ? including during the Project Inception Workshop - and will be detailed in the Inception Report.

Minimum project monitoring and reporting requirements as required by the GEF:

Inception Workshop and Report: A project inception workshop will be held within 2 months from the First disbursement date, with the aim to:

1. Familiarize key stakeholders with the detailed project strategy and discuss any changes that may have taken place in the overall context since the project idea was initially conceptualized that may influence its strategy and implementation.
2. Discuss the roles and responsibilities of the project team, including reporting lines, stakeholder engagement strategies and conflict resolution mechanisms.
3. Review the results framework and monitoring plan.
4. Discuss reporting, monitoring and evaluation roles and responsibilities and finalize the M&E budget; identify national/regional institutes to be involved in project-level M&E; discuss the role of the GEF OFP and other stakeholders in project-level M&E.
5. Update and review responsibilities for monitoring project strategies, including the risk log; SESP report, Social and Environmental Management Framework (where relevant) and other safeguard requirements; project grievance mechanisms; gender strategy; knowledge management strategy, and other relevant management strategies.
6. Review financial reporting procedures and budget monitoring and other mandatory requirements and agree on the arrangements for the annual audit.
7. Plan and schedule Project Board meetings and finalize the first-year annual work plan. Finalize the TOR of the Project Board.
8. Formally launch the Project.

GEF Project Implementation Report (PIR):

The annual GEF PIR covering the reporting period July (previous year) to June (current year) will be completed for each year of project implementation. UNDP will undertake quality assurance of the PIR before submission to the GEF. The PIR submitted to the GEF will be shared with the Project Board. UNDP will conduct a quality review of the PIR, and this quality review and feedback will be used to inform the preparation of the subsequent annual PIR.

LDCF Core Indicators:

The LDCF Core indicators included as Annex will be used to monitor global environmental benefits and will be updated for reporting to the GEF prior to MTR and TE. Note that the project team is responsible for updating the indicator status. The updated monitoring data should be shared with MTR/TE consultants prior to required evaluation missions, so these can be used for subsequent groundtruthing. The methodologies to be used in data collection have been defined by the GEF and are available on the GEF [website](#).

Independent Mid-term Review (MTR):

The MTR should be completed no later than 36 months after CEO Endorsement.

The terms of reference, the review process and the final MTR report will follow the standard UNDP templates and UNDP guidance for GEF-financed projects available on the [UNDP Evaluation Resource Center \(ERC\)](#).

The evaluation will be "independent, impartial and rigorous". The evaluators that UNDP will hire to undertake the assignment will be independent from organizations that were involved in designing, executing or advising on the project to be evaluated. Equally, the evaluators should not be in a position where there may be the possibility of future contracts regarding the project under review.

The GEF Operational Focal Point and other stakeholders will be actively involved and consulted during the evaluation process. Additional quality assurance support is available from the BPPS/NCE-VF Directorate.

The final MTR report and MTR TOR will be publicly available in English and will be posted on the UNDP ERC by 31st December 2026. A management response to MTR recommendations will be posted in the ERC within six weeks of the MTR report's completion.

-

Terminal Evaluation (TE):

An independent terminal evaluation (TE) will take place upon completion of all major project outputs and activities. The terms of reference, the evaluation process and the final TE report will follow the standard templates and guidance for GEF-financed projects available on the [UNDP Evaluation Resource Center](#). TE should be completed 3 months before the estimated operational closure date, set from the signature of the Prodoc and according to the duration of the project. Provisions should be taken to complete the TE in due time to avoid delay in project closure. Therefore, TE must start no later than 6 months to the expected date of completion of the TE (or 9 months prior to the estimated operational closure date).

The evaluation will be "independent, impartial and rigorous". The evaluators that UNDP will hire to undertake the assignment will be independent from organizations that were involved in designing, executing or advising on the project to be evaluated. Equally, the evaluators should not be in a position where there may be the possibility of future contracts regarding the project being evaluated.

