Terminal Evaluation Review form, GEF Evaluation Office, APR 2015

# 1. Project Data

| Summary project data | | | |
|---|---|---|---|
| **GEF project ID** | | 3645 | |
| **GEF Agency project ID** | | GFL/2328-2731-4A78 | |
| **GEF Replenishment Phase** | | GEF-4 | |
| **Lead GEF Agency (include all for joint projects)** | | UNEP | |
| **Project name** | | **Reducing Risks to the Sustainable Management of the North Western Sahara Aquifer System (NWSAS)** | |
| **Country/Countries** | | Regional - Algeria, Libya, Tunisia | |
| **Region** | | Africa | |
| **Focal area** | | International waters | |
| **Operational Program or Strategic Priorities/Objectives** | | IW-SO-2 (To Catalyze Transboundary Action Addressing Water Concerns)<br>IW-SP-3 (Balancing overuse and conflicting uses of water resources in surface and groundwater basins that are transboundary in nature) | |
| **Executing agencies involved** | | OSS (Sahara and Sahel Observatory) and national institutions from Algeria (Agence Nationale des Resources Hydrauliques), Libya (General Water Authority), Tunisia (Direction Générale des Resources en Eau) | |
| **NGOs/CBOs involvement** | | NA | |
| **Private sector involvement** | | NA | |
| **CEO Endorsement (FSP) /Approval date (MSP)** | | 23 July 2009 | |
| **Effectiveness date / project start** | | June 2010 | |
| **Expected date of project completion (at start)** | | 9 May 2012 | |
| **Actual date of project completion** | | December 2015 | |
| **Project Financing** | | | |
| | | **At Endorsement (US $M)** | **At Completion (US $M)** |
| **Project Preparation Grant** | GEF funding | 0.03 | NA |
| | Co-financing | 0.04 | NA |
| **GEF Project Grant** | | 0.96 | 0.96 |
| **Co-financing** | IA own | | |
| | Government | 0.54 | 0.54* |
| | Other multi- /bi-laterals | 1.73 | 1.72 |
| | Private sector | | |
| | NGOs/CSOs | | |
| **Total GEF funding** | | 1.00 | 0.96 (excluding PPG) |
| **Total Co-financing** | | 2.3 | 2.26 (excluding PPG) |
| **Total project funding (GEF grant(s) + co-financing)** | | 3.30 | 3.23 (excluding PPG) |
| **Terminal evaluation/review information** | | | |
| **TE completion date** | | NA | |
| **Author of TE** | | Howard Stewart | |
| **TER completion date** | | December 25, 2015 | |
| **TER prepared by** | | Caroline Laroche | |
| **TER peer review by (if GEF EO review)** | | Molly Watts | |

*According to the TE, Government co-financing was higher than was is reported here due to the extension of the project implementation period, but estimates of the value of this additional support are not available.

## 2. Summary of Project Ratings

| Criteria | Final PIR | IA Terminal Evaluation | IA Evaluation Office Review | GEF EO Review |
|---|---|---|---|---|
| **Project Outcomes** | S | S | NR | S |
| **Sustainability of Outcomes** | NR | L | NR | ML |
| **M&E Design** | NR | MS-MU* | NR | MU |
| **M&E Implementation** | NR | MS | NR | MS |
| **Quality of Implementation** | NR | S | NR | MS |
| **Quality of Execution** | NR | HS | NR | S |
| **Quality of the Terminal Evaluation Report** | -- | -- | S | S |

* MS for M&E design, and MU for M&E budgeting and funding, which this TER considers as part of the M&E design component.

## 3. Project Objectives

3.1 Global Environmental Objectives of the project:

There is no stated GEO for this project. The project's objective was to "formulate and initially implement a set of actions to address the risks associated with sustainable exploitation and management of groundwater resources in the North West Sahara Aquifer System (NWSAS), with focus on sustainable agricultural practices and environmental management" (PD p.2). This objective can be considered both a GEO and a DO.

The project was structured around five linked components:

1. Socio-economic surveys
2. Pilot demonstration projects
3. Development of data bases and GIS
4. Support for a regional consultation mechanism
5. Project management

3.2 Development Objectives of the project:

There is no stated DO for this project.

3.3 Were there any **changes** in the Global Environmental Objectives, Development Objectives, or other activities during implementation?

