

UNDP GEF PIMS no. 4091

# Building adaptive capacity and resilience to climate change in the water sector in Cape Verde

Mid-term Review - FINAL 13 September 2013 -



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#### Project information summary table

Category	Information
Name of the UNDP/GEF project	Building adaptive capacity and resilience to climate change in the water sector in Cape Verde
UNDP and GEF project ID#s	Project ID: UNDP GEF PIMS no. 4091
Evaluation time frame and date of evaluation report	July 2013
Region and countries included in the project	Cape Verde
GEF Operational Program/Strategic Program	Climate Change, LDCF
Executing Agency and project partners	National Institute for the Management of Water Resources (INGRH)
Evaluation team members	Dr. Juliane Zeidler, Carlos Monteiro

#### Acknowledgements

Thank you to all the interviews that took out the time to participate in this evaluation. In the communities individuals travelled long distances to be at the briefings and community conversations. The support from the project team, INGRH and UNDP staff is highly appreciated.

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#### Acronyms and Abbreviations

ALM	Adaptation Learning Mechanism
ANAS	Agency National of Water and Sanitation
CC	Climate Change
CO	Country Offices
CSA	Soil and Water Conservation
СТА	Chief Technical Advisor
DERCP	Poverty Reduction and Strategic Plan
DGA	Directorate General for the Environment
GEF	Global Environment Facility
INGRH	National Institute for Water Resources Management
INIDA	National Institute of Agrarian research and Development
INMG	National Institute of meteorology and Geophysics
LCs	Local Committees
LDC	Least Developed Countries
LDCF	Least Developed Countries Found
M&E	Monitoring and Evaluation
MADRRM	Ministry of Environment, Rural Development and Marine Resources
МАНОТ	Ministry of Environment, Habitat and Territorial Planning
MDG	Millennium Development Goal
MDR	Ministry of Rural Development
MoUs	Memoranda of Understanding
MTR	Mid-term Review
NAPA	National Adaptation Program of Action
NGO	Non-Governmental Organization
PAGIRH	National Action Plan for Integrated for Water Resources Management
PAIS	Intersectorial Environment Plan
PAM	Municipal Action Plan
PCU	Project Coordination Unit
PDM	Municipal Development Plan
PEDA	Strategic Program for Agricultural Development
SC	Steering Committee
SIDS	Small Island Development State
SRF	Strategic Results Framework
TAC	Technical Advisory Committee
тс	Technical Committee
TOR	Term of reference
UNDP	United Nation Development Program
UNFCCC	United Nation Framework Convention of Climate Change
VRA	Vulnerability Reduction Assessment

#### **Executive Summary**

#### Project description and development context

The project is based on the priority adaptation option identified in Cape Verde's National Adaptation Programme of Action (NAPA) and is co-funded by the LDCF<sup>1</sup> through GEF, implemented with support from UNDP. The national executing agency is the National Institute for the Management of Water Resources (INGRH).

The impacts of climate change on Cape Verde water resources, particularly on water availability, are predicted to adversely affect human health, agricultural production and food security in both rural and urban areas.

Predicted climate change scenarios are likely to constrain long-term development through:

- (i) increased frequency and severity of drought;
- (ii) increased rainfall variability, including more frequent events of short and intense rains, causing flash-floods in several catchment areas; and
- (iii) progressive sea level rise and salt water intrusion in freshwater reservoirs closer to coastal areas.

This LDCF project was formulated<sup>2</sup> to address the major challenge for Cape Verde to mainstream climate change adaptation measures into integrated water resource management across different institutional, social and spatial frameworks.

The **project goal** is *"to ensure that water availability, supply and quality are maintained in the face of changed climatic conditions"*. This goal is in line with MDG Goal 7, Target 10: Halve, by 2015, the proportion of people without sustainable access to safe drinking water<sup>3</sup>

The **project objective** is "to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde".

Three **outcomes** are expected from the project:

**Outcome 1:** Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.

**Outcome 2:** Small and medium scale climate change adaptation practices for water resource management are demonstrated and implemented in selected hydrographical basins.

**Outcome 3:** Lessons learned and best practices from pilot activities, capacity development initiatives and policy changes are disseminated.

The full LFA for the project is reflected in Table 1.

<sup>&</sup>lt;sup>1</sup> It is noted that since approval of this LDCF project, Cape Verde has moved to become a medium-income country.

<sup>&</sup>lt;sup>2</sup> See project document

<sup>&</sup>lt;sup>3</sup> In line with UNDP/GEF guidance of the Thematic Area 'Water Resources and Quality'.

#### Purpose of the evaluation

This is a scheduled standard mid-term review (MTR) of a UNDP implemented GEF LDCF co-financed project. It is conducted by an independent evaluator.

The objective of the MTR, as set out in the Terms of Reference (TORs; Annex 1), is to provide an independent analysis of the progress of the project so far.

The MTR aims to:

- identify potential project design problems,
- assess progress towards the achievement of the project objective and outcomes,
- identify and document lessons learned (including lessons that might improve design and implementation of other projects, including UNDP-GEF supported projects), and
- make recommendations regarding specific actions that should be taken to improve the project.

The MTR is intended to assess signs of project success or failure and identify the necessary changes to be made.

The project commenced its implementation in the first half of 2010 with the recruitment of project staff. According to the updated project plan, it is due to close in July 2014<sup>4</sup> with operations scaling down in December 2013 due to funding limits. Because of a slow implementation start, the mid-term evaluation was delayed to July 2013<sup>5</sup>.

The intended target audience of the review are:

- The project team and decision makers in the INGRH
- The GEF and UNFCCC Operational Focal Points
- The project partners and beneficiaries
- UNDP in Cape Verde as well as the regional and headquarter (HQ) office levels
- The GEF Secretariat.

#### Summary of key findings

#### Project design and effectiveness of strategy

#### Problem addressed and country priorities

- The project design focuses on building adaptive capacity to anticipated and immediate climate risks in the water sector in Cape Verde. Considering that water availability and quality remain amongst the key environmental threats to sustainable living and development in Cape Verde the project addresses key priorities of the country
- The project design foresees significant investments in climate proofing the water sector, promoting a strategy of building awareness and adaptive capacities on a technical level. Three key assumptions underlie the project design. The three assumptions made are critical, and may have led to a major deficit observed in the project at time of MTR which is a lack of synthesis and strategic dissemination of adaptation learning stemming from the good pilot interventions.

<sup>&</sup>lt;sup>4</sup> PIR 2012

<sup>&</sup>lt;sup>5</sup> PIR 2011 and 2012

#### Effectiveness of project strategy (incl. LFA and SRF)

- The project strategy set out in the project document seems technically sound, although some critical barriers to longterm adoption of adaptation measures were not considered (i.e. cost-effectiveness and affordability for local farmers).
- Several interviewees indicated that they found that too many intervention sites were selected, and that the investments available per site were too limited to show a significant impact<sup>6</sup>.
- Considering that this was a first NAPA response project in Cape Verde, the in the design chosen approach to test and demonstrate climate risks and related adaptation measures seems valid, although the novelness and adaptation additionality were questioned by several interviewees<sup>7</sup>.

#### Progress

#### Attainment of objectives/results (LFA and SRF)

- The performance of the project implementation against the LFA and SFR were assessed. Overall, performance on the output level seems satisfactory and comprehensive. From the annual work plans some questions arise on decisions on approved activities, which seem not to make strategic contributions to the overall objective of the project.
- It can be said that the project team addressed and implemented the LFA and SRF quite literally, however, sometimes missing opportunities for generating strategic impacts through more adaptive management.
- The activities implemented under outcome 1 so far have paved the way for further engagement, but it is important that the project fully capitalises now on the opportunities set out and now starts injecting the adaptation learning from outcome 2 in a meaningful manner for key target groups.
- Contributing to outcome 2, a great number of activitieve has been implemented under the various project outputs. A multitude of lessons learnt and best practices can be deducted from the already made investments – and must be documented as a matter of urgency. The adaptation learning needs to be systematically analysed and synthesised to form the foundation for informing remaining outcome 1 activities before project end.
- Linked to outcome 3 which is terribly under-resourced in all aspects and seemingly also undervalued lessons learnt must be documented – not only to contribute to ALM, but more importantly to produce targeted information and learning materials for specifically identified and targeted stakeholders in Cape Verde.
- Assessing achievements in the context of the SRF at MTR was difficult, as a number of key inputs for such an assessment were not accessible.

#### Finance and co-finance

- At time of MTR, the financial tables indicated that most funding had been broadly spent according to the planned allocations as per component, with remaining funding pre-allocated for the remainder of 2013. Funding for a no-cost extension of the project is not available at this point.
- The co-financing commitments were reported on in PIRs (2012 and 2013<sup>8</sup>) and are reflected in Annex 7 of this report, in line with the co-financing commitments set out in the project document.

<sup>&</sup>lt;sup>6</sup> Comments made during LC meeting Santa Cruz, 4 July 2013

<sup>&</sup>lt;sup>7</sup> Comment by UNDP, with additional references from MDR in Ribeira Grande.

<sup>&</sup>lt;sup>8</sup> The PIR for 2013 was only prepared after the MTR was undertaken.

#### Summary of key recommendations for management response

Key issues and		Key Actions	Timeframe	Priority	Responsible Units
				medium, low)	
1.	Focus remaining project time and resources on leveraging maximum impacts towards the project objective	<ul> <li>Carry out re-planning asap with entire project team</li> <li>Develop work plans for each team member remaining project period, taking into account the MTR recommendations on documenting and synthesizing project learning</li> <li>Finalize low-hanging fruits – drop others</li> <li>Reallocate remaining funding as possible</li> </ul>	Immediately until project end in December 2013	High	PCU with INGRH and UNDP
2.	Adjust SRF and LFA (specific indicators and output change); disaggregate indicators for outcome 2 further; include gender dimension	<ul> <li>Update SRF and LFA a proposed</li> <li>Develop data inputs for TE (see below accordingly)</li> </ul>	August 2013	Medium	PMU
3.	Document and synthesize adaptation learning, best practices and policy relevant messaging from project intervention	<ul> <li>For all outcomes document the key learning in detail and for appropriate target groups</li> <li>Synthesis results should inform the commencing CIDA climate change project intervention,</li> <li>Sort all relevant project documentation for Knowledge Management purposes and post on website, possible have a "intra" and an "internet" option to it</li> <li>Document more ALM stories in line with key best practices identified</li> </ul>	Immediately until project end in December 2013	High	PMU, esp. the two TAs; possibly with support from UNDP staff; CIDA project <sup>9</sup> (staff) once it commences
4.	Process project learning and esp. the INIDA report and the technical consultancies into relevant information packages for specific target groups, i.e. technical staff of	<ul> <li>Identify key target groups in need of further support (materials) for adaptation learning from project</li> <li>Develop strategy for material and approach development</li> <li>Specifically develop materials and approach</li> </ul>	Immediately until project end in December 2013	High	PMU, esp. the two TAs; possibly with support from UNDP staff; possibly additional hired staff/consultants (national and international)

<sup>&</sup>lt;sup>9</sup> A dedicated climate change project funded by CIDA will be implemented through UNDP from early 2014. The project is designed to build on this LDCF project and further its impact in the water sector.

Key issues and		Key Actions	Timeframe	Priority	Responsible Units
rec	ommendations			(high,	
	Various Ministrias	for further up contine or d		medium, low)	
	and Municipalities	replication especially by			
	outreach nersonnel	INGRH MAHOT and MDR			
	local communities	Suggested target groups			
		include: technical staff at			
		key ministries, local			
		communities			
5.	Support the Aloe	• Compile a briefing on the	Before December 2013	Low	PMU, esp. TA for
	Vera	commercialization			outcome2 in
	commercialization	opportunities and barriers			partnership with
	opportunity	• Set out a plan of action for			ADEI; possibly
		furthering this approach			national and
		and opportunity			international peer
		Share understanding with			review
		LCs and communities that			
		have been involved with			
6	Dovelop strategy for	Aloe vera planting	Immodiataly ustil	High	DMIL con the two
0.	integrating key	Systematically identify key     mossages for policy lovel	nroject end in	півії	TAs: possibly with
	nroject learning into	intervention stemming	December 2013		support from LINDP
	opportune policy	from project learning	December 2015		staff: CIDA project
	processes	Identify key policy			(staff) once it
	•	opportunities e.g. PEDA			commences
		review 2013; PRSP/DEPRP			
		2016, PENAS – at draft			
		stage up to 2030, new			
		proposed institutional set			
		up in water sector,			
		ongoing Municipal and			
		regional level plans,			
		amongst other			
		Prepare specific briefings			
		for each on relevant			
		learning			
7	Convene another	Based on content analysis	Id good timing for such	High	PMU, INGRH
1	final high-level	develop compelling	a event, possibly		
	decision-makers	briefing programme and	before December		
	event during which	event	vacation – e.g. early		
	the key learning and	Convene event	November		
	policy messages				
1	stemming from the				
	project learning are				
	being shared. Make				
	a splash!	- Developmentation i	Defere restant and	Madium	Comme officer of
8.	invest into website	Develop website concept	Before project end	ivieaium	Comms officer at
	and develop as	as knowledge			PMU staff: wob
	Management huh	Integrate loarning			design
	from project	documented from all the			professionals/
	, p. 1,200	above actions			consultants
1		Develop "archive" of			
1		project documents mostly			
		for "internal" use			
		• No need to brand the site			

Key issues and	Key Actions	Timeframe	Priority (bigb	Responsible Units
recommendations			(nigh, medium low)	
	<ul> <li>as "project", but rather as adaptation learning forum e.g. linked to INGRH website (even if the institutions will likely be restructured) ; look or other opportunities</li> <li>Develop "sustainability" strategy for website management after project end</li> </ul>			
9. Verify VRA methodology, design and conduct final VRA	<ul> <li>Review the two VRAs that were already undertaken</li> <li>Develop one integrated methodology for final replication before TE</li> <li>Design and conduct final VRA</li> </ul>	Towards the end of project e.g. in November 2013	Medium	PMU, esp. two TAs, with relevant national/ international expertise inputs as necessary
10. Prepare for TE	<ul> <li>From an early stage start preparing for TE</li> <li>Prepare the documentation and make available for evaluation team in the most professional manner prior to country assessment</li> </ul>	At end of project	Medium	PMU, esp. National Project Coordinator with UNDP

### **PART 1: Evaluation context**

#### 1.1 Introduction

#### **1.1.1** *Purpose of the evaluation*

This is a scheduled standard mid-term evaluation (MTR) of a UNDP implemented GEF LDCF co-financed project. It is conducted by a team of an international and a national independent evaluator.

The objective of the MTR, as set out in the Terms of Reference (TORs; Annex 1), is to provide an independent analysis of the progress of the project so far.

The MTR aims to:

- identify potential project design problems,
- assess progress towards the achievement of the project objective and outcomes,
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The <u>intended target audience of the evaluation</u> are:

- The project team and decision makers in the INGRH
- The GEF and UNFCCC Operational Focal Points
- The project partners and beneficiaries
- UNDP in Cape Verde as well as the regional and headquarter (HQ) office levels
- The GEF Secretariat.

#### **1.1.2** Key issues addressed

The full scope of the evaluation is set out in the TORs (Annex 1) for this evaluation. A detailed set of questions provided led the evaluation.

The specific key areas assessed include:

- 1. Progress towards Results: project design & progress
- 2. Adaptive management: work planning, finance and co-finance; monitoring systems, risk management and reporting
- 3. Management arrangements

<sup>&</sup>lt;sup>10</sup> PIR 2012

<sup>&</sup>lt;sup>11</sup> PIR 2011 and 2012

#### **1.1.3** Methodology of the evaluation

The MTR is based on the following input elements:

- **Review of available reports:** project document and following adjustments, PIRs, APRs, minutes from Steering Committee meetings, site reports and other M&E instruments, technical reports, consultant reports. A suite of documents were availed to the consultant prior to the field mission and others collected on site.
- Inception report & meeting: at the onset of the field mission the expectations for the final MTR report as well as the MTR process and approach were discussed with UNDP and with the project team.
- Liaison amongst team of consultants: throughout the MTR process close liaison and consultation amongst the team of consultants took place, information was verified and discussed
- Interviews in Praia: interviews with technical focal persons and key informants took place in Praia on 02 and 03 July 2013. The full list of individuals consulted is included in the overall project report included in Annex 2.
- Field visits: on 04 July and from 07 to 10 July 2013 extensive field visits were conducted to all pilot areas/basins and a variety of project interventions (see Annex 2); all "types" of pilot interventions were witnessed at one side or another.
- Meetings with regional and municipal level representatives and Local Committees: Consultations with project partners and beneficiaries too place in Santa Cruz, Tarrafal, Porto Novo and Ribeira Grande (see Annex 2). Individual interviews and group discussions were facilitated.
- Brainstorming and initial feedback meeting at the end of the mission: on the last day of the mission (11 July) a half day meeting with the project team discussed the field visits and discussions and brainstormed jointly the major lessons learned from the project so far, as well as the initial key findings from the MTR.
- **Debriefing with UNDP**: A short feedback discussion on the MTR mission was held at UNDP on 11<sup>th</sup> July 2013 with the Deputy Resident Coordinator.
- **Review of draft report:** key stakeholders i.e. the project implementation team, INGRH, UNDP CO and the UNDP RTA were invited to review the draft MTR report, and to provide editorial comments and clarify issues emerging from it

#### **1.1.4** Structure of the evaluation

The report is presented and structured in three parts.

Part 1: Evaluation context: provides a very short background to the project and its design. More details can be accessed in the project document.

Part 2: Findings: A summary of the findings of the consultations at field site level and at site/basin, but also at the municipal and regional and national levels are provided. Transcripts of relevant consultations are provided in relevant Annexes. The findings are organised by project performance per se and impacts on a more strategic level.

Part 3: Conclusions, recommendations and lessons: Based on the findings practical recommendations are made for addressing through the management response to the MTR. Initial lessons learned are distilled and documented for future elaboration.

#### 1.1.5 Evaluation Team

This evaluation was carried out by **Dr. Juliane Zeidler**. She has lived and worked for 25 years in Africa, working on natural resources management issues. She is a drylands ecologist with wide ranging experience in rural development and has experience in working in Small Island Development States (SIDS). She specialises in developing, implementing and evaluating GEF projects for several focal areas, including for the LDCF.

**Carlos Sousa Monteiro** joined the team as National Consultant. He is working with MDR in a senior management position and supported the mission as indepent expert. He is agronomist with significant experience in rural development in Cape Verde. He was the political GEF focal in Cape Verde and GEF Council member previously.

#### 1.1.6 Ethics

The evaluation follows the UNEG "Ethical Guidelines for Evaluators", and follows international best practice for evaluations.

#### **1.2 Project Description and development context**

The project is based on the priority adaptation option identified in Cape Verde's National Adaptation Programme of Action (NAPA) and is co-funded by the LDCF<sup>12</sup> through GEF, implemented with support from UNDP. The national executing agency is the National Institute for the Management of Water Resources (INGRH).

The impacts of climate change on Cape Verde water resources, particularly on water availability, are predicted to adversely affect human health, agricultural production and food security in both rural and urban areas.

Predicted climate change scenarios are likely to constrain long-term development through:

- (iv) increased frequency and severity of drought;
- (v) increased rainfall variability, including more frequent events of short and intense rains, causing flash-floods in several catchment areas; and
- (vi) progressive sea level rise and salt water intrusion in freshwater reservoirs closer to coastal areas.

This LDCF project was formulated<sup>13</sup> to address the major challenge for Cape Verde to mainstream climate change adaptation measures into integrated water resource management across different institutional, social and spatial frameworks.

The **project goal** is *"to ensure that water availability, supply and quality are maintained in the face of changed climatic conditions"*. This goal is in line with MDG Goal 7, Target 10: Halve, by 2015, the proportion of people without sustainable access to safe drinking water<sup>14</sup>

<sup>&</sup>lt;sup>12</sup> It is noted that since approval of this LDCF project, Cape Verde has moved to become a medium-income country.

<sup>&</sup>lt;sup>13</sup> See project document

<sup>&</sup>lt;sup>14</sup> In line with UNDP/GEF guidance of the Thematic Area 'Water Resources and Quality'.

The **project objective** is "to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde".

Three **outcomes** are expected from the project:

**Outcome 1:** Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.

**Outcome 2:** Small and medium scale climate change adaptation practices for water resource management are demonstrated and implemented in selected hydrographical basins.

**Outcome 3:** Lessons learned and best practices from pilot activities, capacity development initiatives and policy changes are disseminated.

The full LFA for the project is reflected in Table 1.

OUTCOME	OUTPUT
Outcome 1: Climate change risks	Output 1.1 Capacity of relevant agencies to identify and manage climate
and adaptation measures	risks and vulnerability and to plan and implement adaptation measures
integrated into key national	within the water sector increased.
policies, plans and programs for	Output 1.2 Climate change resilient water management plans (including
water resource management	PAGIRH) revised and adopted.
	Output 1.3 Awareness of 'climate risk, vulnerability & adaptation' in the
	water sector among decision-makers and technical officers, NGO players, the
	private sector and the media, farmers and community associations raised
	Output 1.4 Establishment of climate change early warning system for the
	water sector to support national and municipal development planning and
	implementation
Outcome 2: Small and medium	2.1 Drip-irrigation techniques introduced and demonstrated as a climate
scale climate change adaptation	change adaptation measure for water resource management in 5
practices for water resource	hydrographical basins
management are demonstrated	2.2 Water recycling, infiltration and conservation techniques (i.e. nature-
and implemented in selected	based and physical) demonstrated and implemented as climate change
hydrographical basins	adaptation measures for agricultural and human use in 5 hydrographical
	basins.
	2.3 Rehabilitation and monitoring of selected existing water structures
	(reservoirs, terraces, boreholes and dykes) demonstrated as climate change
	adaptation measures in 5 hydrographical basins.
	2.4 Climate change risk management measures adopted by representative
	water distribution facilities in selected areas.
	2.5 The basis for the replication of all site level activities is established.
Outcome 3: Lessons learned and	3.1 National multi-stakeholder forum on climate change resilient best
best practices from pilot activities	practices in IWRM established and operational.
are disseminated and integrated	3.2 Project lessons learnt widely shared
in national plans and policies	3.3 Learning, feedback and adaptive management are ensured.

**Table 1:** LFA for project. Source: Project document.

The project focuses on project sites on Santiago and St. Antão islands, where a suite of adaptation practices are being piloted, as follows:

#### Santiago

- 1) Tarrafal, Municipality of Tarrafal, approximately 23,000 habitants
- 2) Ribeira Seca, and Municipality of Santa Cruz 29,500 habitants

#### Santo Antão

- 3) Planalto Leste Área do Planalto
- 4) Ribeira Grande, Municipality of Ribeira Grande. Approx. 10,000 habitants
- 5) Ribeira da Garça, Municipality of Porto Novo approx. 2,000 habitants



Figures 1 & 2: Santiago island and St. Antão, with the indicated project intervention areas

The initial project implementation was intended to run over four (4) years, starting in 2010 with the hiring of key staff. The Inception workshop for the project took place in April 2011<sup>15</sup>. During the Inception workshop various changes and further details to the project design were agreed to, mostly in terms of further detailing the Strategic Results Framework (SRF) with indicators, targets and baseline values.

Further revisions of the SRF were proposed in the PIR of 2012 and by the Technical Steering Committee, which recommended the revision of several indicators and targets in November 2012. Relevant recommendations are included in Part 3 of the MTR report.

<sup>&</sup>lt;sup>15</sup> Inception workshop report, dated June 2011

#### **PART 2: Findings**

#### 2.1 Progress towards Results

#### 2.2.1 Project design

#### Key review areas as per TOR

- Review the problem addressed by the project and the underlying assumption. Review the effect of any incorrect assumptions made by the project. Identify new assumptions (if necessary)
- Assess whether the project design is clear, logical and commensurate with time and resources available;
- Review the relevance of the project strategy and assess whether it provides the most effective route towards expected/intended results.
- Review how the project addresses country priorities.
- Review the baseline data included in the project results framework and suggest revisions as necessary.
- Review indicators and target reformulation suggested on the PIR (Project Implementation Review) 2012 and reviewed by governing bodies and propose improved formulation if needed.

#### Problem addressed and country priorities

The project design focuses on building adaptive capacity to anticipated and immediate climate risks in the water sector in Cape Verde. Considering that water availability and quality remain amongst the key environmental threats to sustainable living and development in Cape Verde the project addresses top priorities of the country, in line with a variety of national policies. Although Cape Verde is no longer classified as a LDC, the adaptation prioritisation of needs and planning set out in the NAPA document dated 2007 remain relevant and this project addresses key priorities set out in it.

In terms of more detailed design, reflected by the LFA and the SRF, it is noted that climate risks in the water sector have been strongly linked to piloting adaptation solutions in the following areas<sup>16</sup>,<sup>17</sup>:

- 1. Food security and agricultural production
  - a. improved irrigation technologies and practices esp. outside of the rainfed production seasons
  - b. climate resilient crop diversification
- 2. Soil & water conservation esp. replenishment of underground water reservoirs
  - a. Nature based adaptation measures
  - b. Technological solutions for water capture (run off) and retention
  - c. Solutions for salinization of water and soils and sea water intrusion
- 3. Improved water usage
  - a. Awareness about water wastage and solutions for wise water use
  - b. Water recycling technologies improved and furthered

It needs to be highlighted that irrigation is the sector with by far the largest water usage<sup>18</sup> (Figures 3 & 4) in Cape Verde. Considering that Cape Verde is a Small Island Development State (SIDS), food production is of particular importance, with food importation a complex challenge. Thus the relationship between

<sup>&</sup>lt;sup>16</sup> Adapted from the project document and updated in the context of observed implementation during the field visits

<sup>&</sup>lt;sup>17</sup> A resounding comment made in the various interviews and consultations was that the "adaptation innovations" promoted are already being implemented in Cape Verde as business as usual" for many years and lack additionality value

<sup>&</sup>lt;sup>18</sup> See report from Bhawan Singh, July 2012

water availability and quality, current and future climate risks and food production is of particular importance.