The GEF Operational Focal Point and other stakeholders will be actively involved and consulted during the terminal evaluation process. Additional quality assurance support is available from the BPPS/NCE-VF Directorate.

The final TE report and TE TOR will be publicly available in English and posted on the UNDP ERC by 31st March 2029. A management response to the TE recommendations will be posted to the ERC within six weeks of the TE report's completion.

-

Final Report:

The project's terminal GEF PIR along with the terminal evaluation (TE) report and corresponding management response will serve as the final project report package. The final project report package shall be discussed with the Project Board during an end-of-project review meeting to discuss lesson learned and opportunities for scaling up.

Agreement on intellectual property rights and use of logo on the project's deliverables and disclosure of information: To accord proper acknowledgement to the GEF for providing grant funding, the GEF logo will appear together with the UNDP logo on all promotional materials, other written materials like

publications developed by the project, and project hardware. Any citation on publications regarding projects funded by the GEF will also accord proper acknowledgement to the GEF. Information will be disclosed in accordance with relevant policies notably the UNDP Disclosure Policy[2] and the GEF policy on public involvement[3].

The Project Document includes a detailed Monitoring Plan.

Monitoring and Evaluation Budget for project execution:		
GEF M&E requirements to be undertaken by Project Management Unit (PMU)	Indicative costs (US\$)	Time frame
Inception Workshop and Report	5,000	Inception Workshop within 2 months of the First Disbursement
M&E required to report on progress made in reaching GEF core indicators and project results included in the project results framework	<i>Per year: 5,000</i>	Annually and at mid-point and closure.
Preparation of the annual GEF Project Implementation Report (PIR)	<i>Per year: 5,000</i>	Annually typically between June-August
Monitoring of Safeguards management framework and gender action plan indicators	<i>Per year: 12,000</i>	On-going.
Supervision missions	<i>(included in PMU budget)</i>	Annually
Learning missions	<i>N/A</i>	As needed
Independent Mid-term Review (MTR): <i>costs associated with conducting the independent review/evaluation to be commissioned by UNDP not the Implementing Partner or PMU.</i>	70,000	31st December 2026
Independent Terminal Evaluation (TE): <i>costs associated with conducting the independent evaluation to be commissioned by UNDP not the Implementing Partner or the PMU.</i>	80,000	31st March 2029
TOTAL indicative COST	265,000 <i>(max 3%= 267,973)</i>	<i>Equivalent to TBWP component (M&E)</i>

[1] See https://www.thegef.org/gef/policies_guidelines

[2] See http://www.undp.org/content/undp/en/home/operations/transparency/information_disclosurepolicy/

[3] See https://www.thegef.org/gef/policies_guidelines

10. Benefits

Describe the socioeconomic benefits to be delivered by the project at the national and local levels, as appropriate. How do these benefits translate in supporting the achievement of global environment benefits (GEF Trust Fund) or adaptation benefits (LDCE/SCCF)?

The project is expected to deliver direct socio-economic benefits at regional (island) and local level. The project will directly support 13,500 farmers (6,864 men and 6,636 women) in CRDEs in transforming their direct environment into more productive and sustainable ecosystems, delivering long-term socio-economic benefits to the larger group of community members and reinforcing their resilience to climate change. Through its Diversification of climate-resilient value chains component (Component 2) and Investment in climate-resilient value chains component (Component 3), the project will also directly support MSEs and cooperatives in developing their businesses and, in turn, get economic benefits from them.

Therefore the project beneficiaries will (i) receive support for transforming the landscapes for increased productivity and restoration of ecosystem services which will deliver long-term socio-economic benefits including increased food security, increased resilience to climate change and better adaptation capacity; (ii) receive support in the development of climate resilient value chains, improving community livelihoods and socio-economic safety, with direct impacts on community resilience to climate change; and (iii) gain access to new employment opportunities which will also increase household incomes.