There was no change in objectives during implementation.

## 4. GEF EO assessment of Outcomes and Sustainability

Please refer to the GEF Terminal Evaluation Review Guidelines for detail on the criteria for ratings.

Relevance can receive either a Satisfactory or Unsatisfactory rating. For Effectiveness and Cost efficiency, a six point rating scale is used (Highly Satisfactory to Highly Unsatisfactory), or Unable to Assess. Sustainability ratings are assessed on a four-point scale: Likely=no or negligible risk; Moderately Likely=low risk; Moderately Unlikely=substantial risks; Unlikely=high risk. In assessing a Sustainability rating please note if, and to what degree, sustainability of project outcomes is threatened by financial, sociopolitical, institutional/governance, or environmental factors.

Please justify ratings in the space below each box.

| | |
|---|---|
| 4.1 **Relevance** | Rating: **Satisfactory** |

The TE rates the relevance of this project as highly satisfactory. This TER gives it a rating of satisfactory due to the importance of the issue and its alignment with GEF priorities, but recognizing its lack of alignment with national priorities.

National Priorities

According to the project document, this project was fully consistent with the national priorities of the three countries involved. Indeed, each of the three countries has in the past executed "many one-off and sector-wide development programmes focused on an excessive exploitation of the NWSAS resource" (PD p.34)

The project document largely justifies relevance of the project based on the needs of the three countries, where the North West Sahara Aquifer System (NWSAS) accounts for a high share of groundwater. Given that those countries face severe water shortage issues, and in light of the importance of the NWSAS in all countries, the importance of the project is clear. What is less clear from the PD is the commitment of national governments to this project, and its relevance to national priorities. An exception to this is Libya, which has "set out for the period 2005-2025 its strategy for the management of water resources and the development of the water sector." In the other countries, the project was not clearly aligned with national priorities.

Overall, the "NWSAS III project was designed to respond to the complex challenges facing water users' in the basin" (TE p.18). The TE confirms that officials of national and regional governments confirmed the relevance of the project and its results. What remains unclear is the extent to which the project really reflected national priorities. For this reason, this TER assesses the national relevance of this project as unsatisfactory.

GEF relevance

The project was well aligned with GEF priorities, contributing to two strategic objectives of the focal area International Waters. First, the project catalyzed "transboundary action to address shared water

management concerns" and, second, it "helped the three countries to address problems and conflicts related to the overuse of shared water resources in a transboundary basin". "The project's experience also contributed to global learning through participation in the groundwater group of GEF's global IW-LEARN project" (TE p.19).

| 4.2 **Effectiveness** | Rating: **Satisfactory** |
|---|---|

The TE rates the effectiveness of the project as satisfactory. This TER also gives the project a rating of satisfactory given that the two main outcomes were attained, and all planned outputs for the project were delivered.

As mentioned above, the project was structured around five linked components. Activities and outputs achieved under each component are described below, and their effectiveness is assessed.

1. **Socio-economic surveys**

   Socio-economic surveys were carried out as planned, with more than 3,000 farmers surveyed in 10 regions. The surveys provided rich information supporting the pilot demonstration projects' findings regarding the scope for more efficient agricultural water use. Two survey campaigns were successfully conducted, and data analysis allowed analysts to "understand the behavior of farmers and to identify the levers of institutional, technical and financial order to initiate a process of better governance and management of the water at the level of farming" (PIR 2014, p.18).

2. **Pilot demonstration projects**

   All pilot projects were implemented, with one pilot planned in Libya having been relocated to Tunisia due to political instability. In 2014, four projects were in full operation, and two were lagging. According to the TE, the four pilots that were fully realized "have led to remarkable technical, economic and environmental performance that have attracted the interest of visitors and decision makers at all levels... [and] generated strong demand from croppers and planners to replicate it in other groups of farms that may constitute pilots of an agricultural production system" (TE p.21). Overall, "national and regional government representatives confirmed that the pilot results in general had been very positive and convincing in their demonstrations of how farmers could use introduced technologies and crops to increase their yields and incomes, while making more efficient use of irrigation water", which was indeed the objective of the pilot projects.