**Figure 3 & 4:** Water usage on Santiago and Santo Antão respectively. Based on technical consultancy report by Bhawan Singh, dated July 2012

The project design foresees significant investments in climate proofing the water sector, promoting a strategy of building awareness and adaptive capacities on a technical level.

#### Assumptions

Three assumptions were formulated at time of project formulation, underlying the project design<sup>19</sup>:

- 1. Baseline conditions in the selected areas can be extrapolated with high confidence level to other Cape Verde areas and lessons learnt can be successfully disseminated.
- 2. Increased awareness and capacity will lead to a change in behaviour with respect to climate risk mainstreaming into relevant 'governance frameworks', particularly as it relates to water.
- 3. Climate change adaptation measures will gradually become a national priority for the water sector as knowledge and information is made available.

Comments on these assumptions at time of MTR are as follows:

Assumption 1: It is found that the baseline conditions in the pilot basins are comparable to other basins in Cape Verde, including from perspective such as political, management, cultural and environmental. Consequently the adaptation learning stemming from the demonstration activities under outcomes 1 and 2 can be applied, upscaled and replicated widely. However, the assumption that lessons learnt can be successfully disseminated seems disconnected. Dissemination requires resources that go well beyond a fact that lessons learnt might be applicable. In fact at this point a major weakness of the project is that good adaptation learning from the demonstrations at site level and through the policy and capacity building components under outcome 1 are not well documented and analysed, as well as not disseminated in a strategic and targeted manner. At time of the MTR only limited financial resources remain to focus on such priorities and the limited remaining project implementation time may not suffice to achieve significant dissemination.

<sup>&</sup>lt;sup>19</sup> See prodoc (ENGLISH), p. 33

Assumption 2: The assumption is generally acceptable. However, the caveat is to actually achieve increased awareness and capacity. The quality of training, awareness raising and professional updating interventions significantly affects the level of impact. Influencing policy needs to be specifically addressed and relevant strategies are needed to achieve a meaningful input into policy improvements – based on a systematic input from practical and "working" demonstrations.

*Assumption 3*: Making knowledge and information available is not sufficient to influence decisionmaking, unless major investments into the "HOW TO" are made. Clear decision-support tools are needed to aide changed decision-making. Additionally it is a false assumption that producing information and knowledge alone will lead to change. For example, reportedly a major obstacle to adopting some of the measures promoted such as drip irrigation over the past 30 years has been the high cost of inputs to local farmers<sup>20</sup> – availing such inputs through a donor supported project does not necessarily address the key barriers that would lead to broader adoption of such measures.

The three assumptions made are critical, and may have led to a major deficit observed in the project at time of MTR – which is a lack of synthesis and strategic dissemination of adaptation learning stemming from the good pilot interventions. Recommendations for corrective measures in this regard are included in Part 3 of the report, and focus, in a nutshell on directing the remaining project implementation time and financial resources to systematically documenting and synthesising the adaptation learning from the project, as well as strategising relevant policy level entry points for injecting such learning into policy and decision-making processes.

Due to the very short remaining project implementation time no new assumptions are formulated at this point.

An additional note is that several interviewees during the MTR mentioned that the project design was too ambitious for the budget volume available. Especially the on the ground interventions under outcome 2 were elaborate and costly. Outcome 3 was considered "underfunded".

#### Effectiveness of project strategy (incl. LFA and SRF)

The project strategy set out in the project document seems technically sound, although some critical barriers to longterm adoption of adaptation measures were not considered (i.e. cost-effectiveness and affordability for local farmers). Additionally, the assumptions made regarding adaptation learning (see previous section), which led to a under resourcing and limited prioritisation of such aspects, were observed. Existing good practices from Integrated Water Resources Management (IWRM) in Cape Verde, such as working more closely with water management boards that have been set up to design water management plans and tariff structures were not included into the design at planning stage – or later<sup>21</sup>.

Several interviewees indicated that they found that too many intervention sites were selected, and that the investments available per site were too limited to show a significant impact<sup>22</sup>. Considering that this

<sup>&</sup>lt;sup>20</sup> Comments made at meeting with INIDA and by UNDP

<sup>&</sup>lt;sup>21</sup> Comment by UNDP

<sup>&</sup>lt;sup>22</sup> Comments made during LC meeting Santa Cruz, 4 July 2013

was a first NAPA response project in Cape Verde, the in the design chosen approach to test and demonstrate climate risks and related adaptation measures seems valid and useful, although the novelness and adaptation additionality were questioned by several interviewees<sup>23</sup>. It emerges from the MTR that numerous interesting lessons learnt can be deducted from this project, which can indeed enrich not only climate resilient decision making in the water sector, but climate resilience planning and action in many other sectors.

One element that seemed critically absent from the design is to try to fill the gap of evidence based ground water management . Several baseline studies are available and these are used e.g. by INGHR for decision-making<sup>24</sup>, but it is clear that an improved knowledge base would be useful.

Very limited data is being used and generated in the project relating to ground water recharge and dynamics. Adaptation measures are being piloted and promoted that only have qualitatively observed impacts on water conservation, and mostly demonstrate improvements on livelihoods e.g. through improved food security and incomes – but not necessarily demonstrate climate resilient water management. For example, promoting drip irrigation throughout the year in marginal<sup>25</sup> areas, and developing new water sources, are understandable from a human development perspective and the need of Government to deliver to its people. However, if it will be sustainable to promote such developments as a national development policy from a water perspective remains questionable. At the time of the MTR no staff member or interviewee was able to refer to any ground water map or research that would clearly identify the potentials of aquifers and basins, nor the hydro-geological dynamics underlying them. There is an absence of rainfall and water dynamic monitoring and raingauges and hydrological weirs are, for example, largely absent.

Although it is recognised that such absence of information cannot hold back decision-making, it seems critical to advise the relevant water authorities to invest in such research as a matter of urgency – considering the vulnerability of the water sector already – and more so in the future.

#### Recommended changes to SRF (indicator and targets) and LFA (outputs)

The SRF and its indicator and reporting framework were developed prior to the development of the AMAT. The SRF set out in the project document was incomplete and further elaborated at the inception meeting in April 2011.

In the PIR 2012 and reports from the TC held in November 2012 specific changes to the indicators framework were suggested as follows (Box 1).

Jica (1999), Estudo sobre Desenvolvimento agua subterrânea na ilha de Santiago, INGRH.

<sup>&</sup>lt;sup>23</sup> Comment by UNDP, with additional references from MDR in Ribeira Grande.

<sup>&</sup>lt;sup>24</sup> Barry et al (1999), Plano de Gestão da Bacia Hidrografica Ribeira seca.

FernandPoulé, Dennis (1975), Project CVI/75/001, financiado pelo PNUD/UNDTCD.

INGRH (1992), Plano Director dos Recursos Hidricos, PNUD/ONUDDES.

<sup>&</sup>lt;sup>25</sup> Marginal is defined as "Areas that are unable to support permanent or intensive agriculture without significant investment in land or water management. Without proper management, ecologically fragile marginal lands may degrade quickly following cultivation." In line with the UNCCD (<u>www.unccd.int</u>). It is noted that the project team indicated that the selected sites where mostly situated in "agricultural viable" areas.

#### Box 1: Agreed SRF/indicator revisions

**OLD Objective indicator 2:** Percentage of Ministry of Environment, Habitat and Territorial Planning (MAHOT) budget allocated to managing climate change risks.

**Revised Objective indicator 2:** Percentage of state budget allocated to managing climate change risks.

#### **OLD Outcome 2 indicators:**

**OLD Indicator 1:** Within project target sites, increases in:

(1) cropland surface area where water saving measures are adopted; and

(2) number of families involved in water conservation measures Increase in the surface area and numbers of families involved in water preserving initiatives in the target areas of the project

**OLD Indicator 2:** Increase in the surface area and numbers of families involved in water preserving initiatives in the target areas of the project

#### **Revised:**

**NEW Indicator 1:** Cropland surface area under micro-irrigation and water conservation increased by 50% at project sites.

**NEW Indicator 2:** Number of households involved in mirco-irrigation and water conservation increased by 30% at project sites.

The revised indicators/targets were proposed by the project team, recommended for approval by the TC, and endorsed as part of the MTR. Relevant baseline values are accessible from the project team.

No new indicators for outcome 1 or 3 were formally recommended by the project team.

#### A suggested new and additional indicator for outcome 3 is:

A clear communication strategy targeting the dissemination of the finally synthesised project lessons and adaptation learning to key target groups (a. Local communities/beneficiaries; b. Technical personnel of partner institutions at regional level (ministerial extension officers, local committee members a.o.), and c. Technocrats at national level and d. Policy makers at national level) developed and implemented. Additionally it was proposed to change the formulation of outputs 1.4, 2.1 and 2.1 as indicated in Box 2.

Box 2: Agreed reformulations of outputs, as proposed in PIR 2012

**Output 1.4:** Establishment of climate change observatory network for the water sector to support national and municipal development planning and implementation

**Output 2.1:** Water efficiency techniques introduced and demonstrated as a climate change adaptation measure for water resource management in 5 hydrographical basins.

**Notes on Output 2.1:** Formulation needs to be revised to be more comprehensive. The INGRH through the project has signed an agreement with INIDA to conduct applied research to monitor not only selected existing water structures – as the current output reads – but also to monitor performance of the different drip irrigations materials, and the water demands of crops depending on soil composition and season (crop-water production index).

*Current reading:* 2.1 Drip-irrigation techniques introduced and demonstrated as a climate change adaptation measure for water resource management in 5 hydrographical basins

**Proposed text:** Drip-irrigation techniques introduced and demonstrated as a climate change adaptation measure for water resource management in 5 hydrographical basins, monitoring water uses and structures, performance of the different drip irrigations materials, and the water demands of crops depending on soil composition and season (crop-water production index), amongst other.

These proposals were discussed at time of MTR with the Project team and UNDP CO and are recommended by the MTR.

The remaining chosen indicators and baseline values seem fine at MTR, whilst sources of information were more diverse. It must be noted that reports on most indicators were not prepared at time of MTR as foreseen in the SRF, but should be for the TE. Relevant recommendations are included in Part 3.

#### 2.1.2 Progress

#### Key review areas from TOR:

- Assess the scope, quality and significance of the projects outputs produced to date in relation to expected results
- Assess the outputs and progress toward outcomes achieve so far and the contribution to attaining the overall objective of the project.
- Conduct an evaluation of project performance in relation to the indicators, assumptions and risks specified in the logical framework matrix and the project document
- Identification and, to the extent possible, quantification of any additional benefits, impacts resulting from project implementation beyond those specified in the project document;
- A qualified assessment of the extent to which project outputs to data have scientific credibility;
- An assessment of the extent to which scientific and technical information and knowledge have influenced the execution of the project activities;
- Examine if progress so far has led to, or could in the future catalyse, beneficial development effects (i.e. income generation, gender equality and women's empowerment, improved governance etc...) that should be included in the project results framework and monitored on an annual basis.
- Examine whether progress so far has led to, or could in the future lead to, potentially adverse environmental and/or social impacts/risks that could threaten the sustainability of the project outcomes. Are these risks being managed, mitigated, minimized or offset? Suggest mitigation measures as needed.
- Review the extent to which the implementation of the project has been inclusive of relevant stakeholders and to which it has been able to create collaboration between different partners. Identify opportunities for stronger substantive partnerships.
- An analysis of the extent of cooperation on engendered and synergy created by the project in each of its component activities;
- A prognosis of the degree to which the overall objectives and expected outcomes of the project are likely to be met;

#### Attainment of objectives/results (LFA and SRF)

The performance of the project implementation against the LFA and SFR are presented in Annexes 4 and 5, respectively. The information has been synthesised from the PIRs 2011 and 2012, as well as furthered from team and partner discussions during the field mission to Cape Verde, various other reports and personal observations during the site visits.

Overall, performance on the output level seems satisfactory and comprehensive. From the annual work plans some questions arise on decisions on approved activities, which seem not to make strategic contributions to the overall objective of the project. It appears that the detailed planning of activities sometimes - or largely – lost the overall strategic focus of the project intention as set out in the project design.

It can be said that the project team addressed and implemented the LFA and SRF quite literally, however, sometimes missing opportunities for generating strategic impacts through more adaptive management.

As such, many detailed activities have been implemented under outcome 1, which do make a significant contribution to the set outcome, but do not necessarily lead to improving climate change resilience of the water sector on a higher level. For example, activities such as awareness campaigns geared at the school learners' level are generally commendable, and make a contributions to building climate change resilience. In the context of the project, such activities were taken up opportunistically to respond to the willingness of the Ministry of Education representatives to get involved in climate change work, especially on the decentralised level. However, in terms of focusing on the key impacts intended under outcome 1, such efforts seem to add relatively less in comparison to other priorities. As such it is recommended to now plan strategic "outreach and policy influencing" activities that more concretely communicate the adaptation learning from the project at the project end.

Specific technical consultancies were conducted as part of the project<sup>26</sup>, however, the key learning emerges from the demonstration activities under outcome 2. Whilst the budget for activities under outcome 1 is fully exhausted (Table 1) many major activities that would make a significant contribution to climate change proofing the policies of the water sector in Cape Verde should be designed and implemented now, where tangible results are forthcoming from the specific site demonstrations (see sections 3.3 and 3.4).

The activities implemented under outcome 1 so far have paved the way for further engagement, but it is important that the project fully capitalises now on the opportunities set out and now starts injecting the adaptation learning from outcome 2 in a meaningful manner for key target groups (see sections 3.3 and 3.4). It is critical to focus activities and prioritise the most strategic remaining interventions under this outcome – which may also lead to the dropping of already pre-programmed activities that strategically add little to the overall intended project results. It is realised that many expectations have been raised, and that the enthusiasm of e.g. the education and health practitioners especially at the site level may be fantastic, so some well balanced decisions may have to be taken, but it is critical at this point of project implementation to focus the remaining project time and resources on the essential strategic aspects to ensure that the major project objective is being met.

Contributing to outcome 2, also a great number of activitieve has been implemented under the various project outputs. A multitude of lessons learnt and best practices can be deducted from the already made investments – and must be documented as a matter of urgency. The adaptation learning needs to be systematically analysed and synthesised to form the foundation for informing remaining outcome 1 activities now. Linked to outcome 3 – which is terribly under-resourced in all aspects and seemingly also undervalued – lessons learnt must be documented – not only to contribute to ALM, but more importantly to produce targeted information and learning materials for specifically identified and targeted stakeholders in Cape Verde. For example, what have we learned that is relevant for Cape Verde's water sector policy makers? For MDR? For water and agricultural systems technicians and outreach personnel? For local communities? What type of materials and capacity building approaches are needed to ensure that the adaptation learning is integrated systematically into decision-making at the local, municipal, regional and national levels? How do we ensure that the learning from this project will be integrated systematically into future climate change planning by DGA?

<sup>&</sup>lt;sup>26</sup> Ferreira T.C., (2012). Projecto de reforço das Capacidades de Adaptação e Resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde". (Relatorio de consultoria a Cabo Verde Fase II) Praia: Cape Verde Singh B., (2012). Análise e Seguimento de Dados Sobre Mudanças Climáticas. (Draft do Relatório)

Instead of investing human resources, time and money into setting up more demonstrations (of the same kind) to fulfil community and government expectations, the project should probably better use its resources to ensure that the adaptation learning will be further used and applied to build resilience in the water sector. Site specific interventions can be better implemented by MDR "we have much more resources to have a real impact on site"<sup>27</sup>. This seems to be a key concern about the project – mentioned at various times. As the water sector has been a key concern in Cape Verde, with prolongued dry spells and droughts – and observed longerterm climatic changes mostly seen as reduction in rainfall – reported by numerous interviewees at village and regional decision-making levels, auto-adaptation in the water sector has already taken place. Demonstrating the novelness of this specific project and the adaptation interventions advocated therefore has been a challenge. It is not clear in how far the expected climate risks would be addressed by rolling out these levels of "adaptation" more widely.

Of course each community member, whose adaptive capacity is raised by this project, is valuable, but from a strategic point of view the remaining resources should be spent on capitalising on the learning from the demonstrations and how to ensure this learning finds a way into larger scale application – or the final impact of the project remains marginal. It can be considered in how far the CIDA financed and UNDP supported climate change project, foreseen to commence in early 2014 could be strategically used to support some of this synthesis work beyond the LDCF project horizon.

Assessing achievements in the context of the SRF at MTR (Annex 5) was difficult, as a number of key inputs for such an assessment were not accessible. For example, although it was stated in the PIR 2011 and in other project reports that reviews of key policy documents in terms of climate resilience in the water sector were submitted, few of these submissions were actually finalised and available at time of MTR. Although verbal briefings on the work under outcome 1 were made during the MTR by the relevant project staff, no formal annexes to the said policy instruments were seen. In certain cases it was mentioned by project staff that policies are still under review and that contributions will be made when opportune.

Data on budget spending for climate change and especially adaptation was accessed in a raw format, however, the difficulty is to relate these budget allocations back to impacts the project has had. This indicator seems to be a poor tracking tool for project performance.

A VRA was conducted in 2011 to establish a baseline in selected communities. It was found that the methodology was difficult to apply and a considerable effort has been put into refining it. The SRF foresaw a repeat of the initial VRA before the MTR, however, at time of the MTR no comparative set of VRAs was available. Due to the high costs of undertaking the VRA it was recommended by UNDP that only an end-of project assessment be undertaken<sup>28</sup>. The project plans a final VRA before the end of the project.

Recommendations regarding a final VRA for preparation of the TE are included in part 3, as there seem to be design and methodological problem areas with the previous VRAs undertaken. The project team reported difficulties in systematically applying VRA as a tool, and requested further technical support in developing a strong methodology and final report.

<sup>&</sup>lt;sup>27</sup> Comment made by MDR at LC meeting in Ribeira Grande

<sup>&</sup>lt;sup>28</sup> Pers. Comm. Project Coordinaotr, 22 August 2013.

Under outcome 2 a revision of the indicators and targets has been proposed (see above). Overall, some good initial tracking information is available<sup>29</sup>. The available information could be used to build a stronger SRF for the TE.

The two indicators for outcome 3 are quite basic and once again illustrate the limited effort paid to actually generating knowledge and communications impacts already clear from the project design. Three ALM stories were submitted by the project (two already published, one forthcoming<sup>30</sup>), but generally it is questioned what the impact is, especially for Cape Verdian target groups, as the stories were only published on the international UNDP website in English. No specific place for publishing the stories on a national or project site was developed and and the stories were not translated into Portuguese. No website was produced by the project to date, apparently as INGRH had no own site up to July 2013<sup>31</sup>. The project team indicated that a website will still be produced and a clear design serving the dissemination of important project and adaptation learning will be promoted. The website will be linked or integrated into the newly launched website of INGHR at <u>www.ingrh.cv</u> (July 2013). Other more relevant indicators relating to this outcome could be considered, focusing on the local or regional level impacts of the project interventions, however were not formalised during the MTR.

# Additional benefits, impacts resulting from project implementation (incl. gender equality, women's' empowerment, income generation, improved governance)

Benefits arising from the project beyond those primarily foreseen are quite manifold. Related to the great diversity of lessons learnt and best practices that can potentially be documented from the intervention (see details in part 3) – as identified in a joint work session with the project team – point to benefits such as:

- Best practices in terms of extension service outreach: demonstrated through the project is that through good extension service support i.e. with financial, but also technical resources, strong impacts on the community level can be reached. Revitalizing an outreach approach that was functional in the past, the project mobilized visible on the ground actions.
- Supporting community associations: working through established community associations, not only were local level governance structures supported, but the income levels and technical know-how for such associations were improved. A high degree of ownership not only of the established infrastructure, but also the technical context i.e. on climate risk and adaptation was evident in the local level site visits and community conversations.
- Although gender was not a primary focus of the project as per design, specific women empowerment considerations were evident especially, but not only at the level of site interventions. Specific community activities were implemented by women, e.g. the green house (estufa) in Tarrafal was managed and owned by a women's group, many associations worked with were led by women and specifically were women's associations, beneficiaries selection included a gender empowerment element, to name just a few examples. It is noted that generally the presence of women in management and technical implementation of the project, in the local committees, on the site level and in most partner institutions was high and well empowered.
- Several other lessons learnt and best practices documented in part 3 of this report could be added under this section.

 <sup>&</sup>lt;sup>29</sup> The project team developed "fact sheets" for the project sites prior to the MTR. These are available from the project office.
 <sup>30</sup>See <u>http://undp-alm.org/projects/ldcf-building-adaptive-capacity-and-resilience-climate-change-water-sector-cape-verde/expected-key-results</u>

<sup>&</sup>lt;sup>31</sup> www.ingrh.cv, launched in July 2013

#### Science knowledge application

The project design did incorporate technical background vested in local and international science knowledge. However, it was mentioned by interviewees that they felt that more significant adaptation measures for the water sector could have been selected – amongst other – if a better science knowledge had been established already at project design.

The demonstrations proposed implemented under outcome 2 of the project, can be seen to be informed by science knowledge, although the foreseen monitoring of adaptation impacts was unfortunately not carried though for all implemented demonstrations<sup>32</sup>. A specific project effort went into developing an innovative and detailed research programme for the greenhouse or Estufa pilot. A collaboration with INIDA was established, and the project staff and INIDA put a great effort into engaging the community in "on-site" action research for this demonstration.

However, the research conducted to guide decision-making on the finally selected demonstrations per demonstration site was not available at time of MTR, which may be a knowledge management problem or a sign that such research was not in fact carried out, beyond the greenhouse pilot.

The work arrangement with INIDA<sup>33</sup> for documenting and tracking innovations and modifications i.e. in the context of the established irrigation systems specifically aimed to improve science knowledge in terms of reducing water usage, and improving agricultural returns per water used. The installation of a water recycling and treatment arrangement for irrigation purposes in Santa Cruz also followed a science input and learning approach, for example.

Using Aloe Vera as key species for soil and water conservation, reportedly was recommended based on research conducted in Cape Verde previously, indicating the beneficial impacts the planting of this Aloe can have – a long standing practice on the islands. Specific research further action research on this aspect could be useful, as little is understood about the real magnitude of soil and water conservation impacts that the planting of many kilometers of Aloe Vera bound lines would have. Interviewees pointed out that they would have liked to also see research into the commercialisation potential of the Aloe Vera in Cape Verde, e.g. for international cosmetics markets. Overall the project tapped on some science knowledge, and contributed to better understanding of specific aspects such as on irrigation innovations – but it is clear that there is a lot more room for further investigative research, i.e. on the adaptation demonstrations selected in this project.

Overall, much of the decision making in the project as well as the information disseminated to target groups under outcome 1 seemed to be based to a large extend on rather generalist climate change information. Limited processing of evidence that emerged through the project's own demonstrations seemed included in the various training materials<sup>34</sup>. This is of course a general caveat – as demonstration under outcome 2 were implemented in parallel to the training and awareness raising efforts. However, towards project end it seems to be important to ensure that a strong strategy be developed that now synthesizes the knowledge acquired and to develop a targeted dissemination

<sup>&</sup>lt;sup>32</sup> According to UNDP tools to monitor impact were proposed to the project team, including the establishment of a baseline situation prior to site interventions.

<sup>&</sup>lt;sup>33</sup> See MoU with INIDA

<sup>&</sup>lt;sup>34</sup> A suite of Powerpoint Presentations used for Training of Trainers, community and technician briefings were availed and reviewed by the MTR team.

strategy. Several opportunities for this exist, one through the extension personnel of the extension services strongly involved in project implementation at the local level, and the other through a follow-up climate change risk management project that will be funded by CIDA (Canada) from next year<sup>35</sup>.

Two technical consultancies that were commissioned by the project (see above) produced or summarized some level of science information – however, there was limited evidence that this information is being used and applied in the project context.

It should be said that a resounding criticism voiced on the project was "but where are the specific climate change adaptation innovations"? Several interviewees pointed out that the project demonstrations implement practices in the water management sector that are being applied in Cape Verde for more than 30 years. Considering that the project objective is "to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde", some of the interviewees found that the additionality aspect was not addressed. This indicates that even if science knowledge has been applied and furthered in the climate change adaptation context – this is not necessarily evident to project partners and target groups.

As already indicated above, the absence of sound hydrogeological data and information on the basin level (or more generally) is a national problem, although INGHR is working with the best information available at this time. Without a sound understanding of the water cycles as well as water availability and quality throughout the basin, the promotion of water source development and rehabilitation, for example, can be maladaptive. Assisting rural communities to improve their living conditions through investments in more advanced agricultural practices and technologies in very marginal areas may be noble – but in the absence of sound background knowledge may well prove to be unsustainable – on site, or due to lower catchment impacts and other.