Social benefits such as women empowerment, job creation and improved (and organized) concertation between different ecosystems users will also result from the project interventions. The project includes an important gender perspective in its activities and targets. Women will represent 50% of direct beneficiaries of the project, in particular under components 2, 3 and 4. This will undoubtedly directly also deliver socio-economic benefits at the regional level, spreading good practices and lessons learned to other neighboring communities. The socioeconomic benefits will in turn reduce pressures on natural resources, help ecosystems deliver valuable adaptation services, and increase community resilience to shocks, including those associated with climate.

11. Environmental and Social Safeguard (ESS) Risks

Provide information on the identified environmental and social risks and potential impacts associated with the project/program based on your organization's ESS systems and procedures

Overall Project/Program Risk Classification *

PIF	CEO Endorsement/Approva I	MTR	TE
High or Substantial	Medium/Moderate		

Measures to address identified risks and impacts

Elaborate on the types and risk classifications/ratings of any identified environmental and social risks and impacts (considering the GEF ESS Minimum Standards) and any measures undertaken as well as planned management measures to address these risks during implementation.

Please refer to the SESP, uploaded below, for full information.

Supporting Documents

Upload available ESS supporting documents.

Title	Module	Submitted
PIMS 6628 Social and Environmental Screening	CEO Endorsement ESS	
6628 PRE-SESP_Comoros_Resilience_Project_JS_clean	Project PIF ESS	

ANNEX A: PROJECT RESULTS FRAMEWORK (either copy and paste here the framework from the Agency document, or provide reference to the page in the project document where the framework could be found).

This project will contribute to the following Sustainable Development Goal (s):				
1. SDG1: End poverty in all its forms everywhere				
2. SDG 5: Achieve gender equality and empower all women and girls				
3. SDG8: Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all				
4. SDG13: Take urgent action to combat climate change and its impacts				
5. SDG 15: Protect, restore and promote sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss (Target 15.3: By 2030, combat desertification, restore degraded land and soil, including land affected by desertification, drought and floods, and strive to achieve a land degradation-neutral world)				
This project will contribute to the following country outcome (UNDAF):				
Outcome 1: By 2026, state and non-state actors and the Comorian population, especially the most vulnerable, strengthen their resilience to climate change, natural disasters and crises and ensure sustainable and integrated management of terrestrial and marine ecosystems and associated ecosystem goods and services, in a context of promoting sustainable housing with a low environmental footprint.				
Outcome 2: By 2026, the Comorian population, especially the most vulnerable, enjoys shared prosperity, built on a more competitive and inclusive economy, on renewed public-private partnerships, and in a perspective of sustainable growth focused on the sectors of the future (green, blue and digital economy).				
Outcome 4: By 2026, public institutions are more inclusive, effective, accountable and resilient, and strengthen citizen participation in public life, social cohesion, human rights, gender equality and democracy.				
	Objective and Outcome Indicators	Baseline	Mid-term Target	End of Project Target
Project Objective:	Increase the climate resilience of key agricultural value chains through innovation, diversification and strengthened capacities to sustainably improve the livelihoods of smallholders and contribute to the national economy			
	<u>Mandatory Indicator 1:</u> # direct project beneficiaries disaggregated by gender as co-benefit of GEF investment	0	56,000 Male: 28,000 Female: 28,000	108,000 Male: 54,000 Female: 54,000
	<u>Mandatory Indicator 2:</u> Area of landscapes under improved practices (ha) Sub-indicator: Area of landscapes under sustainable land management in production systems (ha)	0	7,254	7,254
	<u>Mandatory Indicator 3:</u> Total number of people trained (male/female)	0	250 Male: 170 Female: 80	470 Male: 305 Female: 165
Project component 1	<i>Systemic, institutional and individual capacities for climate-resilient agriculture</i>			

Project Outcome 1 <i>Enhanced capacity of national institutions and value chain actors involved in agriculture development to guide, plan, supervise and implement climate-resilient practices</i>	Mandatory Indicator 4: Number of <i>climate-resilient agricultural land-use plans elaborated</i>	0	8	8
	Indicator 5: Number of <i>CRDEs delivering climate-smart extension services to CRDE men and women farmers along validated land-use plans</i>	0	6	8
Outputs to achieve Outcome 1	<i>Output 1.1 Capacity development needs identified and addressed for key national and regional institutions and organisations to guide, plan, supervise and implement the development of resilient agricultural value-chains in Comoros</i> <i>Output 1.2 Technical capacities of CRDEs to disseminate and support the adoption of climate-smart agricultural practices among smallholder farmers and value chain actors increased</i> <i>Output 1.3. INRAPE's capacities to characterize new climate-adapted Comorian agrobiodiversity products, and control the quality of export products, increased</i> <i>Output 1.4 Climate-resilient agricultural land-use plans elaborated in 8 CRDEs</i> <i>Output 1.5 Secured land tenure initiative piloted</i>			
Project component 2	Diversification of climate-resilient value chains			
Outcome 2 <i>Increased resilience of agricultural actors through the identification and promotion of new climate-resilient value chain options with good prospects for profitability, increased access to national and international market information and equitable benefit sharing</i>	Indicator 6: Number of <i>value chains made more resilient to climate change</i>	0	6 value-chain development plans developed	4 value chains made more resilient to climate change
	Indicator 7: Evidence of <i>1 new value chain traceability system functional</i>	0	1	2

Outputs to achieve Outcome 2	<i>Output 2.1 Value chain development plans prepared with the private sector, cooperatives and other stakeholders</i> <i>Output 2.2 Climate resilient seed varieties selected and optimized technical itineraries developed and disseminated</i> <i>Output 2.3 Digital platform connecting agricultural producers and buyers in national and international markets functional</i> <i>Output 2.4 Climate-resilience of selected value chains reinforced through local processing and marketing of agricultural products</i> <i>Output 2.5 Pilot traceability systems of agricultural value chains tested and evaluated and certification obtained for 2-3 cooperatives or private firms</i>			
Project component 3	Implementation of agroecological practices adapted to climate change in targeted intervention areas			
Outcome 3 <i>Increased adoption of climate-resilient practices and crops/varieties by smallholder farmers and value chain actors facilitated by support systems and adequate provision of inputs and resources</i>	<i>Indicator 8: % area of the CRDE agricultural land under climate-smart management (combination of at least 3 of the following practices: hedges, mulching, agroforestry, compost, improved varieties, cover crop)</i>	<i>tbd</i>	25%	50%
	<i>Indicator 9: Number of farmers adopting climate resilient strategies</i>	0	7000	13500
Outputs to achieve Outcome 3	<i>Output 3.1. Climate-smart agronomic approaches and practices developed and piloted by CRDEs to reduce climate vulnerability of the agricultural sector</i> <i>Output 3.2 Climate resilience of poultry and goat farming value chains strengthened</i> <i>Output 3.3 Local supply of agricultural inputs and small equipment disseminated</i> <i>Output 3.4 Access conditions explained and financial products made more accessible to smallholder farmers to support the adoption of climate-resilient practices</i>			
Project component 4	Knowledge Management, and Gender and PWDs? inclusiveness			
Outcome 4 <i>Improved development, management, and dissemination of knowledge related to gender-sensitive adaptation of the agricultural sector to climate change to support the replication of</i>	<i>Indicator 10: Extend to which women in the 8 target CRDEs demonstrate leadership positions with respect to land, water, forest and other biological resources (% of women entrepreneur, manager, lead farmer).</i>	<i>tbd</i>	20%	30%