Limited science knowledge in terms of adult learning, communication sciences, policy processes and impacts, as well as related disciplines are documented formally, although it is clear that such have been formally integrated into the project execution. For example, no comprehensive capacity development plan or strategy were accessible for review, although strong evidence of many trainings and awareness raising activities conducted was provided. The project team indicates that a strong peer review and inputs into this work were solicited nationally and internationally<sup>36</sup>. However, this issue is generally raised – as during project design the "science" knowledge surrounding capacity development, adult learning, policy influencing was not embraced comprehensively (see commentary under the "assumptions" made.

It is noted that no specific policy influencing strategy to identify key entry points for climate change risk and adaptation mainstreaming, e.g. on important planning processes and levels (DECRP III; land use planning/ spatial planning) or in some important institutional sector reforms or legislative revisions (revision of the Environmental Impact Assessment legislation) – all of which took place during the project lifetime. Now, towards project end, there is a good opportunity to formally identify where the adaptation and project learning emerging towards the end of the project can be injected in future.

 <sup>&</sup>lt;sup>35</sup> A CIDA funded climate change adaptation intervention that will be implemented through UNDP, potentially by the same project management structures established by this project.
 <sup>36</sup> It is recognized that the MTR visit was organized with a strong focus on site visits, documenting results under outcome 2.

<sup>&</sup>lt;sup>36</sup> It is recognized that the MTR visit was organized with a strong focus on site visits, documenting results under outcome 2. Limited time was planned for more specifically interviewing experts that supported specific policy, capacity development and outreach related "science" and knowledge. The TE could specifically focus on distilling additional best practices in this regard.

## Potentially adverse environmental and/or social impacts/risks that could threaten the sustainability of the project outcomes

The lack of water related background information is considered an environmental risk that could lead to the promotion of maladaptive practices. It is recognised that – in absence of such information – still decision making and adaptation learning need to take place. However, decision makers must realise the risks that come with this. The project has implemented a number of ground water improvement technologies such as the installation of check dams to promote rain water run-off infiltration, planting of Aloe Vera and building and rehabilitation of contour bound lines for soil and water conservation on hill slopes, to name just a few. Such practices are considered as positive and to have limited or no adverse impacts.

However, environmental risks had been identified to the building of the check dams themselves by a Civil Engineering Lab (LEC) noting that no soil/ slope stability studies were undertaken before the check dam constructions. The risk of landslides or flash floods destroying such newly built infrastructure had not been assessed for any of the project investments.

A risk that could be categorised as "social" is that the investment costs for the replication of some of the innovations is too high for many farmers. Although there were cases where local farmers started replicating e.g. water-saving irrigation practices and the building of greenhouses, it was indicated that limited functional access to credits and other rural finance options existed that would make it possible for greater numbers of farmers to take up innovations on their own<sup>37</sup>. This topic will be further elaborated under "sustainability" and "replication", below.

#### Partnerships and stakeholder involvement

A great number of partners are involved in the implementation of the project, and the set up governance structure seems to promote participation and stakeholder involvement especially on the site level. Many interviewees mentioned that they had been beneficiaries of trainings, training of trainer approaches, , awareness activities and consultative processes.

The established Local Committees and partnerships with the relevant Municipalities seem to be particularly strong. Although the strength of the Local Committees varied amongst sites during the site visits, generally they seemed to have been actively involved in project implementation, as well as the understanding of the climate risk context i.e. in the water sector could be gauged.

Working with established community associations provided a good entry point for lasting engagement by such structures in the planning and implementation of adaptation measures, and generally local level stakeholder involvement at the demonstration sites was positive. Selection criteria<sup>38</sup> of beneficiaries are in place. The communities visited did not voice any adversity about beneficiary selection. However, it is recognised that the briefness of the assessment and site visit may not have divulged any negative impacts that may have been created in this regard.

<sup>&</sup>lt;sup>37</sup> It is noted that organisations and institutions such as MORABI, OMCV, SoL di Fogo OSAIS, CBA exist, however lack of accessibility to finance was still mentioned as a key barrier by several interviewees. . <sup>38</sup> It was mentioned in the consultations that the MDR representative on the Steering Committee criticized the selection criteria,

<sup>&</sup>lt;sup>38</sup> It was mentioned in the consultations that the MDR representative on the Steering Committee criticized the selection criteria, as they did not conform with the Ministries' directive that beneficiaries must provide cahs co-financing to ensure sustainability and ownership, amongst other.

On the national level the partnership arrangements could be improved. Measuring by the limited number of Steering Committee (SC) and Technical Committee (TC) meetings, during the past three years only two SC<sup>39</sup> and three TC<sup>40</sup> meetings took place, a much larger effect could be made by the project to engage stakeholders at that level. Limited work relationships with other major climate change related processes such as the preparation of the Third National Communication (TNC) and Water Sector institutional reform could be strengthened to ensure that this project makes relevant policy level contributions based on its best practices and lessons learnt. Having the project housed at INGRH – an institution that after a restructuring later this year will not be in place as such any longer – will require a strategic association with other and also newly established partners to retain visibility and absorption of results.

It is noted that the project has established three distinct Memoranda of Understanding (MoUs) with partner organisations (INIDA, INMG and Radio Educativa) for delivery of key project outputs and activities. Such an arrangement clearly creates ownership and responsibility for execution. However, at the same time – if not closely tracked and accompanied by the project team – delivery may not be responsive to the project vision and intention.

#### 2.2 Adaptive management

#### 2.2.1 Work Planning

#### Key review areas from TOR:

a) Analyse adaptive management and result-based focus in project implementation and adherence to the governance structure. Assess to what point work planning processes are result-based? If not, suggest ways to re-orientate work planning to focus on results.

b) Examine the use of the project document logical/results framework as a management tool and review any changes made to it since project start. Ensure any revisions meet UNDP-GEF

requirements and assess the impacts of the revised approach on project management.

c) Identify any programmatic and financial variance and/or adjustments made during the first three years of the project and an assessment of their conformity with decisions of the Project governing bodies and their appropriateness in terms of overall objectives of the project;

d) Provide recommendations regarding any necessary corrections and adjustments to the overall project work plan and timetable for the purpose of enhancing the achievement of project objectives and outcomes

According to the consultations with the project team, no major adjustments were made to the project LFA during the implementation over the past years. The team reported that they focused strictly on the implementation of the activities outlined in the project document, underpinning the achievements of the set out outputs and objectives. Annual workplans have been developed based on team meetings and joint planning. In the absence of the project leader (initially a CTA was hired, and a national

<sup>&</sup>lt;sup>39</sup> SC meetings: June 2011, 07 January 2013

<sup>&</sup>lt;sup>40</sup>TC meetings: 27 June 2011, 15 November 2011 and 21 November 2012

coordinator, but both positions were vacated for different reasons, see below) planning took place, although, reportedly<sup>41</sup>, with lack of strategic guidance on priority setting.

One formal revision to the LFA was recommended i.e of the PIR 2012, such a the reformulation of output 1.4 and a reprogramming of related activities – with the limited funding available it was found that it was not possible to set up a fully functional EWS for the water sector, but rather that the overall climate observatory system managed by INMG would be improved. This output is mostly "outsourced" to the Met Office (INMG) and a MOU is in place<sup>42</sup>.

Other refocusing of the SRF but not the LFA is documented through various planning and reporting tools such as TC reports and PIRs.

It should be noted that a poor translation of the English project document into Portuguese was cited as a source of variances in the priority setting and activity implementation. This is a recurring problem where project documents are being translated to and fro e.g. into French and Portuguese, amongst other – and tangible solutions need to be found.

In terms of activities implemented and programmed for the remaining portion of 2013, there is concern that priorities set are not always strategic and responding to the most critical needs to achieve a climate proofing of the water sector in Cape Verde, as highlighted in the MTR. As indicated in various sections of this report, there is a real need to ensure that the innovative adaptation learning stemming from the pilot activities will be integrated into policy processes that matter. At this point the annual plan for 2013 does not strongly reflect this need; neither do resource allocations for the remaining project period. Recommendations for adjusting the work plan for the remaining project implementation period are included in part 3.

The project reporting by individual staff across the project implementation period seemed limited across the full project implementation period, and few individual progress reports on implementation were available for review. Although the project work plan for 2013 is quite impressive, plans from the previous years were not always accessible. Work plans of individual team members were not necessarily checked against a clear M&E framework and performance contracts, and results based planning was thus not always guaranteed<sup>43</sup>.

It is noted that the current project team displayed a strong resistance to advisory discussions during the execution of the MTE. In triangulations with project oversight staff at UNDP this problem was flagged to be a recurring issue, which impacts on project performance. Collaboration, and responsiveness to management and technical advice are key success factors which should be considered in the planning of the new CIDA intervention.

<sup>&</sup>lt;sup>41</sup> Interviews with UNDP staff at Country Office and internationally.

<sup>&</sup>lt;sup>42</sup> A review of the MoU, and discussions with the project team and UNDP staff pointed to the fact that the MoU was limited in its scope. It mostly set out the role of INMG in setting up the weather stations, but did not further specify how the collected data should be used, which analysis could and should be produced to provide e.g. water sector relevant climate information, and who the end-users of such data and information should be.

<sup>&</sup>lt;sup>43</sup> Comments from the project team on the draft MTR report indicated that such information may be available, but against cross checking the availed information on the virtual project folders shared as well as other information sources many folders were empty. This could be a data transfer or knowledge management problem, but this could not be established during the review.

A general notion observed during the MTR visit was that often team members said "but we will still do this" or "consultants still owe us that report". Evidence of achieved results was often not accessible at the time of MTR, with final results still to be produced in the remaining project period (of about 6 months). It is clearly understood that several project activities were still to be completed under all three project outcomes. However, it is also clear that the short time horizon for project finalisation is a challenge.

The fact that the TC and SC both only met very few times and agendas for their meetings were limited may have contributed to a lack of leadership<sup>44</sup> (see below).

#### 2.2.2 Finance and co-finance

#### Key review areas from TOR:

a) Consider the financial management of the project, with specific reference to the costeffectiveness of interventions.

b) Complete the co-financing monitoring table.

c) Identify and quantify additional co-financing mobilized

d) Review the changes to fund allocations as a result of budget revisions. And assess the appropriateness and relevance of such revisions.

e) Assess financial management of the project, including the balance between expenditures on administrative and overhead charges in relation to those on the achievement of substantive outputs.

As INGRH was not a micro-assessed institution, UNDP managed the funds for this specific GEF cofinanced project. Co-effectiveness and returns on investments for the project were reportedly assessed differently by different stakeholders. On the one hand site staff of MDR criticised that too little investments had been made on a site level to show real impacts, whilst on the other hand it could be argued that for adaptation demonstration and learning replications across five sites were not necessarily required. The GEF funding is not intended to make major contributions to key service delivery responsibilities of Governments, but to add climate change additionally to ongoing efforts. As such there is a slightly ambivalent interpretation of cost effectiveness. For example, at time of MTR it seems that cost effectiveness would entail focusing remaining financial resources on ensuring uptake of the project lessons rather than investing in additional service delivery to local communities – without the policy level absorption.

At time of MTR, the financial tables (Table 2) indicated that most funding had been broadly spent according to the planned allocations as per component, with remaining funding pre-allocated for the remainder of 2013. Funding for a no-cost extension of the project is not available at this point.

<sup>&</sup>lt;sup>44</sup> It was pointed out that the structure of the SC was probably not conducive to creating an open and participatory atmosphere, as the Minister (in person) was part of the SC – amongst mostly more "junior" officials. The opinion that the project team was overrepresented at SC and TC meetings (as resources persons e.g. for presentations) was voiced, indicating that the a-priori secretary functions were often overstepped.

		Total budget	Spending (US\$)				Total to date (US\$) (excl. already	
		allocation (US\$)	2009	2010	2011	2012	2013 (JAN- JUN)	committed funds for 2013
Outcome 1	GEF	600,00		60,276.66	206,056.41	96,339.23	19,463.63	382,135.93
Outcome 1	UNDP					4,376.75	1,678,97	6,055.72
	GEF	1,600,000			601,394.38	509,855.56	75,089.18	1,186,339.12
Outcome 2	UNDP				2,632.70	788.35		3,421.05
Outcome 3	GEF	500,000		66,060.06		33,572.01	17,583.54	117,215.61
	UNDP				7,787.18			7,787.18
Project	GEF	300,000	2,134.46	36,914.25	114,696.16	110,425.37	17,459.07	281,629.31
management	UNDP-CO	200,000		91,916.03	27,378.28	10,524.52	47,087.72	176,906.55
TOTAL	GEF & UNDP	3,200,000	2,134.46	255,167	959,945.11	765.881.79	178,362.11	2,161,490,47

Table 2: Summary of project expenditures to date, disaggregated by year and project outcome.

A particular concern raised by various sources, including DGA and UNDP, were the high staffing costs of the project. It was indicated that the costs for staff versus the achieved project impacts were considered as high. In comparison to other projects implemented elsewhere in Africa staffing costs versus results achieved did not seem particularly outrageous at MTR, although a more stringent management of the project team could potentially have led to more significant project impacts (see section 2.2.1 above).

The co-financing commitments were reported on in PIRs (2012 and 2013<sup>45</sup>) and are reflected in Annex 7 of this report, in line with the co-financing commitments set out in the project document. It was noted by UNDP that the delays in project implementation meant that certain co-financing was already terminated when this project rolled out, and limited information could be accessed from partners.

Note: part d) of the TOR "Review the changes to fund allocations as a result of budget revisions. And assess the appropriateness and relevance of such revisions" seems to be irrelevant, as no such changes were reported by neither the project team nor UNDP, or reflected in the annual reports.

<sup>&</sup>lt;sup>45</sup> The PIR for 2013 was only prepared after the MTR was undertaken.

#### 2.2.3 Monitoring Systems

#### Key review areas from TOR:

a) Review the monitoring tools currently being used: Do they provide the necessary information? Do they involve key partners? Do they use existing information? Are they efficient? Are they costeffective? Are additional tools required?

b) Ensure that the monitoring system, including performance indicators, meet GEF minimum requirements. Develop SMART indicators as necessary.

c) Ensure broader development and gender aspects of the project are being monitored affectively. Develop and recommend SMART indicator, including gender disaggregated indicators as necessary. d) Examine the financial management of the project monitoring and evaluation budget. Are sufficient resources being allocated to M&E? Are these resources being allocated effectively?

The main reporting tools such as quarterly project reports, and PIR and APR were completed by the project, under intense leadership of UNDP CO and RTA, and displayed in an accessible and informative manner.

However, no specific project M&E plan beyond the SRF seems to be in place. Formal reporting from key staff on their project areas was limited and some to the MTR critical information had only been recently synthesised and collated spurred by the arrival of a new project coordinator.

It is notable that the in the project design foreseen M&E position was never filled<sup>46</sup>, although this issue was reported in previous PIRs and brought forward as "grievance". It is often seen in projects such as this that the M&E expert either never gets hired, or the usefulness of the positions or appointment are not immediately seen. A better understanding of the importance of M&E in terms of tracking project progress, impacts, and laying a foundation for adaptive planning often needs to be created by the project leadership and UNDP<sup>47</sup>.

Although the TORs for the MTR indicate that a more detailed M&E plan and SMART indicators should be developed, it was found that the limited remaining project implementation period would not justify such an effort. Measuring performance against such indicators would be a "retrofitting" at best, which seems not to make sense. An exception would be that indicators demonstrating impacts of the demonstrations and adaptation innovation and learning could be demonstrated more effectively, if reporting would be diversified and additional impact information be collected, i.e. including in a gender specific data disaggregation. Relevant recommendations pertaining to this specific aspect are included in Part 3.

<sup>&</sup>lt;sup>46</sup> It was clarified by UNDP that the project design had the M&E staff foreseen as a temporary position of 12 months spread over the period of the project (4 years). It was difficult to local staff willing to take such a part-time assignment, as it was considered to require almost full time engagement. <sup>47</sup> UNDP provided evidence of relevant management tools being repeatedly shared with the project management, however,

limited application of such tools resulted.

#### 2.2.4 Risk Management

#### Key review areas from TOR:

a) Validate whether the risks identified in the project document, PIRs and the ATLAS Risk
Management Module are the most important and whether the risk ratings applied are appropriate and up to date. If not, explain why. Give particular attention to critical risks.
b) Describe any additional risks identified and suggest risk ratings and possible risk management strategies to be adopted.

During project formulation four risks were identified (Table 3). No other additional risks were identified during PIRs and no ATLAS risk were brought to the attention of the MTR team.

Risk	Rating	Comments at MTR
Political resistance to adjust "governance frameworks" (i.e. policies, plans, strategies, programmes etc.	Low	<ul> <li>Did not appear to be a problem, rather the missing out on specific policy relevant opportunities could be considered a factor that has led to limited policy reforms in terms of climate proofing the water sector sustainability in Cape Verde; some useful foundations were laid by the project – more could have probably been achieved</li> <li>Much of the specific adaptation learning stemming from the project has not yet been synthesised and consequently has not yet found its way into critical policy processes</li> <li>Leadership by INGRH was seen to be limited by some interviewees - probably not prioritising the project – not necessarily because of political resistance; the project team highlighted that they felt that INGHR was providing strong leadership</li> </ul>
Globally-induced recession in the years to follow will impact public expenditure negatively affecting the expected allocations for adaptation	Medium	<ul> <li>Generally yes, but in the case of the project the overall impact of it regarding investments for adaptation was not yet well proven; in narrative many possibilities were indicated, but no or limited proof of impact could be provided by the project at this time</li> </ul>
Cultural barriers on accepting new techniques can be expected	Medium	<ul> <li>No such barriers were reported, uptake of adaptation learning at the demonstration site level seemed good based on local level site visits and interviews with a diversity of stakeholders</li> <li>The strongest "resistance" was observed within the MDR (and partially INGRH and Municipalities), mostly not fully realising the additionnality of the CC interventions or not prioritising CC aspects at this time as there were "other, more immediate development challenges" (e.g. instantaneous water provision at all costs)</li> </ul>
Water conflicts may be exacerbated by drought, if any event happens during project implementation	Low	• Although water use conflicts between upper and lower catchment users were identified and managed by the project (PIR 2012), these were not specifically linked to drought.

**3Table 5:** Risk log from Prodoc

No new risks are included at time of MTR, as the project will close to a draw. All recommendations made should be addressed through the management response.

#### 2.2.5 Reporting

#### Key review areas from TOR:

a) Assess how adaptive management changes have been reported by the project management, and shared with the Project Board.

b) Assess how lessons derived from the adaptive management process have been documented, shared with key partners and internalized by partners.

The Project Boards or "SC" only met twice (see above). Few substantive management decisions seemed to have been taken at this level. Overall in terms of management, the annual planning process probably signifies the most strategic entry point for changes of priorities. As indicated in various sections of this report, it seems that decision making and prioritisation probably were not always strategic, but seem to have generally followed the project design rational.

It is a major weakness of the project implementation to date that- with the exception of two stories submitted to the ALM - few lessons learnt from the project, including possibly on adaptive management, have not been systematically documented and processed and consequently were not widely shared and internalised by partners.

Even though the PIRs were duly prepared and submitted in good quality, it is noted that quarterly project reports were submitted regularly, but these were partially very limited in scope and did not provide a clear overview of project status sufficiently detailed for management purposes.

Where and if reports are available from project activities (various Powerpoint presentations, reports from trainings), these are often a description of proceedings with limited analytical context and interpretation of lessons learnt in a climate change adaptation context. Such specific synthesis work, highlighting the achievements of the project under the various outcomes, can still be conducted now, towards the end of the project, however, needs to be identified as a priority with relevant human and financial resource allocations in the remaining project time.

#### 2.3 Management arrangements

#### Key review areas from TOR:

a) Review overall effectiveness of project management as outlined in the project document. Have changes been made and are they effective? Are responsibilities and reporting lines clear? Is decision-making transparent and undertaken in a timely manner? Recommend areas for improvement.
b) Conduct an evaluation of project coordination, management and administration provided by the project management unit. This evaluation should include specific reference to

organizational/institutional arrangements for collaboration among the various agencies and institutions involved in project arrangements and execution;

c) Assess any administrative, operational and /or technical problems and constraints that influenced the effective implementation of the project and present recommendations for any necessary operational changes;

d) Assess the functionality of the institutional structure established and the role of the project governing bodies ( steering committee and technical committee), the Technical Support and Advisory Team

e) Review the quality of execution of the project Implementing Partners and recommend areas for improvement.

f) Review the quality of support provided by UNDP and recommend areas for improvement.

Firstly it needs to be clarified that the project execution agency indicated in the project document as Ministry of Environment, Rural Development and Marine Resources (MADRRM) was restructured in 2010, with the for the project responsible institutions now being split into two different entities. Whilst MAHOT remained the responsible institution, MDR moved away with limited direct project execution functions – a move which in hind sight may have been managed differently – keeping more responsibilities and ownership with MDR. MDR is still actively involved in the project, i.e. as a member of the set up Local Committees (LCs) as well as through the Technical Committee (TC), however, overall project ownership was now split.

It should be noted that currently a restructuring of the water sector is taking place, including national policies and institutions. As such the INGRH will be restructured and may be folded into the newly established ANAS. These changes are important to take into account when planning the remaining project focus and activities, especially synthesizing strategic policy information and awareness raising events stemming from the adaptation learning coming from the project. Important opportunities can arise from such a restructuring – if appropriately targeted and utilized. Relevant recommendations in this regard are included in Part 3.

In the project document two oversight bodies were established, the Steering Committee (SC) (also the Project Board) and the Technical Advisory Committee (TAC) later referred to as the Technical Committee (TC). Both entities were established, however in reality are not fully operational. Over the three year project implementation (2010 to 2013), the SC and TC only met a few times (see above). The minutes from the meetings reviewed indicate limited issues were considered by the committees, and limited steering took place.

At the project management level a Project Coordination Unit (PCU) was established largely in line with the suggestions in the project document. A small core team of national staff was to be supported by an international the Chief Technical Advisor (CTA) and short and medium-term national and international
consultants. Two project site offices with site coordinators and support structures from the INGRH and MAHOT (restructured from the initial MADRRM – see above)

In reality the PCU underwent several staff changes, which seem to have negatively affected project leadership. The position of the CTA that was hired on a project shared basis with the GEF Biodiversity project "PIMS 4176 – Consolidating Cape Verde's PA system" was discontinued in 2012. Whilst several interviewees during the MTR mentioned that no CTA was needed to guide the team, it is clear that the subsequent loss of the NPC in 2012 did cause further disruptions in project implementation.

It is noted that even from UNDP site, changes in staffing at the level of the Regional Technical Advisor (RTA) affected this project. Certain decisions such as the delay of the MTR to 2013, may not have been necessary or approved if a more involved management from the UNDP RTA and the Country Offices (CO) had been carried out and acted upon. It seems that stronger leadership from any relevant entity including UNDP could have helped to more tightly manage the project team, their work plans and reports and ultimately results, although evidence was provided that the Country Office did make attempts at guiding the project management, especially after the CTA position was made redundant.

Interviews i.e. at DGA and INGRH indicated that in the future, staff should be seconded from the implementing institution(s) and topping up payments be made. A closer integration of a PCU into the established government structures was requested. It is noted that evidence is that placing of the PCU within INGRH was intended for this project, but that no adequate office space was available at the institution at the time of project establishment.

As the remaining project implementation period is rather limited no specific recommendations for restructuring are being made by the MTR, however clear recommendations on work prioritisation for the remaining project period are included in Part 3 of the report.

#### 2.4 Summary of evaluation ratings

The applied ratings<sup>48</sup> are:

Ratings for Outcomes, Effectiveness, Efficiency,	Sustainability ratings:	Relevance ratings
<ul> <li>6: Highly Satisfactory (HS): no shortcomings</li> <li>5: Satisfactory (S): minor shortcomings</li> <li>4: Moderately Satisfactory (MS)</li> <li>3. Moderately Unsatisfactory (MU): significant shortcomings</li> <li>2. Unsatisfactory (U): major problems</li> <li>1. Highly Unsatisfactory (HU): severe problems</li> </ul>	<ol> <li>Likely (L): negligible risks to sustainability</li> <li>Moderately Likely (ML):moderate risks</li> <li>Moderately Unlikely (MU): significant risks</li> <li>Unlikely (U): severe risks</li> </ol>	<ol> <li>Relevant (R)</li> <li>Not relevant (NR)</li> <li><i>Impact Ratings:</i></li> <li>Significant (S)</li> <li>Minimal (M)</li> <li>Negligible (N)</li> </ol>
Additional ratings where relevant: Not Applicable (N/A)		
Unable to Assess (U/A		

<sup>&</sup>lt;sup>48</sup> As set out in newly developed guidance on Terminal Evaluations, UNDP Evaluation Office (2012).