<i>climate resilient solutions among CRDEs, and at national and regional scale</i>	<i>Indicator 11: Number of people reached by awareness raising and information sharing events (sex-disaggregated and age-disaggregated)</i>	<i>0</i>	<i>15,000 (50% women)</i>	<i>30,000 (50% women)</i>
Outputs to achieve Outcome 4	<i>Output 4.1. Lessons learned from project interventions documented and disseminated</i> <i>Output 4.2. Agro-climatic knowledge for climate adaptation developed through strengthened monitoring and research-action involving farmers</i> <i>Output 4.3. Tools for experience and knowledge-sharing among CRDEs and actors in value chains developed and operationalized</i> <i>Output 4.4 Gender and PWDs action plans based on comprehensive analyses implemented, monitored, and evaluated to promote an inclusive approach to the adoption of a climate-resilient agriculture and mitigation measures of the identified Environmental and Social risks monitored</i> <i>Output 4.5 Awareness campaign conducted to enhance the attractiveness of the agricultural sector and promote climate-smart approaches</i> <i>Output 4.6 Project exit strategy prepared and validated</i>			

[1] PLAN-CADRE DES NATIONS UNIES POUR L'AIDE AU DEVELOPPEMENT R?VIS? 2015-2021 (PNUAD / UNDAF)

[2] *Baseline, mid-term and end of project target levels must be expressed in the same neutral unit of analysis as the corresponding indicator. Baseline is the current/original status or condition and needs to be quantified. The baseline can be zero when appropriate given the project has not started. The baseline must be established before the project document is submitted to the GEF for final approval. The baseline values will be used to measure the success of the project through implementation monitoring and evaluation.*

[3] *Target is the change in the baseline value that will be achieved by the mid-term review and then again by the terminal evaluation.*

ANNEX B: RESPONSES TO PROJECT REVIEWS (from GEF Secretariat and GEF Agencies, and Responses to Comments from Council at work program inclusion and the Convention Secretariat and STAP at PIF).

Comments	Responses
STAP: the extent to which the proposed project builds on or moves beyond some of the baseline projects, particularly the IFAD PREFER and AfDB PASAICV projects could be clarified to further support the incremental cost reasoning.	The incremental cost reasoning section has been reviewed and now includes a specific mention of the IFAD PREFER and AfDB PASAIVC projects.

STAP: In the risk section of the PIF there is a discussion of climate risk to the project, but it is not detailed enough to make it clear the project knows what adaptations might be needed to respond to changing conditions.

The project should consider how it will mitigate the risk of major events or stressors in the early stages of implementation, when changes have not yet been made to practices.

The risk section has been modified and completed during the PPG phase and now includes 7 main risks. Climate-related disaster risks are rated moderate: risk of climate-related disasters is moderate as those events are usually limited to specific areas and not affecting the entire country at once. The risk is mitigated given that project sites are located in different islands and not close to each other.

ANNEX C: Status of Utilization of Project Preparation Grant (PPG).

(Provide detailed funding amount of the PPG activities financing status in the table below:

PPG Grant Approved at PIF: 200,000			
<i>Project Preparation Activities Implemented</i>	<i>GETF/LDCF/SCCF Amount (\$)</i>		
	<i>Budgeted Amount</i>	<i>Amount Spent To date</i>	<i>Amount Committed</i>
Project preparation grant to finalize the UNDP-GEF project document	200,000	109,411	90,589
Total	200,000	109,411	90,589

ANNEX D: Project Map(s) and Coordinates

Please attach the geographical location of the project area, if possible.

Island	CRDE	Coordinates	
		Longitude	Latitude
Mwali	MI?dj?l?	43.46555?	-12.17354?
	Mibani	43.77640?	-12.33909?
Ndzuani	Pomoni	44.40513?	-12.28013?
	Bandramaji	44.51462?	-12.35919?
	Bambao Mtsanga	44.51370?	-12.19574?
Ngazidja	Hamalengo-Diboini	43.27671?	-11.44729?
	Sidjou	43.41379?	-11.68060?
	Cembenoi	43.25771?	-11.68185?

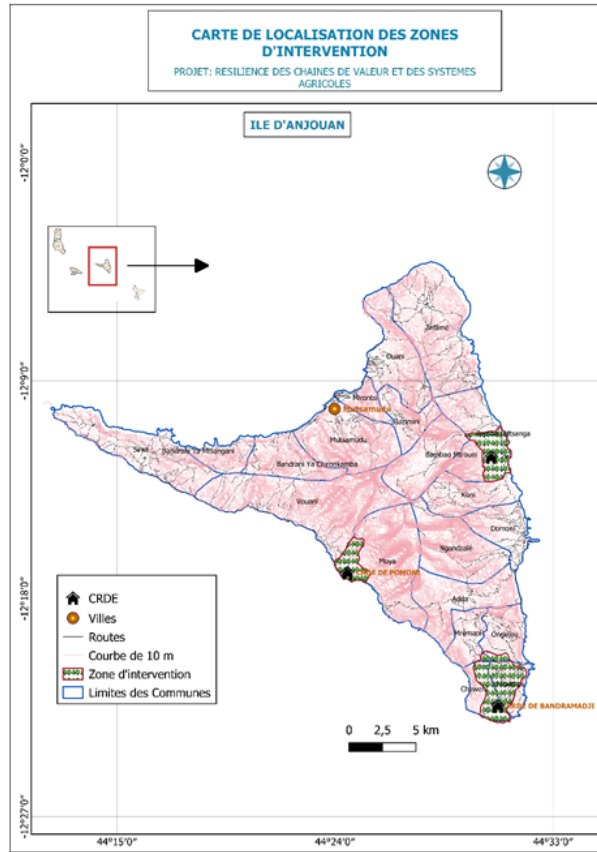


Figure 4. Location map of project intervention areas on Ndzuan Island

GEO LOCATION INFORMATION

The Location Name, Latitude and Longitude are required fields insofar as an Agency chooses to enter a project location under the set format. The Geo Name ID is required in instances where the location is not exact, such as in the case of a city, as opposed to the exact site of a physical infrastructure. These IDs are available on the [GeoNames? geographical database](#) containing millions of placenames and allowing to freely record new ones. The Location & Activity Description fields are optional. Project longitude and latitude must follow the Decimal Degrees WGS84 format and Agencies are encouraged to use at least four decimal points for greater accuracy. Users may add as many locations as appropriate. Web mapping applications such as [OpenStreetMap](#) or [GeoNames](#) use this format. Consider using a conversion tool as needed, such as: <https://coordinates-converter.com> Please see the Geocoding User Guide by clicking [here](#).

Location Name	Latitude	Longitude	Geo Name ID	Location & Activity Description
MI?dj?I?	-12.17354	43.46555		<input type="checkbox"/>
Mibani	-12.88909	43.40513		<input type="checkbox"/>
Pomoni	-12.28013	44.40513		<input type="checkbox"/>
Bandramaji	-12.35919	44.51462		<input type="checkbox"/>
Bambao Mtsanga	-12.19574	44.51370		<input type="checkbox"/>
Hamalengo -Diboini	-11.44729	43.27671		<input type="checkbox"/>
Sidjou	-11.68060	43.41379		<input type="checkbox"/>
Cembenoi	-11.68185	43.25771		<input type="checkbox"/>

ANNEX E: Project Budget Table

Please attach a project budget table.

Reviewer is kindly requested to see the budget table in Roadmap. This is because there are several outputs, making the budget table wide and unable to fit appropriately in this section/field of GEF portal. Thank you for your consideration.