Table 4: Rating Project Performance				
Monitoring and Evaluation	1	Comments		
Overall quality of M&E				
M&E design at project start up	MS (4)	The SRF was finalised at the Inception workshop in 2011, some time into the project implementation period.		
M&E Plan Implementation	MU (3)	No more practical project specific M&E plan was established as part of the project management. The in the project document foreseen M&E position was never filled, a fact that was included and reported as grievance in the PIR of 2012 by UNDP. Staff reporting as part of a functional M&E system is not systematically implemented. The VRA that was included in the SRF as a source of verification was quite innovatively set out in the beginning, but methodological deviations in the follow-up survey render the results not comparable to the first assessment. A clear methodology for a final assessment which will have to be carried out before the TE is needed (see Recommendations Part 3). At time of MTR limited evidence of progress towards the SRF indicators was in place.		
	1			
Overall Quality of Project				
Implementing Agency Execution	S (5)	UNDP CO support to the project seems good, especially since the CTA position has been discontinued. A positive attitude towards the PCU and their capabilities supports their capacity development. For example PIR preparation was undertaken as a team effort in most years. It seems that certain decisions were not fully seen through by UNDP CO though, trying to manage conflicts with the project team sensitively. Stronger top leadership directives could have improved project performance and management. Setting up a closer technical support e.g. through short term expertise accompanying project management (not necessarily a full time CTA) could be useful (see recommendations in Part 3), especially as the RTAs are quite fully stretched with responsibilities.		
Executing Agency Execution	MS (4)	INGRH and the PCU worked jointly in the execution of the project and overall the project is delivering intended adaptation learning. Even though leadership could be stronger i.e. for integrating policy level outcomes into decision making at INGRH but also other institutions such as DGA and MDR. Site specific work of INGRH was found to be strong especially on St. Antão, and work with the local		

		Municipalities was definitely strengthened through	
Overall Quality of Project Outcomes			
Relevance	R (2)	The project objective and outcomes are highly relevant to the needs of the water sector and sustainable development in Cape Verde. A short coming, rated here as minor, is that the climate change additionality is not always clear. It is rated as "minor", as the remaining project time will allow to specifically synthesise and communicate explicit adaptation learning from the demonstrations. Although outcomes are yet to be finalised, and relevant learning needs to be documented and synthesised as a matter of priority, the implemented interventions are response to the needs. Outcome 1 needs to be focused and strategic activities must be identified and followed up on in the very short remaining implementation time to ensure that relevance is maximised.	
Effectiveness	MS (4)	The outcomes and supporting interventions are largely effective – however, the final synthesis of the results is key for the remaining project period. If this is not done the overall project impact may be reduced to a negligible level.	
Efficiency	MS (4)	Better project leadership and work planning could have resulted in more adaptive project planning and implementation leveraging better outcomes. For outcome 1, more strategic policy interfaces and engagement could have been identified, and innovative results from the demonstrations under outcome 2 be integrated more effectively to climate proo the water sector. Outcome 3 has not yet been fully implemented, and although only limited resources are allocated to it and limited strategic activities are planned it is recommended to focus remaining project activities on the synthesis and effective policy communication of project results.	
Production of a public good	S (4)	The outcomes of the project have the potential for improve public service delivery in Cape Verde, as long as the learning from the project are well documented and strategically integrated into policy processes.	
Demonstration	5 (4)	Strong demonstrations ranging from testing local level adaptation measures to piloting joint decision making, as well as mobilizing Municipalities to take responsible actions are coming out of the project. The MTRMTR visit clearly witnessed strong innovations - just they need to be better	

		documented and communicated.
Replication Scaling up	MS (4)	Although there is potential for replication of the adaptation learning through MDR, INGRH and other institutions i.e. through adjusting their own interventions to include climate risks and resilience building as key components, it is clear that the replication of local level intervention may fail because of high investment costs. The micro finance sector in Cape Verde is not very strong at this point and access to financing options by individual farmers very limited. Work under outcome 1 has created a broad level of awareness amongst key decision-makers including at municipal level, which lays a good foundation for further replication of climate change resilient innovations in the water sector. Although the ownership of the various project results amongst the relevant institutions is good – upscaling of the adaptation learning will likely not
		take place if the project results are not more strategically synthesised and communicated. It is difficult to distinguish the "business as usual" from specific adaptation additionality at this point. Considering that this project was one of few CC interventions, it is clear that a lto more work is required to sensitise sectors and institutions such as Municipalities to start preparing for impacts that might be felt later. A general attitude of "water provision is a right for all" without considering sustainability aspects prevails. Some important initial ground work in raising awareness on the additional climate change risks exacerbating the already difficult situations on water provision in this small island state has been done through this project.
Overall likelihood of risks to Sustainability:		
Financial resources	ML (3)	Without continued financial support demonstration interventions at some project sites may not be sustainable, while others such as e.g. the Estufa seem to be self financing. Mainstreaming of adaptation learning through MDR and perhaps INIDA funded projects could take place, but would probably need further prompting by the project team before winding up. The secured CIDA funded climate change project that will commence in 2014 will support sustainability aspects.
Socio-economic	L (4)	The project demonstrations have a good level of social sustainability.
Institutional framework and governance	ML (3)	Could be good – but needs more investment in terms of clear learning from eh demonstrations and

		strategic entry points to communicate this to relevant target groups. For example within MDR products for technical staff at regional and national level are required, as well as policy level messages are needed that can be incorporated into overall decision-making processes.
Environmental	MU (2)	In the absence of detailed hydrogeological information it is difficult to gauge the environmental sustainability of several demonstrations, especially where water provision is the primary concern. The project generally supports water saving as a key focus.

#### PART 3: Conclusions, recommendations & lessons

#### **3.1 Best Practices**

Based on a joint brain storming session with the project team, a suite of best practices and lessons learnt were identified as coming out of the project intervention. A summary of the most pertinent best practices is included in the following.



**Picture 1:** The project team and the evaluators brainstorm the major lessons learnt and best practices emerging from the project

3.1.1. Adaptation measures/demonstrations

#### Best Practice 1: Improved capture of less predictable rainfall under CC scenarios

Climate related risks addressed: Ground water in Cape Verde is replenished by rainfall, and through intricate hydrological processes from upstream to downstream the ephemeral river basins. Already changes in rainfall patterns are reported in Cape Verde with changes in the seasonal onset of the rains as well as in the characteristics of such events. Rainfall events are reportedly becoming less frequent and are stronger in intensity – which affects run-off and infiltration and consequently ground water recharge.

#### Measures demonstrated:

#### Ground water replenishment through improved rain water run-off capture

As one adaptation measure the project invested in the building of check dams in strategic locations in the upstream river basins/ catchments (i.e. Ribeira Grande). A suite of up to seven such dams were build

with the help of the local water associations. The intension is to slow down run-off after rain events and to increase water recharge upstream.

It is noted that no specific research measures underpin this intervention in terms of measuring rainfall amounts and run-off intensity or infiltration rates at sites, however, such research could be carried out by INGRH in the future.





Pictures 2 & 3: Check dams contributing to ground water recharge in Ribeira Grande upper catchment

#### Reversal of ground water salination through improved ground water recharge

Key agricultural production areas in the river delta in Santa Cruz are rendered unusable due to high salination impacts. These are caused by groundwater over-abstraction for irrigation, as well as reportedly by climate variations including changed recharge rates and sea level rise.

The construction of checkdams in the delta area for water rehabilitation, combined with water use efficiency measures - drip to drip irrigation practices and an awareness raising effort against flood irrigation are all activities that have been implemented and tested at this site. Additionally the Municipality was supported to test brown water recycling for irrigation purposes (see below).

Although no specific tracking of impacts through specific research has taken place, the interventions have been well adopted by the local authorities (Municipality, INGRH, MDR, amongst other) as well as the local associations.

#### Nature-based soil & water conservation

Soil stabilization through the rehabilitation and building of terraces as well as the planting of Aloe Vera in bound lines has been implemented on a large scale through the project. Mostly already tested methods have been reapplied now in a climate change context. Apparently based on available research information, decisions on the type of interventions were made. Unfortunately no support research was implemented as part of this project.

One note should be made about the large scale planting of Aloe Vera – at Tarrafal community members investigated about the possibility to use Aloe Vera commercially. This generally seems to be a good incentive and could be further explored.



Pictures 4 & 5: Demonstrations of set out Aloe Vera contour bound lines for soil and water conservation.

# Best Practice 2: Water use-efficient community-level food production, securing nutrition during dry season and prolonged dry-spells

Climate related risks addressed: Most communities depend on rainfed agriculture for subsistence purposes. Although esp. MDR promotes irrigation approaches to improve food production during the dry season, these practices are not applied yet nation-wide, and often flood irrigation is applied as a "traditional" practice. The project introduced and demonstrated various water-use efficient techniques and practices, and propagated especially the climate induced changes to be expected for agricultural production in the future. It is anticipated that dry-spells become longer and harsher, with generally increased temperatures, and consequently higher evaporation rates. Through the introduction of lowwater sue dry season food production food security and critical nutrition bottlenecks are overcome, and income generation is enhanced.

#### Measure demonstrated:

<u>Community managed drip-irrigation systems (gota gota) and rehabilitation of terraces and</u> The project invested into demonstrations of gota gota irrigation systems at several project sites. This mostly went hand in hand with the development or rehabilitation of a water source and storage system (see below) and with farmers training and research into suitable crops to be produced (also below).

Establishment and maintenance of the irrigation infrastructure are undertaken by the farmers themselves. The project only provided the inputs. Although it is recognized that the initial investment costs may be high for some farmers, it was noted that in several places local community members have started investing into replications. As MDR is rolling out farmers support the importance of the demonstrations is to integrate thinking and innovations in terms of climate change risks and adaptation.

An issue to guard is the development of water sources in absence of solid ground water information. Raising expectations for irrigation potentials without understanding if sources are sustainable can lead to maladaptive practices. Water provision by all means may back fire in the longterm.



Pictures 6 & 7: Investments into drip-irrigation (Gota-gota) systems to improve water-use efficiency

#### Farmers research on suitable crops

The technical support by the project included training, demonstrations and implemented for suitable crops. Suitability is defined in various ways including seasonal growth and succession of up to two harvests (this is mostly through farmers' led experimentation and knowledge exchange/peer learning), looking at nutritional values of crops as well as niche markets.



**Pictures 8 & 9:** Tobacco has a seasonal niche market which fetches good revenue supporting household economics. Cabbage is currently not well paid for on the market, but the farmer expects that is he can hold his harvest on the stock for another two weeks prices will improve.

# <u>Rehabilitation and development of water sources and storage</u>, and training and awareness on water use <u>efficiency</u>

Hand in hand with the gota gota installations, the development and rehabilitation of water sources has been supported by the project. Larger scale community reservoirs have been rehabilitated and water intake been improved, reducing major water losses reported earlier. Awareness raising activities on water conservation have been implemented and demonstrated through the interventions. The importance of establishing set community water management agreements was highlighted and is well observed through agreed to irrigation and household uses from the established tanks. Meters have been specifically installed assisting the tracking of water use . Farmers research could be further enhanced on site.



**Pictures 10 & 11:** Water storage facilities have been rehabilitated and source development and rehabilitation have been implemented in a way that water losses are minimized. Relevant awareness work for maintenance and a realization of the importance of water use efficiency were carried out in all project communities.

#### Recycling of brown water for irrigation

In Santa Cruz, based on local demand, an intervention looking at technological solutions of the recycling and treatment of brown water for irrigation purposes has been supported. Technical detail on this innovation is available from the TA for outcome 2.

#### Supporting school gardens

Specific investments were implemented at selected school gardens. The demonstration and learning impacts at such a location are rated as high, and additionally food stuff for the school kitchen can be produced. The Ministry of Education representatives rated this type of measure as very important – and key learning activities can be linked to the demonstration on climate change, impacts on water and food, importance of nutrition, and options for self-help and auto-adaptation, etc.

# *Best Practice 3: Green-house food production by communities – building adaptive capacity through more climate resilient income generation*

Climate related risk addressed: Same risks as outlined under Best Practice 2. Irrigation in a controlled environment can even more specifically address the climate risks experienced and anticipated in the future.

Measures demonstrated:

#### Investment costs of Estufa/green house and training

Estufas were set up in several pilot basins (e.g. Ribeira Seca, Tarrafal, Ribeira da Patas) and under controlled circumstances irrigation can take place throughout the year. Productivity is greatly increased, with beneficiaries reporting an exception increase of income just alone from the first harvests. Not only can productivity throughout the year be induced, but also quality of produce increases under green house conditions – fetching good prices in niche markets. The important and precious tourism market can be specifically supplied from such production.

Key concerns revolving around the wider rolling out of the practice are high initial investment costs. In the absence of micro finance options, initial investments will have to be subsidized by Government or special community contracts could be brokered with local tourism establishments and hotels, for example. Markets could be developed on all islands of Cape Verde, if transport bottlenecks can be overcome. It is clear that there is a great potential in further rolling out this type of intervention and linking it to community projects and market demands.

Training needs are initially intense, as farmers often come from a background of pursuing rainfed farming only. Relevant training materials and approaches are yet to be documented and developed from the project experience for up-scaling.

# Farmers research into water use efficiency, implements & seedling materials, products choices a.o., including research into market niches

Specific research into improving the technology based on the climatic variable at specific sites and improvements in terms of best water and implement usage were undertaken to advance adaptation knowledge. Numerous aspects of optimizing the estufa approach in a climate change context were investigated. A draft report from INIDA is available on the research results and lessons learnt can be processed for various target groups and for advancing adaptation learning.

It is clear that water conservation and tracking of water use needs to be an integral part of any government policy supporting estufa upscaling, to guarantee water-use efficiency and water sustainability.

#### Demonstrations on cost recovery, maintenance etc.

Maintenance and renewal can be factored into the profit calculations; however, specific training on this must be undertaken. Reports from the project beneficiaries on production and return to date indicate that cost recovery on investment could be possible over a two year time period. This type of economic information should be available to advance policy discussion on micro finance opportunities and government loans and another financing systems, to ensure that a pro-poor support for estufa development can be developed in the future.



**Pictures 12 to 15:** Estufa demonstrations that benefit individual farmers and community groups; not only the initial investment but technical training were part of the project interventions. A dedicated research programme on optimizing implements and water usage was supported with INIDA. Farmers research and peer learning is being supported.

3.1.2 Important process support for building adaptative capacities

#### Best Practice 4: Community participation, ownership and extension outreach

Context on building adaptative capacities: Outreach and engagement are critical ingredients to building adaptive capacities. The project places a strong emphasis on participation and ownership building in this regards, including the following best practices:

#### Working with the Associations

In Cape Verde community formations called "Associations" are being implemented as part of local governance systems. These associations are thematically organized and have an elected leadership. For example an association responsible for the building and maintenance of check dams was engaged by the project to support the building of the project interventions in the Ribeira Grande basin. The Association leadership set out the contracting and hired and supervised the building work. Community members were hired to undertake the building work, providing income to these people. The arrangement strikes a balance between offering income and leveraging community in-kind "co-financing". Whilst some

amounts of cash income are derived from the project work, it is clear that the amount of work undertaken on the community level goes well beyond that monetary value. Working in such a arrangement with local communities not only creates socio-economic benefits, but it builds ownership and develops capacities for a replication and maintenance of interventions beyond the project horizon.

<u>Practical on-site support, collaborations with government outreach personnel, peer visits, TOTs</u> The project implementation arrangements ensure that the project staff works closely with the established government structures. In all implementation activities especially under outcome 2, staffs of the government, especially extension officers, are involved in the on-site learning and community peer exchange activities. They receive specific Training of Trainers' (TOT) training for e.g. the estufa setting up, including on the adaptation learning innovations co-implemented with INIDA.

#### Tracking innovation results - and integrating them into adaptation learning

At this point this is only indicated as a potential component of this best practice. At time of the MTR the specific input information as not accessible i.e. specific training materials and approaches, as well as the INIDA research report. However, if such work is forthcoming and of good quality the project could document these as a best practice, or – if necessary develop the materials further to become a best practice.

#### **Best practice 5: Bringing partners together**

Context on building adaptative capacities: Set up the necessary intersectoral and multi-partnership platforms to address climate risks and promote the building of adaptive capacities.

#### Inter sectoral local coordination

The project design and implementation has had a strong focus on setting up intersectoral governance structures such as the TC and the LCs. On these committees a set of representatives interfacing with water related issues were represented. Specifically the LCs, which were quite active at the pilot site level, included representatives of water "use" stakeholders, such as the Ministry of Health and the Ministry of Education, not only the water service providers. In terms of discussing climate risks and possible adaptation measures in this sector building such a platform seems very useful and innovative.

#### Training opportunities

The committee members were the focal target groups of various project led training and capacity building activities. Presentations and discussions on more general climate and climate change related knowledge, how the climate risks to the water sector may affect other sectors, such as health, discourses on how a promotion of water use efficiency is critical to adaptation, were all the type of topics that were covered through training opportunities. During the consultations the LC members were positively reflected on these opportunities.

#### Demand-led responses

Based on the awareness raising activities through the LCs in particular, certain stakeholders identified the need for further support and action. As one example, the Ministry of Education on St. Antão collaborated in the development of a school garden in line with water use efficiency learning from the project, and uses this demonstration as a climate change learning activity for teachers and learners. Due to the high interest of the education sector, the project branched out into several school related activities, including a survey on perception on climate change. At time of MTR this survey was not yet finalized, however it seems to have a strong potential to serve as innovation and best practice.

It must be noted that this demand led refocusing of project interventions may have advantages and disadvantages. Whilst there are clear benefits of following a demand-led approach, it seems that sometimes the overall strategic focus of the project was lost. Whilst there are clear benefits that can be derived from good working partnerships with e.g. education, it is also noted that the policy relevance of the interventions must be very clearly worked out – and be elevated to a strategic level to have sustainable and lasting impacts on building climate resilience on the water sector.

#### Work opportunities with Municipalities and informing their policies on climate risks

Based on Cape Verdean governance structures, the Municipalities have a strong role to play in rural development as well as water issues, supported by the various line Ministries. A recent decentralization effort promoted by the Government, has made the Municipalities an strong entry point for this project. Aligning the project with the Municipal planning processes and cycles is strategic, although the MTRfound that parallels were not always found due to the time frames of Municipal planning. As such, little evidence of integration of climate risks in the water sector was documented, however the potential to further such strategic entry points during the remaining project period exist, and should be documented.

#### **Best practice 6: Communication approaches**

Context on building adaptative capacities: Sharing knowledge and changing people's ways – the ultimate challenge in building adaptive capacities. The project invested into targeted communication activities, and towards project end the emerging specific project learning should further be shared systematically.

#### Community radio, TV, Theater

The project invested into a number of innovative communication approaches, targeted either at a broader audience for wider sharing or at the specific pilot communities worked with at the demonstration sites. For example, community theatre was performed at sites to leverage learning impacts, and community radio was used to share experiences with a broader set of communities. The screening of a documentary in a Government conducted regular show on rural development was used as a sharing mechanism.

The content of these communication activities was not specifically reviewed, and, in writing up a best practice such detail should be considered.

At this point there is no clear strategy on how to specifically communicate and use the specific results emerging from outcome 2 and there is a need to develop a more sophisticated and targeted communication strategy and plan for the remaining project period.

#### 3.2 Key lessons learnt

Only a few key lessons learnt from the MTR process and project are reflected here. Further lessons should eb more formally documented by the project team before project end.

#### Lesson 1: Do not defer MTR

The major delays in project implementation are understood and appreciated, as is the decision to delay the MTR until some visible results were achieved by the project.

However, this project is a good example for why a MTR should not be deferred for late. This MTR is conducted just 6 months before operational project end and 1 year before it is officially finalized. Financial resources have almost been completed and a redirecting of priorities has now to be conducted in an extremely limited timeframe.

Arguably a conducting of the MTR about a year ago could have helped the project to overcome a management void in the project.

# Lesson 2: Managing a management team – keeping the focus on the project objective and the possibility of CTA-type ongoing shorter-term IC management support

The loss of critical staff and positions in this project has clearly impacted on the strategic focus and level of outcome level performance.

It is suggested that the institutionalization of management and technical support on an on-demand level through e.g. an international consultant whose role it is to support a country team could be of help. In many countries there is resistance to spent large amounts of the GEF funds on a full time CTA position, and a part-time on demand arrangement could work better.

#### Lesson 3: The importance of strategically pursuing policy opportunities - continuously

It is very difficult to plan for and foresee policy opportunities at project planning stage - and keeping an eye on emerging policy opportunities must be a key responsibility of a project team. Demonstration activities in a project like the reviewed one can only come to full fruitition if policy opportunities are continuously being searched for and responded too through adaptive planning.

Policy influencing is a part of a science, and a good amount of relevant cutting edge resources can be accessed to help design and execute effective policy influencing strategies. To bring good technical work to shine investments into this area are critical.

### Lesson 4: Communication is not just communication, training not just training, capacity building not just capacity building

The three key assumptions set out in the project document reflect a serious misunderstanding of key success factors for a project of this nature. Capacity building, training and communication are all technical fields underpinned by a great array of science knowledge that helps to design and implement highly effective approaches and activities that have a lasting positive impact on a target person or group. For example, communication is not just about producing a brochure. Communication strategies analyze and explore in detail what type of information a high level decision-maker would like to have to help her or him to reach a specific goal. Similarly a training workshop is not just a training workshop. Well designed trainings are highly relevant to the participants and impact on their knowledge, skills and attitudes lastingly. How many workshops do we attend and shortly after we do not even remember one

"take home message" from it. Taking this more all more serious can lead to much better project results. The assumption that "once we train somebody the policy will change" is too simplistic.

#### Lesson 5: Adaptation learning - what are optimum investments to inform relevant policy changes

In many respects we argue that money must go to the local people to generate some real impacts on the ground, but we need to leverage these investments off against capitalizing on the practical and innovative learning in a strategic policy level context, amongst other. This project is a good example for one where the focus has been on local level practical project delivery, whilst strategic policy, capacity and awareness impacts from the demonstrations are yet to be realized. The budget allocations – as well as level of detail planning – for outcome 3 – focusing on lessons learnt and best practice integrated into national policies and processes – are comparatively low, especially versus outcome 2. More serious approaches towards achieving these sorts of outcomes and impacts are required to achieve a change in policy, a change in behavior and a change in climate vulnerabilities.

#### Lesson 6: Adaptation learning – the need for research

At this point many of the interesting adaptation measures tested and demonstrated are based on general knowledge and sometimes "old" scientific evidence. None of this "old" science information e.g. on the positive impacts of planting Aloe Vera bound lines on soil & water conservation has actually been documented as part of the project. Nor has specific research been carried out to demonstrate such positive impacts as part of this intervention. This is a clear short coming of the project and it seems that an important opportunity has been lost to more specifically track adaptation benefits. Future climate change adaptation demonstrations project, such as the one planned with CIDA funding, should consider a stronger action research component on all interventions to strengthen the evidence base on their adaptation potential.

#### **3.3 Recommendations**

# **1.** Focus remaining project time and resources on leveraging maximum impacts towards the project objective

It is apparent that the project generated commendable activities and results over the past three years. However, someof these are not well documented and communicated yet. To ensure that the project will deliver maximum results towards the project objective "to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde" it is recommended that the work plans for the overall project and each staff members be prioritised and replanned based on the recommendations from the MTR. This may entail that certain activities preplanned in the annual work plan for 2013 be cut to ensure that an effective wrapping up of the project can take place. It is noted that several activities underpinning outputs under outcome 1 were in a "pending" or "to be finalised" stage at time of MTR. It is probably not possible to finalise them all. Priorities need to be set and strictly delivered on.

Under outcome 2 commitments for further site investments may have been made, however, it is recommended that those which can still be reconsidered may be optimised pragmatically, so as to round off the site specific interventions, but rather invest into the synthesis of the adaptation learning that stems from them. It is realised that community and also Government expectations may be high,

but the relatively small groups of beneficiaries do not justify to limit higher level project outcomes and impacts due to a lack of financing and an over commitment of staff at this point of the project.

# 2. Adjust SRF and LFA (specific indicators and output change); disaggregate indicators for outcome 2 further; include gender dimension

See Boxes 1 and 2, above.

# **3.** Document and synthesize adaptation learning, best practices and policy relevant messaging from project intervention

A great deal of best practices, lessons learnt and specific adaptation learning seem to emerge from this project. The project staff, especially the two TAs must dedicate the relevant time to ensure that these project results are appropriately documented and processed. At this point – if any of the two TAs should resign for a new job opportunity – the intrinsic knowledge will lost.

At this point the project only uses general messaging about climate risks to the water sector in Cape Verde. Very limited technical information and knowledge that has been generated by the project, especially but not only through the demonstrations under outcome 2 are used to inform policies. No strategic approach to processing the project innovations in a policy informing manner is currently in place. This is a major short coming of the project which must be addressed before project termination.

The planned CIDA project should be focused to integrate the synthesis information from this LDCF project. If the remaining project time is insufficient to address the here suggested priorities, the new CIDA project team should spent some time on this during the inception period.

# 4. Process project learning and esp. the INIDA report and the technical consultancies into relevant information packages for specific target groups, i.e. technical staff of various Ministries and Municipalities, outreach personnel, local communities

Similarly to the points raised above, there has been no specific documentation of the trainings of community members in the application of the various innovation technologies. The research that INIDA has conducted was at time of MTR not accessible in its final form and the format of the draft report was far too technical to serve any of the intended target groups (technical staff and communities).

It is critical that the project invests into the professional development of such outreach and training materials in parallel to promoting the relevant policy messages in through key institutions such as MDR to ensure that project results can be replicated and up-scaled. There is an enormous willingness to do so – but the onus is on the project to prepare the materials and approaches.

It is recognized that the current project staff may not be able to deliver on this in the remaining project period, and it may be considered to hire support expertise.

#### 5. Support the Aloe Vera commercialization opportunity

The potential opportunity to direct Aloe Vera planting as a conservation measure into a production and commercialization approach should still be further explored. Although it is understood that there are several barriers to production of the local species as well as opening markets for Aloe Vera products, there seems to be a possibility here that could – in the longer term – develop into a livelihood opportunity based on an adaptation technique. The project should at least develop a briefing paper outlining the concerns and options to document the work that has been carried out on this matter. This seems particularly important at e.g. in Tarrafal community members invested greatly into the planting of Aloe Vera and they do have expectations to investigate commercialization opportunities.