Expenditure Category	Detailed Description	Component (USDeq.)								Responsible Entity
		Component 1	Component 2	Component 3	Component 4	M	S	P	T	
		Outcome 1	Outcome 2	Outcome 3	Outcome 4					
										(Excel)

Contractual services company	Contractors for rehabilitation works on CRD E buildings and construction of greenhouses, rainwater collection tanks and PV electricity equipment; 8 @\$50,000 (Output 1.2); Specific works in reference CRD Es for research, development and dissemination	460,000											460,000	460,000	D N S A E
------------------------------	--	---------	--	--	--	--	--	--	--	--	--	--	---------	---------	-----------------------

	purposes (e.g. rehabilitation of existing equipment), 3 @\$20,000 (Output 1.2);																				
Contractual services-Company	Contractors for works on vegetable health lab, @\$200,000 (Output 1.3);																	200,000		200,000	D N S A E
Contractual services-Company	Lab analyses and organoleptic testing of selected Comorian products, 6 @\$15,000 (Output 2.1);																	90,000		90,000	D N S A E

Contractual services-Individual	Contract with 4 Engineers (2 Ngazidja, 1 Mwali, 1 Nzuanini) @\$1000/month * 60 months Contract with 20 agricultural technical advisers, 2 legal experts, 3 local development experts and 3 sales experts, 2 logistics experts to support CRD Es missions																										DNSAE	

1,761,000

1,761,000

1,761,000

Contractual services-Individual	Contractors for works on vegetal health lab, @\$200,000 (Output 1.3); Equipment and furniture for vegetal health Lab, @\$50,000 (Output 1.3);		50,000																	50,000	50,000	D N S A E
--	---	--	--------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--------	--------	-----------------------

Equipment	Motorbikes for contracted staff in CRDEs, 32 @\$1000 (Output 1.2); Provision of specific equipment to reference CRDE (e.g. cold chambers, milling equipment, etc.); 3 @\$1000 (Output 1.2);	332,000																								DNSE
-----------	---	---------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	------

Equipment	Computers and office equipment \$10,000;																								100,000	100,000	DN S A E
Equipment	Office equipment and furniture for CRDEs, including computers, printers, furniture, @\$120,000 /CRDE (Output 1.2);																							120,000	120,000	DN S A E	

Eq ui p me nt	Office suppl ies for the PMU ; @\$2 000/ year (Out put 1.1);	1 0 , 0 0 0																									D N S A E
Int er na tio na l Co ns ult an ts	Inter natio nal agric ultur al mark ets data expe rt, 50 days @\$8 00 (Out put 2.3);																									D N S A E	
Int er na tio na l Co ns ult an ts	Inter natio nal agric ultur al trace abilit y syste ms expe rt, 100 days @\$8 00 (Out put 2.5);																									D N S A E	

International Consultants	International agriculture research expert, 25 days @800 USD/day (Output 1.3); International agriculture research expert, 25 days @800 USD/day (Output 1.3);	40000															40000	40000	DNSAE
----------------------------------	---	-------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	-------	-------	-------

International climate-smart agriculture expert, 50 days @800 USD/day (Output 1.2);																											D N S A E
International CSA expert, 50 days @800 USD/day;											4 0 , 0 0 0															D N S A E	
International food processing expert, 50 days @\$800 (Output 2.4);											4 0 , 0 0 0															D N S A E	

International Consultants	International institutional capacity building and CC expert, 40 days @800 USD/day (Output 1.1); International institutional capacity building and CC expert, 40 days @800 USD/day (Output 1.1); International Safe guards expert, 40 days @\$800 (Output	96,000																									96,000	96,000	D N S A E
----------------------------------	--	--------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--------	--------	-----------------------

Local Consultants	National climate-smart agriculture expert, 50 days @30 USD/day (Output 1.2);	15,000																							DNSAE
--------------------------	--	--------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	-------

Local Consultants	National institutional capacity building and CC expert, 30 days @300 USD/day (Output 1.1); National institutional capacity building and CC expert, 30 days @300 USD/day (Output 1.1);	18,000																						18,000		18,000	DNSAE
-------------------	---	--------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--------	--	--------	-------

Local Consultants	National IT expert for CRD E intranet, 80 days @\$300 (Output 4.2);																										D N S A E
Local Consultants	National KM and climate change expert for Baseline study at project start, 40 days @\$300 (Output 4.1);																										D N S A E