#### 6. Develop strategy for integrating key project learning into opportune policy processes

Certain policy level activities planned in the project document could not be achieved as the policy framework partially changed due to restructuring and re-organisation. It is critical to newly identify low hanging fruit opportunities for policy integration of key messages coming from the project at this time.

For example it was identified during the MTR that the PEDA – the key agriculture policy – is currently under review. Adaptation learning on water-use efficiency of drip irrigation innovations in the climate change context, amongst other, should be promoted in such a policy and the application of flood irrigation should be banned and penalized completely. This project, at this time, has a great opportunity to elevate its demonstration learning's into policy relevant messaging.

A detailed strategy on which policy instrument to reach how and with which messages is needed and should be developed possibly with the TC in a well facilitated technical workshop, based on the thinking of the project team.

Engaging the TC at this time, when strong learning emerges from the project can be a good strategy in itself, promoting absorption of this learning amongst key decision-makers.

Relevant policy recommendations could be further implemented under the planned CIDA financed climate change project from 2014 onwards.

# 7. Convene another final high-level decision makers' event during which the key learning and policy messages stemming from the project learning are being shared. Make a splash!

Based on the experience of the July 2012 Parliamentarian workshop conducted by the project, a final project event could be planned towards the end of the project implementation period e.g. for November 2013. The key learning and policy messages emerging from the project should be promoted at such a meeting, as well as action points for future implementation should be formulated for the high level decision-makers. Cutting edge skills and expertise on working on policy influencing should be consulted in the strategic preparation of the event, and relevant expertise should be sourced. Due to the high work pressure expected on the project team until December 2013, an event organizer might be hired.

#### 8. Invest into website and develop as Knowledge Management hub from project

It is hard to believe that the website development has been put off for such a long time, as a website is a key communication tool and not difficult to realize. The argument that the INGRH website was not finalized is now out of the way (see <u>www.INGRH.cv</u>). At the end of the project the intension of the website must to serve as a knowledge management tool, and continuous updating should be planned for. Project advertising and marketing is now not important anymore.

It is critical that the adaptation learning as well as all the key materials developed from the project will be available to the Cape Verdean partners and users in the most accessible way. Relevant resources to hire professionals to set up a good system should be availed.

A "CV Adaptation Action" page could be developed that could be linked to the sites of all partner institutions. It must be considered where the INGRH site will migrate too once the institution will be folded into the planned new water and sanitation responsible institution ANAS, foreseen for end of 2013.

#### 9. Verify VRA methodology, design and conduct final VRA

At time of MTR no two comparable VRAs were available, a set out in the SRF. Although two assessments were conducted (the second under the SGP programme – not related to this project). A thorough review of the two VRA assessments and a clear recommendation for a final assessment before project closure and TE are needed. The VRA is a key reporting tool in the SRF and surely can be further developed to generate useful information.

The project staff has to set aside sufficient time to conduct and process the final VRA before project end in December 2013.

#### 10. Prepare for TE

The project team needs to prepare for the TE. At time of MTR limited reports towards LFA and SRF achievements were in place and support documentation for the assessment was posted by UNDP, not the project team. Although overall information availability during the country visit was quite good, it is clear that the evaluation visit was not planned at long hand. For example, the timing of the visit coincided with a long-weekend during which no project staff worked – a fact that could have been avoided. This partially may have had to do with the very recent appointment of a new NPC. In essence it is recommended to start preparing for the TE now – not many major new project activities and innovations are expected within the limited project implementation time frame, and the TE will be conducted in less than a years' time.

### 3.4 Table for Management Review

Key	issues and	Key Actions	Timeframe	Priority	Responsible
rec	ommendations			(high, medium, low)	Units
1.	Focus remaining project time and resources on leveraging maximum impacts towards the project objective	<ul> <li>Carry out re-planning asap with entire project team</li> <li>Develop work plans for each team member remaining project period, taking into account the MTR recommendations on documenting and synthesizing project learning</li> <li>Finalize low-hanging fruits – drop others</li> <li>Reallocate remaining funding as possible</li> </ul>	Immediately until project end in December 2013	High	PCU with INGRH and UNDP
2.	Adjust SRF and LFA (specific indicators and output change); disaggregate indicators for outcome 2 further; include gender dimension	<ul> <li>Update SRF and LFA a proposed</li> <li>Develop data inputs for TE (see below accordingly)</li> </ul>	August 2013	Medium	PMU
3.	Document and synthesize adaptation learning, best practices and policy relevant messaging from project intervention	<ul> <li>For all outcomes document the key learning in detail and for appropriate target groups</li> <li>Synthesis results should inform the commencing CIDA climate change project interventionSort all relevant project documentation for Knowledge Management purposes and post on website, possible have a "intra" and an "internet" option to it</li> <li>Document more ALM stories in line with key best practices identified</li> </ul>	Immediately until project end in December 2013	High	PMU, esp. the two TAs; possibly with support from UNDP staff; CIDA project (staff) once it commences
4.	Process project learning and esp. the INIDA report and the technical consultancies into relevant information packages for	<ul> <li>Identify key target groups in need of further support (materials) for adaptation learning from project</li> <li>Develop strategy for material and approach development</li> <li>Specifically develop</li> </ul>	Immediately until project end in December 2013	High	PMU, esp. the two TAs; possibly with support from UNDP staff; possibly additional hired staff/consultants (national and

### Table 4: Summary of recommendations for management review

Key	vissues and	Key Actions	Timeframe	Priority (high medium	Responsible Units
Tec	onmendations			low)	onits
	specific target groups, i.e. technical staff of various Ministries and Municipalities, outreach personnel, local communities	<ul> <li>materials and approach for further up-scaling and replication especially by INGRH, MAHOT and MDR</li> <li>Suggested target groups include: technical staff at key ministries, local communities</li> </ul>			international)
5.	Support the Aloe Vera commercialization opportunity	<ul> <li>Compile a briefing on the commercialization opportunities and barriers</li> <li>Set out a plan of action for furthering this approach and opportunity</li> <li>Share understanding with LCs and communities that have been involved with Aloe Vera planting</li> </ul>	Before December 2013	Low	PMU, esp. TA for outcome2 in partnership with ADEI; possibly national and international peer review
6.	Develop strategy for integrating key project learning into opportune policy processes	<ul> <li>Systematically identify key messages for policy level intervention, stemming from project learning</li> <li>Identify key policy opportunities e.g. PEDA review 2013; PRSP/DEPRP 2016, PENAS – at draft stage up to 2030, new proposed institutional set up in water sector, ongoing Municipal and regional level plans, amongst other</li> <li>Prepare specific briefings for each on relevant messages from project learning</li> </ul>	Immediately until project end in December 2013	High	PMU, esp. the two TAs; possibly with support from UNDP staff; CIDA project (staff) once it commences
7.	Convene another final high-level decision-makers event during which the key learning and policy messages stemming from the project learning are being shared. Make a splash!	<ul> <li>Based on content analysis develop compelling briefing programme and event</li> <li>Convene event</li> </ul>	Id good timing for such a event, possibly before December vacation – e.g. early November	High	PMU, INGRH
8.	Invest into website and develop as Knowledge Management hub from project	<ul> <li>Develop website concept as Knowledge Management opportunity</li> <li>Integrate learning documented from all the above actions</li> <li>Develop "archive" of</li> </ul>	Before project end	Medium	Comms officer at PMU with other PMU staff; web design professionals/ consultants

Key issues and recommendations	Key Actions	Timeframe	Priority (high, medium,	Responsible Units
	<ul> <li>project documents mostly for "internal" use</li> <li>No need to brand the site as "project", but rather as adaptation learning forum e.g. linked to INGRH website (even if the institutions will likely be restructured) ; look or other opportunities</li> <li>Develop "sustainability" strategy for website management after project end</li> </ul>			
9. Verify VRA methodology, design and conduct final VRA	<ul> <li>Review the two VRAs that were already undertaken</li> <li>Develop one integrated methodology for final replication before TE</li> <li>Design and conduct final VRA</li> </ul>	Towards the end of project e.g. in November 2013	Medium	PMU, esp. two TAs, with relevant national/ international expertise inputs as necessary
10. Prepare for TE	<ul> <li>From an early stage start preparing for TE</li> <li>Prepare the documentation and make available for evaluation team in the most professional manner prior to country assessment</li> </ul>	At end of project	Medium	PMU, esp. National Project Coordinator with UNDP

Annexes

Annex 1: Terms of Reference (TOR) for Mid-term Evaluation

Annex 2: Internal misison report including itinerary for MTR, list of interviewees, and site reports

Annex 3: Transcripts of consultations – report by National Consultant

Annex 4: LFA - Tracking output level implementation status of project interventions

Annex 5: Project Strategic Results Framework (SRF)

Annex 6: List of documents consulted in support of MTR

Annex 7: Co-financing commitments

Annex 8: Code of conduct agreement form

#### Annex 1: Terms of Reference (TOR) for Mid-term Evaluation

### TERMS OF REFERENCE FOR THE MID-TERM REVIEW

"Building adaptive capacity and resilience to climate change in the water sector in Cape Verde" INTERNATIONAL CONSULTANT

#### **1. INTRODUCTION**

In accordance with the UNDP and GEF M&E policies and procedures, a mid-term review of the full-size project "Building adaptive capacity and resilience to climate change in the water sector in Cape Verde" implemented through the National Institute for Water Resource Management (INGRH) is to be undertaken in 2013. The project started on the, 2009 and is in its third year of implementation of full implementation. This Terms of Reference (TOR) sets out the expectations for this mid-term review. The essentials of the project to be reviewed are as follows:

Project title:	Building adaptive capacity and resilience to climate change in the water sector in Cape Verde				
UNDP Project ID:	PIMS 4091	Project financing	At endorsement	At MTE (Million	
			(Million US\$)	<u>US\$)</u>	
ATLAS Project ID:	00072399	GEF financing:	\$3,000,000 USD		
Country:	Cape Verde	IA/EA own:	\$200,000 USD		
Region:	West Africa	Government:			
Focal Area	Climate Change	Other:			
	Adaptation				
GEF Focal Area		Total co-			
Strategic Program		financing:			
Executing Agency:	National Institute	Total Project Cost	\$3,200,000 US		
	for Water	in <b>cash:</b>			
	Resource				
	Management				
	(INGRH)				
Other Partners		ProDoc Signature (c	late project	15 October 2009	
involved:		began):			
			Planned closing	Revised closing	
			date: June, 2013	date: June 2014	

#### 2. Project background

The impacts of climate change on Cape Verde water resources, particularly on water availability, are predicted to adversely affect human health, agricultural production and food security in both rural and urban areas. Predicted climate change scenarios are likely to constrain long term development through: (i) increased frequency and severity of drought; (ii) increased rainfall variability, including more frequent events of short and intense rains, causing flash-floods in several catchment areas; and (iii) progressive sea level rise and salt water intrusion in freshwater reservoirs closer to coastal areas. Consequently, a major challenge for Cape Verde is to mainstream climate change adaptation measures into integrated water resource management across different institutional, social and spatial frameworks. Technical capacity of both government and local communities to manage the emerging threats imposed by

climate change is required. The likely impacts of climate change are still poorly understood and the need for adaptation not sufficiently incorporated into relevant frameworks

The objective of the project is to build adaptive capacity and increase the water sector's resilience to climate change. Financial resources from the Least Developed Countries Fund (LDCF) will be used to address systemic, institutional and individual capacity gaps to manage water resources for human agricultural and other uses in the face of a changing climate.

#### 2. Project objectives and expected outputs

The project's goal is to ensure that water availability, supply and quality are maintained in the face of changed climatic conditions.

The project objective is to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde. In order to achieve the above objective, and based on a barrier analyses, the project's intervention has been organised in three components under which three 'outcomes' are expected from the project:

*Outcome 1*: Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.

*Outcome 2:* Small and medium scale climate change adaptation practices for water resource management are demonstrated and implemented in selected hydrographical basins.

Outcome 3: Lessons learned and best practices from pilot activities, capacity development initiatives and policy changes are disseminated.

Outcome 1 will deal with the 'governance framework' for climate change adaptation. The fact that climate risk, vulnerability and adaptation measures are only superficially integrated (or mainstreamed) in policies, plans and programs is a symptom of incipient and limited capacity of key stakeholders at the national level to plan in response to climate change. Outcome 2 will, in turn, show how pilot demonstration investment at the site level can make a difference in terms of improving resilience local. Overall, the lessons learnt and experiences acquired under Outcomes 1 and 2 will be disseminated across Cape Verde and to other countries through actions foreseen under Outcome 3

#### 3. Mid-Term Review (MTR) objectives

The objective of the MTR is to provide an independent analysis of the progress of the project so far. The MTR will identify potential project design problems, assess progress towards the achievement of the project objective and outcomes, identify and document lessons learned (including lessons that might improve design and implementation of other UNDP-GEF supported projects), and make recommendations regarding specific actions that should be taken to improve the project. The MTR will assess early signs of project success or failure and identify the necessary changes to be made. The review will include both the evaluation of the progress in project implementation, measured against planned outputs set forth in the Project Document (PRODOC) in accordance with rational budget allocation and the assessment of features related to the process involved in achieving those outputs, as well as the initial and potential impacts of the project. The review will also address underlying causes and issues contribution to targets not adequately achieved.

The Mid-Term Review is intended to identify weakness and strengths of the project design and implementation strategy to come up with recommendations for any necessary changes in the overall design and orientation of the project by evaluating the adequacy, efficiency, and effectiveness of its implementation, as well as assessing the project outputs and outcomes to date. The overall project performance will be measured based on the indicators of the project's logical framework. Consequently, the review mission is also expected to make detailed recommendations on the work plan for the remaining project period. It will also provide an opportunity to assess early signs of the project success or failure and prompt necessary adjustments.

The MTR must provide evidence based information that is credible, reliable and useful. The review team is expected to follow a participatory and consultative approach ensuring close engagement with government counterparts, in particular the GEF operational focal point, UNDP Country Office, project team, UNDP GEF Regional Technical Adviser based and key stakeholders.

The review mission will also identify lessons learnt and best practices from the project which could be applied to future and other on-going projects. The international consultant for this review is expected to identify lessons learnt and best practices from other climate change adaptation project that could guide technical recommendations and improvements.

#### 4. Scope of the Mid-Term Review

The scope of the Mid Term Review will cover all activities undertaken in the framework of the project. The evaluators will compare planned outputs of the project to actual outputs and assess the actual results to determine their contribution to the attainment of the project objectives. The evaluation will diagnose problems and suggest any necessary corrections and adjustments. It will evaluate the efficiency of project management, including the delivery of outputs and activities in terms of quality, quantity, timeliness and cost efficiency. The evaluation will also determine the likely outcomes and impact of the project in relation to the specified goals and objectives of the project. The review team will assess the following three categories of project progress. For each category, the review team is required to rate overall progress using a six-point rating scale outlined in 8

#### 4.1 Progress towards Results

Project design:

- Review the problem addressed by the project and the underlying assumption. Review the effect of any incorrect assumptions made by the project. Identify new assumptions (if necessary)
- Assess whether the project design is clear, logical and commensurate with time and resources available;
- Review the relevance of the project strategy and assess whether it provides the most effective route towards expected/intended results.
- Review how the project addresses country priorities.
- Review the baseline data included in the project results framework and suggest revisions as necessary.
- Review indicators and target reformulation suggested on the PIR (Project Implementation Review) 2012 and reviewed by governing bodies and propose improved formulation if needed.

#### Progress:

- Assess he scope, quality and significance of the projects outputs produced to date in relation to expected results
- Assess the outputs and progress toward outcomes achieve so far and the contribution to attaining the overall objective of the project.
- Conduct an evaluation of project performance in relation to the indicators, assumptions and risks specified in the logical framework matrix and the project document
- Identification and, to the extent possible, quantification of any additional benefits, impacts resulting from project implementation beyond those specified in the project document; A qualified assessment of the extent to which project outputs to data have scientific credibility;

An assessment of the extent to which scientific and technical information and knowledge have influenced the execution of the project activities;

• Examine if progress so far has led to, or could in the future catalyse, beneficial development effects (i.e. income generation, gender equality and women's empowerment, improved governance etc...) that should be included in the project results framework and monitored on an annual basis.

- Examine whether progress so far has led to, or could in the future lead to, potentially adverse environmental and/or social impacts/risks that could threaten the sustainability of the project outcomes. Are these risks being managed, mitigated, minimized or offset? Suggest mitigation measures as needed.
- Review the extent to which the implementation of the project has been inclusive of relevant stakeholders and to which it has been able to create collaboration between different partners. Identify opportunities for stronger substantive partnerships.
- An analysis of the extent of cooperation on engendered and synergy created by the project in each of its component activities;
- A prognosis of the degree to which the overall objectives and expected outcomes of the project are likely to be met;

#### 4.2 Adaptive management

#### Work Planning

a) Analyse adaptive management and result-based focus in project implementation and adherence to the governance structure. Assess to what point work planning processes are result-based? If not, suggest ways to re-orientate work planning to focus on results.

b) Examine the use of the project document logical/results framework as a management tool and review any changes made to it since project start. Ensure any revisions meet UNDP-GEF requirements and assess the impacts of the revised approach on project management.

c) Identify any programmatic and financial variance and/or adjustments made during the first three years of the project and an assessment of their conformity with decisions of the Project governing bodies and their appropriateness in terms of overall objectives of the project;

d) Provide recommendations regarding any necessary corrections and adjustments to the overall project work plan and timetable for the purpose of enhancing the achievement of project objectives and outcomes

#### Finance and co-finance:

a) Consider the financial management of the project, with specific reference to the cost-effectiveness of interventions.

b) Complete the co-financing monitoring table.

c) Identify and quantify additional co-financing mobilized

d) Review the changes to fund allocations as a result of budget revisions. And assess the appropriateness and relevance of such revisions.

e) Assess financial management of the project, including the balance between expenditures on administrative and overhead charges in relation to those on the achievement of substantive outputs.

#### Monitoring Systems.

a) Review the monitoring tools currently being used: Do they provide the necessary information? Do they involve key partners? Do they use existing information? Are they efficient? Are they cost-effective? Are additional tools required?

b) Ensure that the monitoring system, including performance indicators, meet GEF minimum requirements. Develop SMART indicators as necessary.

c) Ensure broader development and gender aspects of the project are being monitored affectively.Develop and recommend SMART indicator, including gender disaggregated indicators as necessary.d) Examine the financial management of the project monitoring and evaluation budget. Are sufficient resources being allocated to M&E? Are these resources being allocated effectively?

#### **Risk Management**

a) Validate whether the risks identified in the project document, PIRs and the ATLAS Risk Management Module are the most important and whether the risk ratings applied are appropriate and up to date. If not, explain why. Give particular attention to critical risks.

b) Describe any additional risks identified and suggest risk ratings and possible risk management strategies to be adopted.

#### **Reporting**

a) Assess how adaptive management changes have been reported by the project management, and shared with the Project Board.

b) Assess how lessons derived from the adaptive management process have been documented, shared with key partners and internalized by partners.

#### 4.3 Management arrangements

a) Review overall effectiveness of project management as outlined in the project document. Have changes been made and are they effective? Are responsibilities and reporting lines clear? Is decision-making transparent and undertaken in a timely manner? Recommend areas for improvement.
b) Conduct an evaluation of project coordination, management and administration provided by the project management unit. This evaluation should include specific reference to

organizational/institutional arrangements for collaboration among the various agencies and institutions involved in project arrangements and execution;

c) Assess any administrative, operational and /or technical problems and constraints that influenced the effective implementation of the project and present recommendations for any necessary operational changes;

d) Assess the functionality of the institutional structure established and the role of the project governing bodies (steering committee and technical committee), the Technical Support and Advisory Teame) Review the quality of execution of the project Implementing Partners and recommend areas for improvement.

f) Review the quality of support provided by UNDP and recommend areas for improvement.

### 5. Review methodology

The Mid-Term Review will be conducted in participatory manner working on the basis that its essential objective is to assess the project implementation and impacts in order to provide basis for improvement in the implementation and other decisions.

The mission will start with a desk review of project documentation and also take the following process:

- a. Desk review of project document, outputs, monitoring reports, such as Project inception Report, Minutes of Project Board meeting and Technical Support and Advisory Team meetings, Project Implementation Review (PIR), Quarterly Progress Reports, M&E framework, mission reports and other internal document including financial reports and relevant correspondence;
- b. Review of specific products including datasets, management and action plans, publications, audio-visual materials, technical packages, consultancies reports and other materials and reports;
- c. Interviews with the Project Managers, technical specialist and other project staff
- d. Interview with Program Officers in charge of project oversight at UNDP CO;
- e. Finance and Operation Manager at UNDP CO authorizing direct payments;
- f. Interview with project executing agency: INGRH president, finance Officer and Program Officer at executing partner;
- g. Field visits to conduct consultations and/or interviews with relevant stakeholders involved, including governments' representatives, local communities, NGO's, private sector, donors, other UN agencies and organizations.

h. Field visit to interview project beneficiaries (community associations, local officials, famers, water boards, etc.)

#### 6. Rating project success

The evaluators may also consider assessing the success of the project based on outcome targets and indicators and using the performance indicators established by GEF for Climate Change Adaptation projects. The following items should be considered for rating purposes:

- Achievement of objectives and planned results
- Attainment of outputs and activities
- Cost-effectiveness
- Coverage
- Impact
- Sustainability
- Replicability
- Implementation approach
- Stakeholders participation
- Country ownership
- Acceptability
- Financial planning
- Monitoring and evaluation
- Impact on disaster risk management

The evaluation will rate the success of the project on a scale from 1 to 5, with 1 being the highest (most successful) rating and 5 being the lowest. Each of the items above should be rated separately with comments and then an overall rating given. The following rating system is to be applied:

Achievement:
90-100%
75-90%
60-74%
50-59%
49% and below

#### 7. Review team

Two consultants with the following qualifications shall be engaged to undertake the evaluation working concurrently according to the planned schedule. The international consultant, who will have in depth understanding of UNDP and GEF projects including evaluation experience, will be designated as the team leader and will have the overall responsibility of organizing and completing the review, and submitting the final report. The national consultant will provide supportive roles both in terms of professional back up, and conduct of local meetings.

The collection of documents is to be done by National Consultant prior to commencing the work. The International Consultant has the overall responsibility for completing the desk review prior to the country mission to Cape Verde, and for submitting the final report following the country mission. The Consultants will sign an agreement with UNDP Cape Verde and will be bound by its terms and conditions set in the agreement.

Qualifications of Team Leader (International consultant)

- 1. International consultant with academic and professional background in fields related to climate change Adaptation, Agriculture and Integrated Water Resource Management. A minimum of 5 years of relevant experience is required;
- 2. Substantive experience in reviewing and evaluating similar projects, preferably those involving UNDP/GEF or other United Nations development agencies or major donors;
- 3. Excellent English writing and communication skills. Portuguese, French or Spanish reading and communication skills. The consultant must bring his/her own computing equipment;
- 4. Demonstrate ability to assess complex situations, succinctly distils critical issues, and draw forwardlooking conclusions and recommendations;
- 5. Highly knowledgeable of participatory monitoring and evaluation processes, and experience in evaluation of technical assistance projects with major donor agencies;
- 6. Ability and experience to lead multi-disciplinary and national teams, and delivery quality reports within the given time;
- 7. 7. Familiarity with the challenges developing countries face in adapting to climate change;
- 8. Familiarity with Cape Verde or similar SIDS (Small Islands Developing States) countries; and
- 9. Excellent in human relations, coordination, planning and team work.
- 10. Excellent feedback-giving skills and culture sensitiveness

Qualifications of National consultant

- i. Academic and professional background n fields related to Climate Change Adaptation, Agriculture and Integrated Water Resource Management. A minimum of 5 years of working experience in the development sector in Cape Verde is required;
- j. Understanding of climate change adaptation and integrated water resource management in Cape Verde;
- k. Demonstrated skills and knowledge in participatory monitoring and evaluation processes;
- I. Experience in monitoring and evaluation of climate change adaptation and development projects, supported by UN agencies and/or major donor agencies;
- m. Proficient in writing and communicating both in English and in Portuguese/Spanish. Ability to interpret to the international counterpart and also to translate necessary written documents to English;
- n. Excellent in human relations, coordination, planning and team work.

#### 8. Proposed schedule

The review will start in the beginning of May, 2013 and it requires a 12-days country mission in Cape Verde (Santiago and S.Antão island) as well as a desk review (prior to the country mission) and drafting and finalization of the report (following the country mission). The consultant will be paid on lump sum basis including international and local travel, fees and living allowance upon satisfactory delivery. The draft Final Report should be submitted to UNDP and UNDP/GEF-LDCF for circulation to relevant agencies/national counterpart within two weeks after the completion of the review mission to Cape Verde. The consultants will finalize the report within one week upon receiving comments and feedback from stakeholders compiled by UNDP and UNDP/GEF-LDCF.

#### 9. Deliverables

The review team will produce the following deliverables to UNDP, INGRH, GEF Operational and Political Focal Points, UNDP/GEF-LDCF and the Project Board (Steering and Technical Committee):

Deliverable	Content	Timing	Responsibilities	Payment
				Schedule
Contract signing				10%
Inception Report	Review team clarifies timing	No later than 1	Review team	15%
	and method of review	weeks before	submits to UNDP	
		the review	Country Office	
		mission		

Presentation	Initial Findings	End of review mission	To project management and UNDP Country Office; and key stakeholders	
Draft Final Report + Executive summary	Full report covering all items detailed on section 4 "Scope of the MTR" with detailed attention to lessons learnt and recommendations and with annexes minimally including (List of Persons interviewed, summary of field visits, list of documents reviewed, questionnaire and summary of results, co-financing and leveraged resources, etc.)	Within 2 weeks of the review mission	Sent to UNDP CO reviewed by RTA, PCU, INGRH, GEF Operational and Political Focal Point	40%
Final Report	Revised report with audit trail detailing how all received comment have (and have not) been addressed in the final review report.	Within 1 week of receiving UNDP, executing agency (INGRH) and GEF OFP comments on draft	Sent to UNDP CO	35%

The report together with the annexes shall be written in English and Portuguese and shall be presented in electronic form in MS Work format to facilitate comments and PDF format.

#### **10. IMPLEMENTATION ARRANGEMENTS**

The principal responsibility for managing this review resides with the UNDP Country Office (UNDP CO) in Praia, Cape Verde. The UNDP CO will contract the consultants and ensure the timely provision of schedule payments. The Head of Environment, Energy and Disaster Prevention at the Joint Office of UNDP/UNFPA /UNICEF (Antonio Querido) will be the supervisor of this consultancy. The NAPA follow up project team will be responsible for liaising with the review team to set up

stakeholder interviews, arrange field visits with missions. The project coordination unit (PCU) will assist the review team with travel arrangements and scheduling. The PCU is responsible as well for providing logistics for debriefing session.

#### **11. Application Process**

All applications including P11 form, CV, and technical and financial proposals should be submitted to the email address, <u>procurement.cv@cv.jo.un.org</u> indicating the following reference "International Consultant for **"MTR - Building adaptive capacity and resilience to climate change in the water sector in Cape Verde"** by 25 April 2013 COB. Incomplete applications will be excluded from further consideration.

Recommended Presentation of Proposal:

- Introduction about the consultant/CV and P11
- Proposed review methodology and work plan;
- Financial proposal, including proposed fee and all other travel related costs (such as flights tickets, living allowance, etc.)
- Sample of executive summary of a mid-term review or any other type of evaluation report leaded by the applicant

**Criteria for Evaluation of Proposal:** The selection will be made based on the educational background, experience on similar assignments and the quality of the technical proposal (70%). The financial proposals will weigh as 30% of the total scoring

*Terms of reference approved by:* 

António Querido

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(Head of Environment, Energy and Disaster Prevention at the Joint Office of UNDP/UNFPA/UNICEF) Praia, 5<sup>th</sup> April 2013 Annex 2: Internal misison report including itinerary for MTR, list of interviewees, and site reports

Instituto Nacional de Gestão dos Recursos Hídricos

#### WWW.INGRH.CV

#### Projecto de Reforço das Capacidades de Adaptação e Resiliência às Mudanças Climáticas

no Sector dos Recursos Hídricos em Cabo Verde

### Relatório da Missão de Avaliação a Meio Percurso

Santiago de 2 a 4 de Julho de 2013

Santo Antão de 7 a 11 de Julho de 2013

#### Composição da Equipa do Projecto:

Eng.º António Querido – Chefe da Unidade do Ambiente do PNUD Eng.ª Marize Gominho - Coordenadora Nacional do Projecto Eng.º João Baptista Freire de Andrade – Perito em Gestão de Água e Investimento Eng.º Rui de Jesus Cabral – Coordenador Regional do Projecto Dra. Kátia Regina D'Assunção Ramos – Especialista em Mudanças Climáticas Dra. Aparecida oliveira – Especialista em Comunicação

### **Consultores:** Dra Juliane Zidler – Consultora Internacional Dr<sup>o</sup> Carlos Monteiro – Consultor Nacional

#### **Objectivo da Missão:**

Apresentar aos consultores as realizações do Projecto

Oferecer aos consultores as informações solicitadas pelos mesmos

Acompanhar os consultores nas visitas às áreas de intervenção do projecto.

#### Actividades realizadas em Santiago 2 a 4 de Julho -2013

DATA: 2 e 3 de Julho de 2013 -

A missão de avaliação do Projecto começou no dia 2 de Julho com a recepção aos consultores na sede do projecto, onde foi realizada uma reunião com toda a equipa.

Neste encontro a Coordenadora Nacional, Eng.ª Marize Gominho fez uma apresentação do Projecto. Em seguida foi apresentada aos consultores uma proposta da agenda de trabalho.



No mesmo dia teve início as visitas aos parceiros institucionais, a começar pela presidente do INGRH, Eng.ª Lourdes Lima, seguida da visita à Protecção Civil, onde foram recebidos pelo presidente Armindo



presidente Lima.



Na sequência das actividades programadas os consultores visitaram a DGPOG do MAHOT, Drª Tatiana Neves, o A DGA, onde foram recebidos pelo DG, Moisés Borges, o directo do INMG; Dr. Francisco Correia e a presidente do INIDA, Drª Aline Rendall



A agenda de visitas prosseguiu conforme previsto (vide quadro abaixo)

Data	Hora	Local	Visita técnica (Institucional ou Terreno)	Responsável
02 /07	8:00-		UNDP	Briefing com a Vice
	9:30			Representante Sr <sup>a</sup> Narjess
				Encontro com a Equipa Unidade do Ambiente
02/07	11:00	Sede	Reunião com Equipa do Projecto	Marize Gominho
02/07	14:30	Chã de Areia	Instituição - INGRH	Presidente – Lourdes Lima
02/07	16:00	Achada Grande	Instituição – Protecção Civil	Presidente – Armindo Lima
03/07	9:00	Achada Santo António	Instituição – DGPOG - MAHOT	Dr.ª Tatiana Neves
03/07	10:00	Achada Santo António	Instituição – DGA	DG - Dr. Moisés Borges
03/07	11:30	Achada Grande Frente	Instituição - INMG	Administrador – Francisco Correia
03/07	14:00	São Jorge dos	Instituição - INIDA	Presidente – Aline Rendall

		Órgãos					
04/07	9:00	Santa Cruz	Encontro com o Comité de Concertação Local –Ribeira Seca				
04/07	11:00	Ribeira Seca	<ul> <li>Visita:</li> <li>Dique de Espalhamento de Agua</li> <li>Plantação de Babosa e Arretos - Montante da Barragem</li> <li>Estufa - Ricardo</li> </ul>				
04/07	13:00		Almoço - Tarrafal				
04/07	15:00	Tarrafal	Encontro Comité de Concertação Local				
04/07	16:30	Tarrafal	Visita: • Plantação de Babosa – Achada Bilim, Monte Covoada • Estufa – Cuba Baixo				

#### DATA: 4 de Julho de 2013

As actividades do dia 4 começaram com a reunião do comité de concertação local da Ribeira Seca, que contou com a presença do presidente da Câmara de São Lourenço dos Órgãos, Victor Baessa, e da delegada do MDR, Cândida Cardoso. Durante a reunião, os consultores avaliadores ouviram depoimentos dos agentes de terreno e membros das comunidades das áreas de intervenção do projecto na Ribeira Seca.



Após a reunião foram feitas visitas de terreno, sendo a primeira às obras de construção do dique de espalhamento de água que está sendo construído em Ribeira Seca, seguida da plantação de babosa e arretos a montante da barragem do poilão e também uma estufa




com a participação da delegada do MDR, Engª Ramos .

No mesmo dia, à tarde, toda equipe se deslocou para o Concelho do Tarrafal, onde aconteceu a reunião



com o comité de concertaçã o local, que contou Eveline



Após a reunião, a missão fez uma visita a uma plantação de babosa em Achada Bilim, Monte

Covoada uma em Cuba



área de

e a estufa Baixo.

Actividades realizadas em Santo Antão 7 a 11 de Julho -2013

As actividades em Santo Antão, iniciadas no dia 8 de Julho com a visita a uma área de rega gota a gota na localidade de Ribeirãozinho, transcorreram conforme a agenda abaixo.

Missão em Santo Antão				
07/07	18:00		Partida para São Vicente	
08/07	7:00		Partida para Santo Antão	
08/07	8:30	Porto Novo	Visita:	
			<ul> <li>Rega Gota Gota –</li> </ul>	
			Ribeirãozinho	
08/07	13:00		Almoço em Lajedo	
08/07	14:30		Visita:	
			<ul> <li>Rega Gota gota – Jorge</li> </ul>	
			Luis	
-			Estufa – Ribeira da Cruz	
09/07	8:00		Partida para Ribeira Grande	
09/07		Ribeira	Paragem na Sede do Projecto	
		Grande	Visita:	
			<ul> <li>Diques – Matinho</li> </ul>	
09/07	13:00		Almoço Ribeira Grande	
09/07	14:30		VISITA:	
			Rega Gota Gota –	
10/07	0.00	Piboira	Mocrio de Garça	
10/07	9.00	Grande	Encontro com o Sr. Presidente	
		Grande	da Camara Municipal	
10/07	13:00		Almoco em Ribeira Grande	
	14:00		Partida para Porto Novo	
	15:00	Porto Novo	Comité de Concertação local	
			Encontro com a Srª. Presidente	
			da Camara Municipal	
	17:00		Partida para São Vicente	
11/07	9:00	São Vicente	Resumo da Visita	
	15:00		Partida para a Praia	



Visita reservatório em Mocho de Garça



Visita a estufa em Ribeira da Cruz











A missão foi encerrada com uma reunião de toda a equipa, presidida pela consultora Juliane Zeidler, que a seguinte pauta:

- 1. Objective
- 2. Lesson learned + best pratices
- 3. Policy messages
- 4. Comunication and training
- 5. PIR (DO, IP) + TEM
- 6. SRF+ indicator review
- 7. Open sessions
- 8. Closing/Way format



A consultora realizou uma dinâmica com a equipa, para identificar as lições aprendidas e as melhores práticas



Anexo I – Listas de presence

# Reunião do comité de concertação local

Local: Sala de reunião da Delegagão do MDR-Jaracunda

Data: 04 de Julho de 2013

# Lista de presença

Nº ordem 16 16 16
Nome Hatia & D'Asuncas Armes Interio Querido Orice de Jonie Cordons
Instituição PhC UNAS SPL T- D.J
5 - 30 - Cruz
Função
Assinatura Halia James and Ta

### PROJECTO DE REFORÇO DAS CAPACIDADES DE ADAPTAÇÃO E RESILIÊNCIA AS MUDANÇAS CLIMÁTICAS NO SECTOR DOS RECURSOS HÍDRICOS EM CABO VERDE

Lista de Presença

Reunião de Comité de Concertação Local Tarrafal, 04 de Julho de 2013

N°	Nomes	Instituição
01	Rui de Jesus Semedo Cabral	PMClimatica
02	Selice Rarroz	Delegooo do reex Tarrabi
03	Manize Gominho	Phalimatica coold.
04	Maria carreia Semera Varia	Preservation A ACTI
05	Have Edler	AUUD, TC
06	CARLOS A. Strad MONTERS	Contto Variant las
07	Katia R D'Assunção Ramos	PTC, - EED M. Climaticas
08	Itan & Freiri Andale	P.M.C. INGRA
09	Viston Kentes	Colonana Konscipal Sa Jamph
10	Inácio Barbora	SAAS- Tarrotal
11	Isias Leves de lina	Fidus de Bisihha Casral
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Coordenação Regional de Santa Cruz e Tarrafal

	INGRH - Instituto PROJECTO DE REFORÇO DAS CA CLIMÀTICAS NO SECT COORDENAD Tema: MISSÃ & AV Local: Câmara M. Pout	Conselho Nacional o Nacional de Gesti PACIDADES DE ADA FOR DOS RECURSOS CÃO REGIONAL I Lista de Prese	de Agua ao dos Recu PTAÇÃO E R HÍDRICOS E EM SANTO nça $co roj ta: lo (07)$	ANTÃO
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3	Pauline Coste Fity	TNGEH	9838500	Paulin Brb Bal
4	Kalia Rigina D'Assurgas Romos	THYC - INGRH	9141154	Rathia Juayna Dama
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7	Hatonio Querlas	UNDO	778-0655	antoninguerisper pu
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### Annex 3: Transcripts of consultations – report by National Consultant

# AVALIAÇÃO A MEIO PERCURSO DO PROJECTO

## "Building adaptive capacity and resilience to climate change in the water sector in Cape Verde"

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### Contexto da avaliação

In accordance with the UNDP and GEF M&E policies and procedures, a mid-term review of the full-size project" Building adaptive capacity and resilience to climate change in the water sector in Cape Verde " implemented through the National Institute for Water Resource Management (INGRH) is to be undertaken in 2013. The project started on the, 2009 and is in its third year of implementation of full implementation. This Terms of Reference (TOR) sets out the expectations for this mid-term review.

### **Objectivo do projecto:**

The project's goal is to ensure that water availability, supply and quality are maintained in the face of changed climatic conditions. The project objective is to increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to the water sector in Cape Verde. In order to achieve the above objective, and based on a barrier analysis, the project's intervention has been organised in three components under which three 'outcomes' are expected from the project

### Resultados do projecto

> Outcome 1: Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.

> Outcome 2: Small and medium scale climate change adaptation practices for water resource management are demonstrated and implemented in selected hydrographical basins.

> Outcome 3: Lessons learned and best practices from pilot activities, capacity development initiatives and policy changes are disseminated.

### Objectivo da avaliação

The objective of the MTR is to provide an independent analysis of the progress of the project so far. The MTR will identify potential project design problems, assess progress towards the achievement of the project objective and outcomes, identify and document lessons learned (including lessons that might improve design and implementation of other UNDP-GEF supported projects), and make recommendations regarding specific actions that should be taken to improve the project. The MTR will assess early signs of project success or failure and identify the necessary changes to be made.

The review will include both the evaluation of the progress in project implementation, measured against planned outputs set forth in the Project Document (PRODOC) in accordance with rational budget allocation and the assessment of features related to the process involved in achieving those outputs, as well as the initial and potential impacts of the project. The review will also address underlying causes and issues contribution to targets not adequately achieved.

### Principais responsabilidades do consultor nacional:

- Identify, compile and organize, in partnership with the technical team of the Project, all the documents needed for the desk review phase.
- Support the systematization and interpretation of all project documents. Especially when it relates to monitoring and evaluation reports and consultant report for which a translated version is not available in a language understood by the international consultant
- Support preparation of technical guidance's, questionnaires, agendas and talking points for the interview, visits and meetings
- > Facilitate meetings and interviews with partners and national institutions
- > Analyze the conclusions of the interviews, field visits and meetings

- > Participate in the preparation and edition of the final report:
- Support interpretation of comments and questions
- Support on addressing all comments and integrate contributions
- > Lead the session to present the final evaluation report with national partners
- > Ensure quality control of the Portuguese translation of the final evaluation report.

### Metodologia prevista e utilizada na MTR

The mission will start with a desk review of project documentation and also take the following process:

a. Desk review of project document, outputs, monitoring reports, such as Project Inception Report, Minutes of Project Board meetings and Technical Support and Advisory Team meetings, Project Implementation Review (PIR), Quarterly Progress Reports, M&E framework, mission reports and other internal documents including financial reports and relevant correspondence;

b. Review of specific products including datasets, management and action plans, publications, audiovisual materials, technical packages, consultancies reports and other materials and reports;

c. Interviews with the Project Managers, technical specialist and other project staff

d. Interview with Program Officers in charge of project oversight at UNDP CO;

e. Finance and Operation Manager at UNDP CO authorizing direct payments;

f. Interview with project executing agency: INGRH president, finance Officer and Program Officer at executing partner;

g. Field visits to conduct consultations and/or interviews with relevant stakeholders involved, including government's representatives, local communities, NGO's, private sector, donors, other UN agencies and organizations.

h. Field visit to interview project beneficiaries (community associations, local officials, farmers, water boards, etc.)

### Realização da avaliação

Ilha de Santiago

Praia

Assinei o contrato com o PNUD como consultor Nacional a 2 de Julho de 2013.

1. Nesse mesmo dia, na sede do projecto (unidade coordenação) teve lugar a primeira reunião no quadro da avaliação a meio percurso do projecto Reforço das Capacidades de Adaptação e Resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde, presidida pela coordenadora Marize Gominho. (c. Interviews with the Project Managers, technical specialist and other project staff; d. Interview with Program Officers in charge of project oversight at UNDP CO).

### Participantes da reunião:

Juliana Zeidler, consultora internacional; Carlos Monteiro, consultor nacional, João baptista Freire, especialista de irrigação e investimento; kátia d'Assunção, especialista de políticas; Maria Aparecida, especialista de comunicação; Elizabeth, contabilista/responsável financeiro do projecto; Antonio Querido, funcionário do PNUD responsável pelos programas ambientais.

A reunião teve por objectivo fazer de dar uma apresentação global do projecto, suas componentes, localização das intervenções, experts afectos ao projecto, principais actividades realizadas e resultados previstos e obtidos até agora.

A coordenação do projecto apresentou a agenda a ser realizado durante a avaliação que começa hoje dia 2 com os encontros com os técnicos, instituições, associações e visitas de terreno até ao dia 11 de Julho de 2013.

Fomos informados que a actual coordenadora, assumiu a responsabilidade à menos de 5 meses, pelo que ainda está a entrar na gestão do projecto. Para além da coordenadora o projecto conta com 2 coordenadores locais, sendo 1 em S.Antão e outro em Santiago, com actividades a decorrer em algumas Bacias Hidrográficas dos concelhos de Ribeira Grande e Porto Novo, e nos concelhos de S.Cruz, S.Lourenço dos Orgãos e Tarrafal respectivamente.

Os especialistas do projecto têm responsabilidade em função dos resultados previstos no PRODOC, sendo:

**katia d'Assunção Ramos**, Resultado 1- Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.

**João Baptista Freire**, Resultado 2 - Small and medium scale climate change adaptation practices for water resource management are demonstrated and implemented in selected hydrographical basins.

**Maria Aparecida Oliveira**, (especialista <u>recrutada à menos de 2 meses</u>) Resultado 3 - Lessons learned and best practices from pilot activities, capacity development initiatives and policy changes are disseminated.

A coordenadora e os demais técnicos falaram sobre as actividades já realizadas, tendo também informado sobre a realização de um primeiro inquérito de vulnerabilidade (VRA) realizados em S.Antão e Santiago, devendo até ao fim do ano ser realizado mais um, sobre a constituição e reuniões durante os três anos de execução do projecto efectuadas do comité de pilotagem (1), este composto de um número restrito de instituições e do comité técnico (1) e este constituído por várias instituições da administração e organizações da sociedade civil.

Sobre o Plano de Acção e Gestão Integrada dos Recursos Hídricos (PAGIRH) elaborado em 2008, DECRP II bem como o Plano Estratégico de Desenvolvimento Agrícola (2014), os quais segundo PRODOC deve ser introduzido a importância a ter sem conta as ameaças das Mudanças Climáticas, pois que a elaboração do PRODOC foi posterior à elaboração desses documentos. O DECRP III deverá ter explicitamente a questão das Mudanças Climáticas.

A respeito da sustentabilidade do projecto ficou claro que as actividades realizadas em estreita ligação com as Associações e o MDR garantem esse indicador.

2. A coordenação do projecto disponibilizou sala, secretária, relatórios e demais documentos do projecto. (a. Desk review of project document, outputs, monitoring reports, such as Project Inception Report, Minutes of Project Board meetings and Technical Support and Advisory Team meetings, Project Implementation Review (PIR), Quarterly Progress Reports, M&E framework, mission reports and other internal documents including financial reports and relevant correspondence;)

3. Após a reunião na sede da coordenação do projecto, os avaliadores deslocaram-se às instituições envolvidas no projecto. (f. Interview with project executing agency: INGRH president, finance Officer and Program Officer at executing partner; g. Field visits to conduct consultations and/or interviews with relevant stakeholders involved, including government's representatives, local communities, NGO's, private sector, donors, other UN agencies and organizations. b. Review of specific products including datasets, management and action plans, publications, audiovisual materials, technical packages, consultancies reports and other materials and reports;)

**INGRH**. (02/07/2013) Fomos recebidos pela presidente Lourdes Lima. Foi-nos informado sobre a execução do projecto, tendo destacado as dificuldades iniciais na gestão do projecto, nomeadamente o recrutamento da coordenação do projecto e do especialista de gestão de água, e das exigências administrativas do PNUD. Também informou sobre algumas metas/indicadores que parecem não estar bem definidas no PRODOC, pois que são difíceis de serem alcançadas.

Como efeitos positivos do projecto a presidente destacou:

- Sensibilização do público para as mudanças climáticas
- Realização de formações a nível dos sítios, abrangendo agentes diversos
- Instalação de parcelas irrigadas e aumento da área irrigada
- Realização de obras de CSA
- Divulgação de actividades do projecto
- Realização de formação destinada aos jornalistas
- Realização de formação destinada aos deputados

Respeitante às novas actividades do INGRH

- Continuação dos resultados do projecto
- Reforço dos resultados e divulgação

**PROTECÇÃO CIVIL.** (02/07/2013) Fomos recebidos pelo presidente, senhor Arlindo Silva, o qual devido ao pouco tempo que está no cargo e tendo em conta que o funcionário que costuma participar nos encontros com o projecto, não estava presente, não nos pode dizer muita coisa sobre as actividades do projecto relativamente ao seu serviço.

Informou que a Protecção civil tem estado a reagir e não a prevenir, pelo que se deve inverter essa situação. Relativamente aos riscos climáticos identificou-os seguintes:

- Chuvas caídas nos últimos anos em algumas ilhas, nomeadamente em S.Nicolau e na Boavista.
- Subida de água dos mares em algumas zonas e ilhas
- Construção de habitação nos declives

Como actividades futuras do projecto propõe:

- Continuação de formação
- Elaboração de um mapa de riscos em Cabo Verde

**MAHOT.** (03/07/2013) Fomos recebidos pela Directora Geral da DGPOG, senhora Tatiana Neves, recentemente nomeada para o cargo. Ela devido à recente nomeação, nada nos pôde dizer sobre o projecto. Informou que o INGRH está em processo de reforma e que vai ser transformado numa agência denominada de ANAS.

DGA. (03/07/2013). Fomos recebidos pelo Director Geral, senhor Moises Borges

O Director Geral informou aos consultores a sua visão a respeito do impacto do projecto tendo afirmado que o mesmo tem boa impressão junto das comunidades rurais e tem construindo infra-estruturas de CSA (físicas e biológicas) em S.Cruz e no Tarrafal na Ilha de Santiago.

Considera que a área irrigada a criar nas duas ilhas prevista pelo projecto, tendo em conta o pouco orçamento disponível (o custo actual por hectare de sistema gota-a-gota não chega para a superfície indicada), pelo que o projecto devia ser concentrado numa única Ilha. Considera também que a modalidade de pagamento dos salários/gratificação do pessoal é o mais adequado.

No que respeita à presença do CTA durante o projecto, que este não devia ter sido de longa data como foi o caso do senhor Oliver. Considera importante que o PNUD deve sempre contactar com a DGA no que respeita ao contrato dos experts e que estes no caso em apreço devem conhecer os projectos GEF, ter experiência na área, falar português, conhecer a realidade dos SIDES e ter experiência africana.

Sobre o co-financiamento, este ponto consiste na identificação dos projectos executados no país que se enquadram nas mudanças climáticas e bem como o numero de quadros do MAHOT valorizado em salários.

O projecto tem contribuído para sensibilização e formação dos parlamentares e agentes municipais em matéria das mudanças climáticas.

O atraso no recrutamento do coordenador do projecto atrasou a realização das reuniões do comité de pilotagem e de técnico.

**INIDA**. (03/07/2013). Fomos recebidos pela Presidente, senhora Aline Rendall Considera que as actividades do projecto no que respeita ao INIDA vão bem, visto que existe um protocolo assinado com o INGRH para a execução e análise do funcionamento dos sistemas de rega gota-a-gota. Um técnico do INIDA, José Teixeira está a fazer o seguimento desse protocolo.

Esse protocolo irá dar informações uteis sobre o funcionamento do sistema de rega, pois que permitirá ter informações para desenvolver um pacote tecnológico, formar extensionistas e difundir junto dos agricultores envolvidos nos concelhos de S.Cruz, Tarrafal, S.Lourenço dos Orgãos, Tarrafal, Rª Grande e Porto Novo.

A especialista de comunicação Mª Aparecida, informou que as informações sobre o projecto têm sido difundidas no programa rádio comunitárias e Nôs Guentis. Para além disso foram elaboradas duas brochuras também sobre o projecto.

**INMG.** (03/07/2013). Fomos recebidos pelo delegado do INMG em Santiago, senhor Francisco Correia. Este responsável começou por nos informar o INMG é o ponto focal nacional pela Convenção da Mudanças Climáticas e do IPCC, e que o presente projecto é de adaptação e enquadra-se no NAPA.

Neste projecto o INMG assinou com o INGRH um protocolo para a instalação de 5 estações automáticas nas zonas de intervenção. Sendo 3 em Santiago e 2 em S.Antão, os quais irão permitir realizar cálculos sobre as necessidades de água para rega nas parcelas dos agricultores e de difundir as informações sobre as precipitações ocorridas através dos boletins meteorológicos.

Em Outubro o INMG irá apresentar a 3ª comunicação nacional

4. Os avaliadores tiveram encontros com os comités locais de coordenação e efectuou visitas de terreno em Santiago. (h. Field visit to interview project beneficiaries (community associations, local officials, farmers, water boards, etc.).

### Santa Cruz

**Delegação do MDR no Concelho de Santa Cruz. (04/07/2013)**. O comité local reuniu-se para ouvir e informar os avaliadores acerca do Project. Estiveram presentes: Delegado do MDR; presidente da Câmara de S.Lourenço dos Orgãos, Representante da Câmara Municipal de S.Cruz; OASIS, Delegado de Educação, membros das associações locais, equipa de coordenação e do coordenador local do projecto.