Local Consultants	National land-use planning and agriculture/local development expert, 3 days per CRD E = 24days + 10 days prep & reporting @300 USD/day (Output 1.4); National land-use planning and agriculture/local development expert, 3 days per CRD E = 24days + 10 days prep & reporting @300 USD/day (Output 1.4);		17,400									17,400	17,400	DNSAE
-------------------	---	--	--------	--	--	--	--	--	--	--	--	--------	--------	-------

Office Supplies	Equipment and furniture for vegetable health Lab, @\$50,000 (Output 1.3); Provision of specific supplies to Vegetable health lab, @\$45,000 (Output 1.3);																										45,000	45,000	DNSEA
Office Supplies	Office Supplies;																										7500	7500	DNSEA

Office Supplies	Provision of fuel & other supplies; 8 @\$20,000 (Output 1.2);	160,000																									DNSAE
Office Supplies	Supply initial stock of veterinary products, 8 CRD Es @\$10,000 (Output 3.2);																										DNSAE

O t h e r O p e r a t i n g C o s t s	Annual financial audits \$17,500;																										17,500 17,500 D N S A E
O t h e r O p e r a t i n g C o s t s	Organisation of local radio programs and TV interventions on the role of CRD Es and agriculture attractiveness @\$2500 (Output 1.2);	2,500																					2,500	2,500			D N S A E

Other Operating Costs	ESI As public consultations, 5 @\$1 000 (Output 1.1);	5,000																						5,000	5,000	D N S A E
Sub-contract to executing partner	DPC - UND P costs for Support to NIM (@\$ 210, 865)																							210,865	210,865	D N S A E
Training, Workshops, Meetings	Conference and information events, 3 events @\$5 000 (Output 4.5)																							15,000	15,000	D N S A E

Tr ai ni ng, W or ks h o p s, M e e t i n g s	Train ing work shop s (4 @ \$2,0 00 each) (Out put 1.1);	8 , 0 0 0																					8 , 0 0 0		8 , 0 0 0	D N S A E
Tr av el	Trav el cost of the PMU proj ect staff \$20, 000;																					- 0 0 0	2 0 , 0 0 0	2 0 , 0 0 0	D N S A E	
Tr av el	DSA and trav el cost for Gend er and Safe guar ds expe rts, 5 @30 00 (Out put 4.3);																					1 5 , 0 0 0		1 5 , 0 0 0	1 5 , 0 0 0	D N S A E

Travel	DSA and travel cost for International KM expert (\$30 00) (Output 4.1); Travel costs for Baseline study at project start (\$30 00) (Output 4.1);																										D N S A E
Travel	DSA and travel cost for IT experts, 4 @30 00 (Output 4.2)																									D N S A E	

Travel	DSA and travel costs for international CSA experts (\$30 00); DSA and travel costs for international and national CSA experts (\$40 00); DSA and travel costs for national water supply and irrigation expert (\$15 00) (Output 3.1);																							8,500	8,500	8,500	D N S A E
--------	---	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	-------	-------	-------	-----------------------

Travel	DSA and travel costs for international microfinance expert (\$30 00) (Output 3.4);																										D N S A E
Travel	DSA and travel costs for national and international agricultural markets data experts (\$30 00) (Output 2.3);																										D N S A E

Travel	DSA and travel costs National & International institutional capacity building and CC expert (\$30 00) (Output 1.1); DSA and travel costs National & International institutional capacity building and CC expert (\$30 00) (Output 1.1); DSA and	1000																									DNSE
--------	---	------	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	--	------

Travel	costs of international and national food processing experts (\$400 0) (Output 2.4);																										D N S A E
Travel	costs of international and national food processing experts (\$150 0) (Output 2.4);																										D N S A E
Travel	Transport costs for markets, @\$5,000 (Output 2.4);																										D N S A E