Apos as apresentações e informação sobre o objectivo da visita, a delegada do MDR fez uma apresentação sobre a área de intervenção dessa delegação. Cada membro do comité local fez uma apresentação da sua actividade tendo realçado os aspectos positivos e menos positivos da actividade do projecto nos concelhos S.Lourenço dos Orgãos e de S.Cruz.

Comité de concertação local de S.Cruz e Orgãos				
Aspectos Positivos	Aspectos Menos positivo			
Agro C	Irgãos			
Realização de obras de CSA				
Informação sobre as mudanças climáticas				
Melhor utilização de água para agricultura				
Extensio	onistas			
Intervenção na agricultura	Pouco dinheiro para realizar mais obras e muitas			
	expectativas dos agricultores			
Associação	de Covada			
Realização de obras de CSA	Poucas comunidades beneficiaram de intervenção devido			
	ao declive e dificuldades de transporte de materiais			
Sensibilização sobre o ambiente				
Melhor utilização de água para agricultura				
Agricultores da Ba	rragem de Poilão			
Boa coordenação local do projecto	Necessidade de mais projectos no concelho			
Plantação de Aloe vera, sementeira de feijão congo e outras				
plantas				
Formação na gestão de água				
Responsável pela água e saneamento da Câmara Municipal de S.cruz				
Boa capacidade do coordenador local				
Investimento realizado no sistema de bombagem de água				
para ETAR de Pedra badejo				
Criação da associação mãe d'água				
Delegação do MED				
Intervenção nos hortos escolares				
Formação de alunos e professores sobre o ambiente				
Realização de 5 formações de formadores nos concelhos do				
Orgãos e S.Cruz				
Realização de 2 mesas redondas na rádio sobre as mudanças				
climáticas				
Presidente da Câmara Munici	pal de S.Lourenço dos Orgãos			
Realização de obras de CSA				
Aumento da supercilie irrigada				
Participação na planificação das actividade4s do projecto				
Integração dos aspectos de mudanças climáticas no anexo e				
adenda do PDM				
Delegada				
Concertação, complementaridade das actividades do	Falta de algum material didáctico para melhor divulgação do			
projecto e do MDR	projecto, nomeadamente video			
	Falta de algum material para os abrigos			
	Impossibilidade de utilizar a internet do projecto			

Os avaliadores tiveram a oportunidade de visitar um abrigo financiado pelo projecto na Ribeira seca, do senhor Ricardo, bem como a construção de um dique próximo do mar na mesma ribeira.

### Tarrafal

**Delegação do MDR no Concelho de Tarrafal. (04/07/2013)**. O comité local reuniu-se para ouvir e informar os avaliadores acerca do Project. Estiveram presentes: Eveline Ramos, Delegada do MDR; Representante da Câmara Municipal de Tarrafal; OASIS e membros das associações locais, equipa de coordenação e do coordenador local do projecto.

Após as apresentações e informação sobre o objectivo da visita, a delegada do MDR fez uma apresentação sobre a área de intervenção dessa delegação. Cada membro do comité local fez uma apresentação da sua actividade tendo realçado os aspectos positivos e menos positivos da actividade do projecto no Tarrafal.

Comité de concertação local de Tarrafal				
Aspectos Positivo	Aspectos Menos positivo			
Presidente da asso	ciação Tras Monte			
Plantação de <i>Aloe vera</i>	Constata-se que os animais à solta que vêm comendo as			
	plantas fixadas pela associação			
Possibilidade de trabalho/emprego				
Associação Bibinha C	abral em Ponta gato			
Possibilidade dos Jovens trabalharem, terem emprego	Impossibilidade de dar mais emprego aos jovens da			
	localidade			
Fixação de babosa	A zona de fixação de babosa fica distante do local de			
	residência.			
Representante do serviço autónomo da água				
	Tem pouca informação sobre o projecto, pois que veio			
representar o seu colega				
Representante do vereador da água e saneamento, espaço verde da Câmara municipal				
	Tem pouca informação sobre o projecto, pois que veio			
	representar o seu colega			
Associação	Ponta Furna			
Plantação de Aloé vera				
Mobilização de água				

O coordenador local do projecto, Rui Cabral, fez uma intervenção sobre o projecto, procurando esclarecer alguns aspectos. A *Aloe vera* fixada no Tarrafal foi escolhida tendo em conta a capacidade de fixar bem o solo e proporcionar a recarga dos aquíferos.

O projecto tem apoiado a comunidade na formação, obras de CSA e irrigação. Essas actividades marcaram de facto a população pois que permitiram sensibilizá-las sobre as mudanças climáticas e poluição ambiental.

<u>Relativamente às prioridades para os próximos seis meses</u>, tem a destacar: criar as condições para a adequação dos recursos hídricos e as mudanças climáticas, através do uso racional da água e da plantação de babosa; equipamento de furo de achada grande para permitir a instalação de sistema de rega gota a gota na zona de Milho Branco.

O Extensionista Fidalgo, solicita que o projecto continue a construção de diques, realização de furos, captação de água na zona de Ponta Furna.

Os avaliadores visitaram as plantações de babosa e as culturas hortícolas, melão e melânica, em abrigo na zona de Ribeiras da Patas. A senhora que nos recebeu faz parte de um grupo de mulheres que o projecto e o MDR

apoiaram para a terraplanagem e instalação do abrigo. Foi realizada uma visita a zona de plantação de bobosa a Achada Bilim e Monte Covada.

### Ilha de S.Antão

Os avaliadores tiveram encontros com os comités locais de coordenação e efectuou visitas de terreno em S.Antão.

### Porto Novo

**No dia 8/07/2013**, os avaliadores chegaram à Ilha de S.Antão e deslocaram-se ao Concelho de Porto Novo, para ver as realizações do projecto nas parcelas dos agricultores beneficiados com o projecto.

Localidade de Ribeirãozinho, foram beneficiados 6 agricultores com sistema de rega gota a gota e reservatório de água. Os beneficiários têm a consciência da utilidade do sistema de rega que o projecto instalou, do ponto de vista agronómico e de rendimento familiar. A consciência das mudanças climática não foi realçada, visto que a pobreza fala mais alto.

Localidade de Jorge Luis, em Lajedos. Os beneficiários são abertos e com ideias claras no que respeita a utilização da rega gota a gota que o projecto instalou. Aqui também a consciência das mudanças climática não foi realçada, visto que a pobreza fala mais alto.

Localidade de Ribeira da Cruz. O beneficiário esta consciente do negocio do abrigo e do equipamento de gota a gota, que o projecto instalou. Aqui também a consciência das mudanças climática não foi realçada, visto que a pobreza fala mais alto.

O projecto tem intervenções complementares às do MDR, as quais têm impacto directo no rendimento das famílias.

**No dia 9/07/2013**, os avaliadores deslocaram-se para também contactar com os beneficiários do projecto e ver in loco as realizações físicas.

Lagoa. Pudemos ver a construção de um dique e contactar com alguns membros da associação. O projecto vai intervir também de forma comparticipada na adução de água para as populações. Aqui também a consciência das mudanças climática não foi realçada, visto que a pobreza fala mais alto.

Motche. Pudemos ver algumas parcelas com sistema de rega gota a gota instalada e um reservatório antigo restaurado, e reparação de terraços. Aqui também a consciência das mudanças climática não foi realçada, visto que a pobreza fala mais alto. A associação solicita a instalação de painéis solar no furo para bombagem de água.

### **Ribeira Grande**

**Delegação do MDR (10/07/2013).** O comité de concertação local do projecto no Concelho da Ribeira Grande, reuniu-se para ouvir e informar os avaliadores acerca do Projecto. Estiveram presentes: representante do MDR; membros das associações locais, equipa de coordenação e do coordenador local do projecto, representante da Saude; representante da Educação.

O coordenador local do projecto, interveio dizendo que há uma forte concertação entre o projecto e a Câmara Municipal relativamente à adução de água à Zona de Lagoa para a ligação domiciliária. Participam nessa concertação o programa de pequenas subvenções (GSP). Representante da saúde, interveio dizendo que tem participado nas reuniões de concertação e nas deslocações realizadas, de entre ela a visita à zona de Motche . No ano passado realizaram actividades com a participação da especialista, Kátia a respeito das mudanças climáticas, sobre água, segurança alimentar e doenças.

A especialista de integração de políticas no quadro das mudanças climáticas, esclareceu que ainda não está incluído no PDM do concelho da Rª Grande, as questões sobre as mudanças climáticas. Fizeram contudo a análise necessária para essa inclusão.

O coordenador local falou da ligação do PDM ao EROT e da importância em incluir as boas práticas sobre as mudanças climáticas nesses documentos de planificação.

**Câmara Municipal de Rª Grande (10/07/2013).** A equipa de avaliação reuniu-se com o senhor presidente da Câmara de RªGrande a fim de lhe informar a respeito da avaliação a meio percurso e aproveitar para conhecer a opinião sobre o projecto. O senhor presidente da câmara deu as boas vindas da equipa presente.

A respeito do projecto e das obras realizadas, o senhor presidente da câmara, falou da importância do projecto de adução de água a Lagoa, da necessidade de criação de empregos visto a pobreza da zona bem como nas zonas de Motch, Fontes Furnas, e Ribeirão que são as zonas mais pobres do concelho.

A câmara municipal aceitou a proposta de introduzir a questão das mudanças climáticas no PDM através da Adenda, pois que considera um aspecto muito importante.

O representante do PNUD fez algumas considerações, tendo feito a ligação entre as doenças e as mudanças climáticas, nomeadamente através da contaminação da água, ar, vento, etc. Também sugere que os programas dos serviços sejam mais intuitivo sobre os riscos ambientais a nível dos decisores.

**Comité local de concertação local (10/07/2013). Câmara Municipal de Porto Novo**. A equipa de avaliação reuniuse com os membros do comité a fim de lhe informar a respeito da avaliação a meio percurso e aproveitar para conhecer a opinião sobre o projecto. Estiveram presentes o Delegado do MDR no concelho, Vereador dos recursos naturais e gestão de água; delegado do MED, representante do INGRH.

O senhor vereador falou da participação nas actividades de planificação dos projectos, obras de CSA, formação sobre Mudanças Climáticas, gestão de água e na elaboração do PDM.

O Delegado do MDR, falou sobre a participação nas formações realizadas pelo projecto, sobre a importância da instalação de sistemas de gota a gota que são complementares às instaladas pelo MDR no Concelho. Considera importante que o projecto possa continuar.

O representante do MED, considera importante a realização do inquérito sobre a percepção do aluno sobre as mudanças climáticas pois que irá permitir melhorar o programa escolas e a formação dos alunos.

A representante do INGRH, interveio dizendo que participou em diversas formações, na planificação de actividades e também no inquérito sobre as vulnerabilidades (VRA). Considera importante o programa mãe d'água. Para alem disso considera que o mapeamento dos pontos de água realizado irá permitir conhecer e fazer uma melhor gestão dos recursos hídricos do concelho, faltando somente um programa informático para o efeito.

Sugestão: O mapeamento dos pontos de água poderá ser feito também com um programa mais simples, tipo aquele que o coordenador tem digitalizado os diques (Google),ou em concertação com a Câmara Municipal de Porto Novo aproveitando os ortofotos.

### S.Vicente

### Reunião final da equipa e consultores

De acordo com a agenda inicialmente prevista, a equipa do projecto e os consultores puderam reunir-se e fazer um brain storming sobre o projecto. O encontro teve o seguinte programa:

- 1. Objective
- 2. Lesson learned and best practices
- 3. Policy messages
- 4. Communication and training
- 5. PIR (DO, IP) + MTR
- 6. SRF + indicator review
- 7. Open sessions
- 8. Closing/way forward

De forma breve as especialistas Kátia Assunção e Maria Aparecida apresentaram as actividades conjuntas realizadas.

A especialista da comunicação Maria Aparecida, fez uma e aquelas que pretendem realizar até ao fim do ano de 2013. Importa referir que o tempo disponível e a necessidade de concertação e colaboração estreita entre os membros da equipa parece não ser possível realizar tantas actividades, mas identificar aquelas prioritárias para serem realizadas.

A coordenadora do projecto, Marize Gominho, fez analise dos indicadores previstos aos vários níveis (objectivo geral e resultados previstos). Foi realçado que é necessário verificar a percentagem disponibilizada pelo orçamento anual do Estado para o ambiente (MAHOT e MDR); a realização do segundo inquérito VRA e rever a metodologia. A consultora internacional sugeriu que os membros da equipa e os demais apresentassem numa folha de papel as actividades realizadas, que possam ser consideradas como boas práticas do projecto. De seguida cada um dos presentes escreveu num papel aquelas actividades que lhes parecem ser boas práticas.

Cada papel continha uma ideia, e o conjunto de ideias foram agrupadas em aspectos seguintes:

- Técnicas agronómicas;
- Estudos
- Participação local
- Participação intersectorial
- Divulgação
- Comunicação

### **Comentários gerais**

Resultado 1

- ✓ Forte envolvimento das comunidades, com a percepção geral riscos sobre as mudanças climáticas
- ✓ Forte envolvimento das autoridades locais, sobre percepção geral riscos sobre as mudanças climáticas
- ✓ Forte envolvimento das comunidades no comité de concertação local
- ✓ Envolvimento das entidades nacionais no Comité de pilotagem e técnico
- ✓ Iniciativa de inserção da questão dos riscos sobre as mudanças climáticas nos PDM e demais documentos nacionais
- ✓ Intensa actividade formativa sobre as questões de mudanças climáticas abrangendo muitos agentes do Estado e comunidades rurais

### Resultado 2

- ✓ Bom nível de execução física de obras de CSA
- ✓ Bom nível de execução de instalação de sistemas de rega gota a gota
- ✓ Início da organização da associação Mãe d'água envolvendo as mulheres
- ✓ Forte concertação entre o MDR e o projecto em matérias de obras de CSA e de irrigação gota a gota
- ✓ Identificação e mapeamento dos diques e pontos de água

### Resultado 3

- ✓ Alguma actividade de comunicação sobre as boas práticas
- ✓ Realização 2 brochuras
- ✓ Realização de programas de rádio
- ✓ Realização do 1º VRA e necessidade da realização do 2º inquérito VRA

### Boas práticas sobre os riscos de mudanças climáticas

- Técnicas agronómicas e de conservação dos solos
- Estudos
- Participação local
- Participação inter sectorial
- Divulgação
- Comunicação

Annex 4. Li A - macking output level implementation status of project interventions	Annex 4: LFA - Tracking	g output level im	plementation status	of pro	oject interventions
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OUTCOME	OUTPUT	ACTIVITIES IMPLEMENTED/ RESULTS ACHIEVED (indicative) –	EVALUATION COMMENTS
		summaries from annual reports and PIR 2011 & 2012	
Outcome 1: Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management	Output 1.1 Capacity of relevant agencies to identify and manage climate risks and vulnerability and to plan and implement adaptation measures within the water sector increased.	<ul> <li>2011: <ol> <li>Development of decentralize action plan</li> <li>Institutions identified; action plan developed?</li> <li>200 people consulted/trained?</li> <li>Survey of CC awareness?</li> <li>(2) Training needs assessment for approx. 150 people</li> <li>Training needs identified</li> <li>VRA at community level undertaken</li> <li>Trainings: technical – 52 participants; 8 training sessions relating to VRA (4 in Santiago, 4 in St Antao) – 72 farmers, 35 technical staff</li> <li>VRA base: 79,62%</li> <li>(3) Training of Trainers (ToT)</li> <li>Same trainings as above, VRA</li> </ol> </li> <li>2012: <ol> <li>Capacity development actions:</li> <li>Training of 59 technicians on climate change risk, vulnerabilities and opportunities delivered (to facilitate their own initiatives on capacity building).</li> <li>Training to the institutions that participated on the trainer-of-trainers sessions.</li> <li>Permanent technical advice provided to support capacity building strategies.</li> </ol> </li> </ul>	<ul> <li>The initial awareness survey/ capacity needs assessment that should serve as a baseline was not available for review at MTR</li> <li>Capacity building impacts were not tracked</li> <li>Strategic interventions should still be planned for the remaining project period</li> </ul>
	Output 1.2 Climate change resilient water management plans (including PAGIRH) revised and adopted.	<ul> <li>2011:</li> <li>(2) Analysis of relevant strategies and plans</li> <li>Consultations with relevant institutions (INGRH, DGA, INMG &amp; municipalities (PDM) and regional administration (PDRSA)</li> <li>Analysis of CC issues</li> <li>2012:</li> <li>(1) Establishment for:</li> <li>Municipal development, environmental and water</li> </ul>	<ul> <li>Any formal write-up of CC issues in the various plans? Any report? Limited documentation accessible.</li> </ul>

	Output 1.3 Awareness of 'climate risk, vulnerability & adaptation' in the water sector among decision- makers and technical officers, NGO players, the private sector and the media, farmers and community associations raised	<ul> <li>management plans analysis and revision.</li> <li>First selection of strategic, sectoral and municipal plans to be climate-proofed</li> <li>Revision of the National Environmental Plan to test screening approaches and methodologies to identify entry points on strategic plans</li> <li>2012: <ul> <li>(1) Raised awareness on climate change risk vulnerabilities and adaptative measures in the water sector</li> <li>Thematic theatre plays and sketches; group dynamics, talks and lectures targeting among community</li> <li>National conference attended by 82 national decision makers</li> </ul> </li> </ul>	•	Innovative outreach activities; would have been good to document experience for lessons learnt and best practices; would be good to demonstrate that approaches were vested in communication/capacity development best practices Impact monitoring would have made a strong contribution
	Output 1.4 Establishment of	2012:	•	So what? Will the data be
	climate change early warning system for the water sector to support	<ul> <li>5 automatic weather stations purchased and transferred to be operated by the National Institute of Meteorology and Geophysics (INMG)</li> </ul>		used to strengthen climate change resilience in the water
	national and municipal	<ul> <li>Technical orientations and methodological tools to treat and</li> </ul>	•	Not clear how data flows will
	development planning and implementation	analyse climate data and to prepare climate scenarios were provided to INMG and INGRH.		be implemented
Outcome 2: Small	2.1 Drip-irrigation	2011:	•	A lot fo activities and progress
and medium scale	techniques introduced and	(1) Revision of practices on basin level	•	Need to synthesize lessons for
climate change	demonstrated as a climate	• Preparation for drip irrigation projects, incl. local consultations		policy intergation
adaptation	change adaptation measure	and procurement of materials	•	Adaptationlearnign must be
practices for water	for water resource	• Selection of sites: 4.5 ha/p.a. Tarrafal, 5 ha/pa Santa Cruz/ Sao		formally documented and also
resource	management in 5	Lourenco dos Orgoas, 4.5 ha/p.a. Santo Antao		fed back to relevant target
management are	nyarographical basins	2012:		groups to ensure sustainabiity
demonstrated and		(1) Installed Drip-irrigations techniques on pilot sites in		and impact
selected		farmer's horticultural fields and school gardens		
hydrographical		90 farmers trained on installation and management of drip-		
basins		irrigation systems.		
		Santo Antão Island:		
		hydrographic basin of Ribeira da Garça, Ribeira das Patas e		

	<ul> <li>Ribeira da Cruz: 3 ha benefitting 12 families.</li> <li>Santiago Island: <ol> <li>1,4 ha horticultural fields benefitting 31 families, and 427 m2 of drip irrigation techniques demonstrated and divulgated with children and school community</li> <li>Protected crops (netting structures) combined with drip-irrigation techniques implemented in horticultural fields to demonstrate water efficient techniques and climate resilient agricultural practices: in concrete, 2 netting structures of 600 m2 were installed in Ribeira Seca (Macati &amp; Ponte de Orgãos) and 1 netting structure of 600 m2 was installed in Tarrafal (Cuba Baixo)</li> </ol> </li> </ul>	
2.2 Water recycling, infiltration and conservation techniques (i.e. nature- based and physical) demonstrated and implemented as climate change adaptation measures for agricultural and human use in 5 hydrographical basins.	<ul> <li>2011: <ul> <li>(1) Local water conservation practices</li> <li>CSA (?) - site and technique identification</li> <li>(3) CCA water sector measures implemented (biological)</li> <li>10 dikes (6 santiago, 4 Santo Antao) for ground water improvement built, benefiting 165 persons (144 in S and 21 in SA)</li> <li>Building of 7800 m of contour lines in S for soil &amp; water conservation, benefiting 63 people</li> <li>Planting of 538,510 Aloe Vera on 162 ha for soil &amp; water conservation (112 ha in S, 371,860 plants and 50 ha in SA, 166,650 plants)</li> <li>(4) Technical adaptation measures</li> <li>8 reservoirs built keeping 400m3 water; 6 in S, each holding 250 m3) and 2 in SA, each holding 150 m3</li> </ul> </li> <li>2012: <ul> <li>(1) Wastewater treatment plants</li> <li>The recycled waste water will be used for irrigation purposes in selected crops and fields.</li> <li>Biological water infiltration measures (aloe vera planting) in 162 ha (112 ha in Santiago Island and 371,860 plants; and 50 ha in Santo Antão and 166,650 plants).</li> </ul> </li> <li>(2) Physical conservation measures implemented by: <ul> <li>Construction of 10 check dams (6 in Santiago Island and 4 in Santo Antão).</li> </ul> </li> </ul>	<ul> <li>A lot fo activities and progress</li> <li>Need to synthesize lessons for policy intergation</li> <li>Adaptationlearnign must be formally documented and also fed back to relevant target groups to ensure sustainability and impact</li> </ul>

		• These infrastructures were built by community associations,	
		creating local employment and benefitting 165 people.	
	2.3 Rehabilitation and	2012:	
	monitoring of selected	(1) Decision to rehabilitate, expand or rebuilt structures:	
	existing water structures	• 2 water reservoirs of 200 m3 were rehabilitated in Mocho and	
	(reservoirs, terraces,	Ribeirãozinho (Santo Antão).	
	boreholes and dykes)	(2) Regarding monitoring actions:	
	demonstrated as climate	<ul> <li>Regular spot check to all existing structures and newly</li> </ul>	
	change adaptation	constructed ones to verify physical integrity and provide users	
	measures in 5	with specific maintenance and use recommendations that	
	hydrographical basins.	ensure their longevity.	
	2.4 Climate change risk	2011:	<ul> <li>A lot fo activities and progress</li> </ul>
	management measures	<ul> <li>Under review by local committees</li> </ul>	<ul> <li>Need to synthesize lessons for</li> </ul>
	adopted by representative	2012:	policy intergation
	water distribution facilities	• Initial contacts established with the government body in charge	<ul> <li>Adaptationlearnign must be</li> </ul>
	in selected areas.	of Poilão's (Santa Cruz) dam management to ensure that	formally documented and also
		climate change risks are integrated in the dam management	fed back to relevant target
		plan currently under preparation.	groups to ensure sustainabiity
		<ul> <li>Output 2.5 level at 30 June 2012: Memorandum with INIDA</li> </ul>	and impact
		(National Agricultural Research Institution) signed and action	
		plan prepared to detail cost-efficiency of irrigation systems and	
		crop varieties.	
		<ul> <li>Water meters were installed at the plot level to gather information on water efficiency of drip irrigation systems by</li> </ul>	
		ston variative and sail type	
		Crop water productive index will be established from the	
		• Crop water productive index will be established from the	
		<ul> <li>Information will be used to train farmers and extension</li> </ul>	
		workers on simplified production cost assessments feasibility	
		studies and agricultural investment return analysis.	
	2.5 The basis for the	2011:	• A clear weakness – no
	replication of all site level	Await IC and NC on M&E	progress reporting on this
	activities is established.	Inception meeting (See below PM)	output available
Outcome 3:	3.1 National multi-	2011:	Strategic element missing –
Lessons learned	stakeholder forum on	Await consultants (IC and NC M&E	but could be enhanced
and best practices	climate change resilient	<ul> <li>Training of 52 technical participants</li> </ul>	towards project end as now

from pilot activities are disseminated and integrated in national plans and policies	best practices in IWRM established and operational.	<ul> <li>Various awareness raising activities esp. with DGA</li> <li>VRA process 2012:         <ul> <li>(1) Regular learning and awareness raising events organized with:                 <ul> <li>Local health professionals (nurses and doctors associations)</li> <li>Education community (teachers and students).</li></ul></li></ul></li></ul>	<ul> <li>adaptation learning is emerging</li> <li>A clear weakness in project</li> </ul>
	3.3 Learning, feedback and adaptive management are ensured.	<ul> <li>2012:</li> <li>Hiring process of a monitoring and evaluation consultants is ongoing (never realised).</li> </ul>	A clear weakness in project implementation
Project management	Staff, consultants & office	<ul> <li>2010:</li> <li>Project coordinator hired; CTS hired; office set up</li> <li>2011:</li> <li>CB and IWMI experts hired</li> <li>TOR for NC (M&amp;E) and ICs (CB &amp; data analysis)</li> </ul>	

SC and TC a.o.	2011:	
	<ul> <li>April 2011: Inception meeting – adjustment of SRF; partnership building</li> <li>SC and TC set up; June SC and TC meetings; November TC</li> </ul>	
	meeting 2012:	
	<ul><li>November TC meeting</li><li>SC meeting January 2013</li></ul>	

### Annex 5: Project Strategic Results Framework (SRF)

(as set out in project document and updated at project inception workshop, including comments on progress at MTR).

Objective/ Outcome	Indicator	Baseline	End of Project target	Source of Information	Risks and assumptions	Results/ Comments at MTR
<b>Objective</b> – To increase resilience and enhance key adaptive capacity to address the additional risks posed by climate change to water sector in Cape Verde.	1. Water management strategies and plans, as well as and other plans related to water explicitly consider climate change risks and opportunities as well as the need to integrate adaptation into these plans and strategies: - PAGIRH (National Action Plan for Integrated Water Resources Management) - PEDA (Strategic Programme for Agricultural Development - PAM (Municipal Action Plan) - Municipal Development Plans (PDM) of Santa Cruz, Tarrafal, Porto Novo and Ribeira Grande - PAIS (Intersectorial Environment Plan) on water	These plans and strategies do not explicitly consider climate change risks and opportunities and neither the need to adapt them in light of climate change impacts	Plans (PAGIRH, PEDA, PAM and PDM of Santa Cruz, Tarrafal, Porto Novo and Ribeira Grande as well as PAIS on water resources) have introduced an addendum or annex for climate-proofing	1) Approved climate-proofed addendum or annex 2) Verification by independent mid-term and final project evaluations	Risk: Political resistance to adjust 'governance frameworks' (policies, plans, strategies, programs etc.) Globally-induced recession in the years to follow will impact public expenditure negatively affecting the expected allocation for adaptation. A delay of funds disbursement could lead to an implementation delay	<ul> <li>Reportedly certain contributions were made to the PAGIRH and PDM of Porto Novo; no explicit evidence was provided in terms of submitted or integrated comments/ Annexures developed</li> <li>The project team explicitly stated that most relevant deliverables will be produced between MTR and TE (only around 6 months left)</li> </ul>
	2. Percentage of Ministry of Environment, Habitat and Territorial Planning (MAHOT) budget allocated to managing climate change risks.	<15,000 USD/year or 0.1% of MAHOT's non- external budget	At least 100,000 USD/year or 1% of MAHOT's non- external budget	Monitoring and update of the state budget	Assumption: Baseline conditions in the selected areas can be extrapolated with high confidence level to other Cape Verde areas and	<ul> <li>This indicator has been revised to look at the state budget.</li> <li>Relevant state budget information has been synthesised by the national consultant for further use by the project team</li> </ul>

	3. Scores of UNDP's Vulnerability Reduction Assessment (VRA) to be applied upon inception, mid-term and end-of- project in project-site communities	VRA baseline index is 80 (vulnerability perception at this stage is still high)	60 (vulnerability reduction of 25% as a result of project activities)	Independent technical vetting of results of the VRA by UNDP/GEF upon inception, and by the evaluators by mid-term and project end	lessons learnt can be successfully disseminated.	•	There are methodological problems with the VRA A VRA assessment was undertaken in early 2013 by SGP, however, new target groups were used and no comparability of data is given A final assessment must be undertaken before project end
Outcome 1 – Climate change risks and adaptation measures integrated into key national policies, plans and programs for water resource management.	1. Key national policy frameworks relevant for the water sector effectively incorporate climate risk consideration and adaptation measures: Focus on PRSP II (2008- 2011), chapter 5.9 on Integrated Water Resources Management	Sensitivity: "The PRSP II does not directly refer to climate change" Adaptation Viability: "There is no reference to the benefits of optimization of water consumption, particularly relevant for economic sectors tourism, industry, agriculture (irrigation); the capacity to increase water supply to meet non- rationalised demand is expensive and may compromise the achievement of other strategic objectives, like the level of	Sensitivity: PRSP III, when it is produced makes direct reference to climate risk in the water sector. Adaptation Viability: Adaptation options and opportunities are fully incorporated in the next PRSP.	Application of the Assessment of Climate Risks And Opportunities In The PRSP-II (Santos 2008). Other relevant reports	<b>Risk:</b> Political resistance (as above) Assumption: Increased awareness and capacity will lead to a change in behaviour with respect to climate risk mainstreaming into relevant 'governance frameworks', particularly as it relates to water.	•	Due to the restructuring of the organisation of the PRSP a new approach was developed to the indicator No evidence on progress was provided

		independence from fossil fuels."					
	2. Number of key agencies having taken institutional measures to respond to climate change	Currently 4 institutions (DGA, INGRH, INMG and DGASP) are taking initial measures to respond to climate change – baseline statement to be completed by qualitative survey	By project end, three additional institutions will be taking explicit measures to respond to climate change This includes: - the National Association of Cape Verde Municipalities (ANMCV); - Tourism and Industry; - the Ministry of Infrastructure and Marine Resources, (MITRM)	Qualitative surveys covering selected agencies with results vetted independently by UNDP/GEF upon inception, and by the evaluators by mid-term and project end		•	No specific baseline and progress information on this indicator was presented by the team A previous institutional review undertaken by UNDP is available This information has not been incorporated by the project team into progress tracking
Outcome 2 –	1. Within project target	Baseline not	Surface area increas	Project site	Risks:	٠	The indicator sunder
Small and	sites, increases in: (1)	quantitatively	by 50% and family	maps	Cultural barriers in		outcome 2 have been
medium scale	cropland surface	established. This is in	numbers increase by	(zones)	accepting new		revised
climate change	area where water saving	progress.	30% through to the	indicating	techniques can be	•	Baseline information was not
adaptation	measures are adopted;		introduction of	occupied land	expected.		available or shared at time of
practices for	and		technical water	area			MTR
water resource	(2) number of families		conservation	and number of	Water conflicts may	•	Some initial summary
management	involved in water		measures (drip	families	be		information of work
are	conservation measures		irrigation), to save	involved in	exacerbated by		conducted is available from
demonstrated	Increase in the surface		water and irrigate	water	drought,		draft project sheets
and	area and numbers of		more land.	management	if such event		(produced in June
implemented in	tamilies involved in			as well as water	nappens during project		2013Numerous relevant
bydrographical	water preserving			quantities used	implementation		investments have been
hasing	areas of the project			site	implementation.		made
Dasilis	2 Increase in the surface	Number of families	The absolute number	Project site	Assumptions:	Ibi	d
	area and numbers of	involved	of families involved	mans	Baseline conditions		u
	families involved	in traditional	in	with number of	in		

<sup>&</sup>lt;sup>49</sup> The above, which represents the baseline situation, is quoted from "Assessment of Climate Risks and Opportunities in the PRSP-II: Integrating Climate Change Into Cape Verde's National Development Process" (Sérgio Teixeira Santos, 2008 - As part of the Spanish funded project "Integração de Riscos e Oportunidades das Mudanças Climáticas nos Processos de Desenvolvimento Nacional e na Programação Nacional da ONU").

	in water preserving initiatives in the target areas of the project	irrigation affected by water stress (assumed at around 70%, though absolute number is still to be defined). At project sites, traditional agriculture allows for only one cultivation cycle per year due to water stress.	water management activities having a second harvest (second season) increases by 30%. The assumption is that this will be due to new irrigation techniques, which will reduce water wastage as well as increase water use efficiency at the same time.	families and land holdings involved in water conservation with new production periods	the selected areas can be extrapolated with high confidence level to other Cape Verde areas and lessons learnt can be successfully disseminated (as above).		
Outcome 3 – Lessons learned and best practices from pilot activities are disseminated, and	1. Number of hits on project website from Cape Verdean visitors	0	100 per month	Website will generate this information. Target may be adjusted to reflect good performance.	Assumption: Climate change adaptation measures will gradually become a national priority for the water sector as	•	No website has been established to date (see PIR 2011 and 2012 for motivations) As of July 2013 INGRH has launched their website
integrated in national plans and policies.	2. Number of contributions to the UN's Adaptation Learning Mechanism (ALM)	0	2 per year	ALM website	knowledge and information is available.	•	2 ALM contributions have been submitted; one is in preparation

### Annex 6: List of documents consulted in support of MTR

Actividades para Implementação do Resultado 3. (2012). Lições aprendidas e melhores práticas extraídas das actividades piloto, iniciativas de desenvolvimento de capacidades e mudanças de políticas são divulgadas. (Plano de Acçao-Ano 2012)

Análise plano de trabalho - 2 Trimestre NAPA. (2013)

- Andrade, J.B.F.. (2012). Projecto de reforço das Capacidades de Adaptação e REsiliência Às mudanças climáticas no sector dos recursos hídricos em Cabo Verde. Instituto Nacional de Gestão dos Recursos Hídrico (Activities Report)
- Assistente Administrativo e Financeiro . (2012). Gestão do Projecto.( Plano de Ação de Trabalho ANO 2012- 3 Trimestre)
- Badejo, P. (2012). Formacao de formadores no ambito do projecto de reforco das capacidades de adaptacao e resiliencia as mudancas climaticas dos recursos hidricos em Cabo Verde. (Powerpoint Presentation).
- Barbut, M. letter to Glemarec Y. 6 May 2008. Global Environmental Facility
- Barry, O. (2011). Projecto de Reforço das Capacidades de adaptação e de Resiliência as Mudanças climáticas no Sector dos recursos Hídricos. (Activities Report)
- Barry, O. (2013). O papel da comunicação social na informação e sensibilização sobre às mudanças climáticas. (Projecto de reforco das capacidades de adaptacao e resiliencia as mudancas climaticas no sector dos recursos hidricos em Cabo Verde)
- Budget annuel 2012 Santiago e Santo Antão\_revisãoIria, (2012). Projet de renforcement des Capacités d'adaptation et Resilience aux changements climatiques au secteur de l'eau au Cap Vert (Excel spreadsheet)
- Building adaptive capacity and resilience to climate change in the water sector in Cape Verde, PIMS 4091. (2010). Quarterly Progress Report 1
- Building adaptive capacity and resilience to climate change in the water sector in Cape Verde (2011). Quarterly Progress Report 2
- Building adaptive capacity and resilience to climate change in the water sector in Cape Verde (2011). Quarterly Progress Report 3
- Building adaptive capacity and resilience to climate change in the water sector in Cape Verde. (2012). Quarterly Progress Report 6
- Cartas de apoio e co-financiamento. (No Date). Reforço das capacidades de adaptação e resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde. (Adenda ao documento de projecto)
- Considerações do Projeto de Reforço das Capacidades de Adaptação e resiliência às Mudanças Climáticas no sector dos Recursos Hídricos em Cabo Verde no Plano Diretor Municipal do Porto Novo. (No date). Versão Consulta Pública
- Cruz, D. (No Date). Efeitos potenciais e reais das Mudancas Climaticas sobre Zonas Costeiras e actividades piscatorias. Programa de formacao de formadores sobre a vulnerabilidade, os Riscos e Os Impactos das mudancas climaticas e as medidas de adaptacao. (Presentation).
- Cruz, D.C., (2013). Financiado pelo Fundo Global para o Ambiente GEF e pelo Programa das Nações Unidas para o Desenvolvimento – PNUD. Transmitido semanalmente na Rádio e Tecnologias Educativas de Julho de 2012 a Junho de 2013. (Relatório do Programa Radiofónico)
- Especialista em Capacitação e Políticas de Mudanças Climáticas. (2012). Os riscos das mudanças climáticas e as medidas de adaptação são integrados nas principais políticas nacionais, nos planos e nos programas de gestão dos recursos hídricos. (Plano de Acçao-Ano 2012)

- Ferreira T.C., (2012). Projecto de reforço das Capacidades de Adaptação e Resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde". (Relatorio de consultoria a Cabo Verde Fase II) Praia: Cape Verde
- Ferreira, I.S. (2012). Efeitos potenciais e reais das Mudancas climaticas na ocupacao, sustentabilidade dos solos e demografia em Cabo Verde (Pdf presentation)
- Ferreira, T.C., (2012). Programa de formacao de formadores sobre a vulnerabilidade, os riscos e os impactos das mudancas climaticas e as medidas de adaptacao. Modulo 1. Introducao aos aspectos da climatologia de Cabo Verde. (Pdf Presentation)
- Ferreira, T.C., (2012). Programa de formacao de formadores sobre a vulnerabilidade, os riscos e os impactos das mudancas climaticas e as medidas de adaptacao. Modulo 3. Cenarios de mudancas climaticas e suas características para Capbo Verde. (Pdf Presentation)
- Ferreira, T.C., (2012). Programa de formacao de formadores sobre a vulnerabilidade, os riscos e os impactos das mudancas climaticas e as medidas de adaptacao. Modulo 5. Efeitos potenciais e reais das mudancas climaticas por sectores em Cabo Verde. (Pdf Presentation)
- Ferreira, T.C., (2012). Programa de formacao de formadores sobre a vulnerabilidade, os riscos e os impactos das mudancas climaticas e as medidas de adaptacao. Modulo 6. Adaptacao as udancas climaticas e a seguranca alimentar. (Pdf Presentation)
- Ferreira, T.C., (2012). Programa de formacao de formadores sobre a vulnerabilidade, os riscos e os impactos das mudancas climaticas e as medidas de adaptacao. Modulo 3. Cenarios de mudancas climaticas e suas características para Cabo Verde. (Pdf Presentation)
- Francisco, C. (2012). Cabo Verde no contexto das mudancas climaticas. Concelho de Santa Cruz. (Projecto NAPA follow-up)
- Gominho, M. (2012). Efeitos potenciais e reais das mudancas climaticas nos recursos hidricos em Cabo Verde. (Projecto: Reforco das capacidades de adaptacao e resiliencia as mudancas climaticas no sector dos recursos hidricos). (Pdf Presentation)
- Government of Cape Verde (No date). Building adaptive capacity and resilience to climate change in the water sector in Cape Verde (Project Document). UNDP: United Nations Joint Office for Cape Verde
- Government of Cape Verde., (2012). Projecto de Reforço das Capacidades de Adaptação e Resiliência às Mudanças Climáticas no sector dos Recursos hídricos em Cabo Verde (Meeting Report). Ministério do Ambiente
- Governo de Cabo Verde. (No Date). Reforço das capacidades de adaptação e resiliência às
- Instituto Nacional de Gestão dos Recursos Hídrico. (2012). Projecto de reforco das capacidades de adaptaçao e resiliencia as mudanças climaticas no sector dos recurdos hidricos em cabo verde coordenaçao regional em Santo Antao. (Activities Report)
- Instituto Nacional de Gestão dos Recursos Hídricos. (No date). Projecto de Reforço das Capacidades de adaptação e de Resiliência as Mudanças climáticas no Sector dos recursos Hídricos.(Primeira reuniao do comite tecnico do projecto)
- Issler, F. (2009). Reforço das capacidades de adaptação e resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde (Brief Introduction of Project LDCF). UNDP: Cape Verde
- Jorge, S. (2012). Atividades desenvolvidas pelo INIDA no âmbito do memorando assinado com o INGRH,por intermédio do Projeto de Reforço das Capacidades de Adaptação e Resiliência às
- Lima, M. letter to Comite tecnico. 7 November 2012. Instituto Nacional de Gestao dos Recursos Hidricos
- Lima,L., Rendall, A. (2012). Projecto de Reforço das Capacidades de adaptação e Resiliência às Mudanças Climáticas no Sector dos Recursos Hídricos. Instituto Nacional de Gestão dos Recursos Hídricos. (Memorandum de entendimento)

Lista de candidatos a estufas, (No date). Projecto de Reforço das Capacidades de Adaptação e Resiliência às Mudanças. Instituto Nacional de Gestão dos Recursos Hídricos. (

Coordenação Regional de Santa Cruz e Tarrafal)

Lopez S.M.D. (2011) Despachoco comite tecnico Ministra. Ministerio do Ambiente

Ministerio do Ambiente e da Agricultura. (2007). Programa de Accao Nacional de Adaptacao as Mudancas Climaticas. Instituto Nacional de Meteorologia e Geofisica. Republica de Cabo Verde

Mudanças Climáticas no Sector dos Recursos Hídricos em Cabo Verde. Instituto Nacional de Gestão dos Recursos Hídricos – INGRH. (Documento de Projecto do PNUD)

Orçamento Geral do Estado. (No date) Atividades de reforço das capacidades de adaptação as mudanças climáticas no setor dos recursos hídricos. (Excel spreadsheet)

Perito em Gestão de Água e Investimentos. (2012). Práticas de adaptaçãp às mudanças climáticas na gestão dos RH são demonstradas e aplicadas em bacias hidrográficas seleccionadas. (Plano de Ação de Trabalho - ANO 2012- 3 Trimestre)

Pfeiferova, D. (No date). Building adaptive capacity and resilience to climate change in the water sector in Cape Verde, NAPA Budget revision. (Excel spreadsheet)

Pombielo N.M.F.G. letter to Join office of UNDP, UNFPA and UNICEF. 19 July 2007. Audi Mobil Telecomunicacoes e Servicos, Lda, A Gerencia.

Puginier, O. (2011). Résumé de réunion sur Comité de Pilotage et Comité Technique (Meeting Report)

Querido, D. (2012). Mapeamento institucional das mudancas climaticas em Cabo Verde. Nações Unidas Cabo Verde. (Apresentacao Projecto NAPA Follow up)

Ramos, K.R., (2012). Mecanismos do aquecimento e variaveis da mudanca climatica. Insituto Nacional de Gestao dos recursos hidricos. (Projecto de Reforco das capacidades de adaptacao e resiliencia as mudancas climaticas no sector dos recursos hidricos em Cabo Verde). (Pdf Presentation)

- Reunião do Comité Técnico, (2012) Revisão do Quadro Lógico. PowerPoint presentations
- Santiago, I. (2002). Plano de desenvolvimento Hidrico da bacia hidrografica da Ribeira Seca. Instituto Nacional de Gestão dos Recursos Hídricos. Cabo Verde
- Santos, M. (2012). Ambiente e desenvolvimento sustentavel. Modulo 5. Efeitos potenciais e reais das mudancas climaticas por sectores em Cabo Verde. (Pdf Presentation)

Singh B., (2012). Análise e Seguimento de Dados Sobre Mudanças Climáticas. (Draft do Relatório)

- Spencer J.M., (2012). Reforcos das Capacidades de Adaptaceo e Resiliencia as Mudancas Climaticas no Sector dos Recursos Hidricos. Instituto Nacional de meteorogia e geofisica republica de Cabo Verde (Delegacao da Praia).
- UNDP (2009)Building adaptive capacity and resilience to climate change in the water sector in Cape Verde (Project Inception Report).

UNDP, (2009). Building adaptive capacity and resilience to climate change in the water sector in Cape Verde (Signature page)

UNDP. (2011). PIMS 4091 Building adaptive capacity and resilience to climate change in the water sector in Cape Verde. (offline risk log)

- UNDP. (2011)Building adaptive capacity and resilience to climate change in the water sector in Cape Verde. (Annual Project Review)
- Unidade de Coordenação do Projecto. (2011). Projecto de Reforço das Capacidades de Adaptação e Resiliência ás Mudanças Climáticas. (Memorando da primeira reunião do Comité Técnico do Projecto)

Work plan. (2013). Relatorio 1, 2 & 3 Trimestre 2013. (Project NAPA). (Excel Spreadsheet)
## Annex 7: Co-financing commitments<sup>50</sup>

### **Co-financing:**

PNUD	TRACK	149,829.57USD (74,91 of allocation)
WAF ACCC	Coastal adaptation to climate change	660,000USD
MDR	<ol> <li>Project of planning a valorization of hydrografic basin of Picos and Engenhos</li> </ol>	<ol> <li>(1) 308,642 USD</li> <li>(2) 182,403 USD</li> <li>(3) 543,210 USD</li> </ol>
	<ul> <li>Project of integrated development of hydrografic basin of Santiago PIDIBHIS –</li> </ul>	(4) 1,148,148 USD
	<ul> <li>(3) Poilão Dam - irrigation sistema-,</li> <li>(4) Project of Reservoir, mobilization of water for irrigation -</li> </ul>	
Japão	<ol> <li>Project of massification of the network system and promotion of aeroponia e hydroponia</li> </ol>	<ul> <li>(1) 617,284 USD</li> <li>(2) 2,541,685 USD</li> </ul>
	(2) Project of water supply of the municipalities of São Salvador de Mundo, São Miguel, São Domingos Santa Catarina, Santa Cruz e Tarrafal de Santiago -	
Lux Dev	<ol> <li>CVE/069 Project of water supply of São Domingos</li> <li>CVE/069 Project of water supply of Fogo and Brava</li> </ol>	<ol> <li>(1) 1,773,000 EUR</li> <li>(2) 5,000,000 EUR</li> </ol>
França	<ol> <li>Project of water and sanitation of Assomada, Santa Catarina thu SCAC/ Agence Française of Developpement - AFD</li> </ol>	<ul> <li>(1) 13,300,000 USD,</li> <li>(2) 194,626 USD</li> </ul>
	(2) Project of water supply, small scale, for construction of reservoirs and traditional water collectors-	

#### Additionally leveraged resources:

- **Project of construction and water mobilization infrastructure:** construction of 5 dams on the island of Santiago in the amount of USD 17,026,639,63 to capture the rain waters to increase irrigated areas and increase production funded by Portuguese credit line.
- **Drilling and rehabilitation of water mobilization infrastructure:** Drilling on the islands of Santiago, Santo Antão, Fogo, Brava and São Vicente in the amount of USD 3,707,887,523, construction of correction dikes for water recharge in the Island of Maio in the amount of 3,189,709,249 USD, constructions of dams to capture water from wells on the island of Boa Vista in the amount of USD 1,603,855,137 funded by Portuguese credit line, whose goal is to decrease the salinity and increase the amount of water for farming and irrigation, increase efficiency and effectiveness in water management.

<sup>&</sup>lt;sup>50</sup> Information as provided in PIR 2013

- **Project of water connection to household, families in the municipality of Santa Cruz** in the year 2012 in the amount of USD 23,794.65 funded by the Autonomous Service of water in Santa Cruz municipality.
- **Contribution of Community Based Associations in Santiago Project partners:** valued at 86,685.9 USD and Associations in Santo Antão.
- USD.CPV/SIDS-CBA/12/23 3,610.93 Improved Management of Irrigation water and Capacity for climate change in Longueira and Covoada worth \$ 10,000 USD and CPV/SIDS-CBA/12/22 -Strengthening Measures to Adaptive Climate Change and Perception Study on Vulnerability in the island of Santo Antao in the amount of USD \$ 35,000 funded by GEF SGP.
- Project of Water connection to household in the island of Santiago in the municipality: Tarrafal, Santa Catarina, São Miguel, São Salvador do Mundo, são Lourenço dos Orgaos, São Domingo, and Praia Ribeira Grande de Santiago in the amount of USD 6,025,786.02, making that women and children have access to clean water without having to go through a long time to catch up funded by Japão.
- **Project of improvement of water and sanitation infrastructures on the island of Santiago and Maio** in the amount of 775,019.39 USD funded by Spain, benefiting 1600 families.
- Project of infrastructure construction and installation of water supply system: Santiago, Sal, São Vicente and Santo Antão worthed USD 3,650,727.2 funded by France .
- **Project Procurement and desalinization of water for human consumption and increase irrigation** in the amount of USD 234,975,000 funded by the UN.
- Project procurement *eco sanitary water: expansion and construction of infrastructure* amounting to USD 8,253,251.15 funded by the EU.
- Project to *support the plan of integrated water resources* worth USD 8,031,599.86 funded Luxemburgo.
- Projecto Mete operating Agro farmers training and awareness of the countries of West Africa on *Climate Change and impacts on agriculture*, funded by the State Agency for Meteorology in Spain, Government of Norway and the World Meteorological Organization in the amount of 20,000 USD

### Annex 8: Code of conduct agreement form

#### Evaluators:

- 1. Must present information that is complete and fair in its assessment of strengths and weaknesses so that decisions or actions taken are well founded
- 2. Must disclose the full set of evaluation findings along with information on their limitations and have this accessible to all affected by the evaluation with expressed legal rights to receive results.
- 3. Should protect the anonymity and confidentiality of individual informants. They should provide maximum notice, minimize demands on time, and: respect people's right not to engage. Evaluators must respect people's right to provide information in confidence, and must ensure that sensitive information cannot be traced to its source. Evaluators are not expected to evaluate individuals, and must balance an evaluation of management functions with this general principle.
- 4. Sometimes uncover evidence of wrongdoing while conducting evaluations. Such cases must be reported discreetly to the appropriate investigative body. Evaluators should consult with other relevant oversight entities when there is any doubt about if and how issues should be reported.
- 5. Should be sensitive to beliefs, manners and customs and act with integrity and honesty in their relations with all stakeholders. In line with the UN Universal Declaration of Human Rights, evaluators must be sensitive to and address issues of discrimination and gender equality. They should avoid offending the dignity and self-respect of those persons with whom they come in contact in the course of the evaluation. Knowing that evaluation might negatively affect the interests of some stakeholders, evaluators should conduct the evaluation and communicate its purpose and results in a way that clearly respects the stakeholders' dignity and self-worth.
- 6. Are responsible for their performance and their product(s). They are responsible for the clear, accurate and fair written and/or oral presentation of study limitations, findings and recommendations.
- 7. Should reflect sound accounting procedures and be prudent in using the resources of the evaluation.

# **Evaluation Consultant Agreement Form**<sup>51</sup>

Agreement to abide by the Code of Conduct for Evaluation in the UN System

Name of Consultancy Organization (where relevant): \_\_\_\_Integrated Environmental Consultants Namibia

I confirm that I have received and understood and will abide by the United Nations Code of Conduct for Evaluation.

Signed at (place)on

Signature:

<sup>&</sup>lt;sup>51</sup> www.unevaluation.org/unegcodeofconduct