3. **Development of databases and GIS**

   At project end, an updated database was available, detailing over 16,000 water sources within the North West Sahara Aquifer System basin. This allows officials to "predict what will happen to the shared water resource if governments follow a given strategy of water use" (TE p.24). Government officials expressed a high level of satisfaction with the updated database.

4. **Support for a regional consultation mechanism**

   The regional Consultation Mechanism already existed prior to the beginning of this project. The TE reports some confusion regarding the consultation mechanism. Even at project end, "there seems to be some confusion as to whether the project supports the mechanisms or the mechanism supports the project" (TE p.25). Clearly, the project and the regional consultation mechanisms do work together and support each other, "though there is no clear indication what the 13% of project budget originally assigned for 'support to the Consultation Mechanism' has been used for " (TE p.25). The TE suggests that the local basis for the mechanisms needs to be strengthened, and that a more robust mechanism is yet to emerge. Overall, this output does not appear to have been particularly well developed as part of the project.

5. **Project management**

   Project management will be discussed under the 'project execution' section of this report. Overall, project management was well delivered.

Generally, the review suggests that "outputs have been of mostly high quality and at least sufficient quantity, as well as being of either immediately utility or being likely to be of value to users in the short term future" (TE p.20), suggesting an effective project delivery against planned outputs. The objective of this project was to "formulate and initially implement a set of actions to address the risks associated with sustainable exploitation and management of groundwater resources in the North West Sahara Aquifer System (NWSAS), with focus on sustainable agricultural practices and environmental management". Two direct outcomes were attained showing that the project objective was met:

1. **Recommendations demonstrating effective responses to the risks of unsustainable exploitation of NWSAS water were accepted by the Consultation Mechanism and three water authorities**

   The recommendations that emerged from the pilots and socio-economic studies have been accepted by the Consultation Mechanism and the Technical Heads of the three water authorities. National governments were very positive regarding the recommendations, although this does not mean those recommendations will be immediately translated into national policies (TE p.27).

2. **Measures to address the risks associated with sustainable exploitation and management of groundwater resources in the NWSAS were implemented**

   As mentioned above, recommendations were accepted by the national water authorities. Those measures have begun to be implemented as part of pilot projects, and the project objective is therefore met.

   However, there is currently no national effort towards the implementation of those recommendations. Indeed, it appears that "the more local the level, the more inclined project stakeholders appear to be to embrace the lessons of the pilot demonstration projects. The use of desalinated water for irrigation, for example, is being pursued in the Tunisian provinces of Gabes

and Medinine and incorporated in their strategy for the period 2015-2020. Robust pilot results across the border have convinced the regional government in Ouargla district to pursue this approach to drainage of irrigated lands in their planned expansion of irrigated perimeters during the five year planning period, 2015-2019. (TE p.28)

According to the TE, there would need to be "a more diverse set of larger scale demonstration activities if they are to contribute to a shift in national policy"(TE p.29) as national strategic programs and plans are unlikely to emerge from the pilot projects alone.

Overall, while most outputs and the two main outcomes have been achieved, the impact of the project will depend on national efforts to implement the project recommendations.

| 4.3 **Efficiency** | Rating: **Moderately Satisfactory** |
|---|---|

The TE rates the efficiency of this project as satisfactory. This TER rates it as moderately satisfactory due to higher than foreseen expenses, but an overall good project management that enabled it to achieve all its objectives.

First, it must be acknowledged that the project achieved its expected outputs despite very challenging political situations in Tunisia and Libya. According to the TE, in those two countries, "political and civil unrest inevitably imposed delays on the execution of the project's socio economic surveys and pilot demonstration projects; both were widely dispersed across areas where travel was sometimes difficult or impossible. These delays led to higher than foreseen expenses for two outputs that were necessarily extended over the life of the project – project management and support to the Consultation Mechanism" (TE p.36). The project was less cost-effective than originally planned, but this was not in the control of the implementing and executing agencies. Delays at the beginning of the project due to political unrest affected project implementation, but a project extension ensured that all objectives could still be attained.

The project was able to achieve the results expected largely as a result of effective management and technical support on the part of Observatory for the Sahara and the Sahel (OSS)– "obtaining high quality regional consultants, for example, at relatively modest prices through competitive bidding processes" (TE p.36). In addition, the project was able to conduct more socio-economic surveys than originally expected due to the ability of the executing agencies to take advantage of their existing government networks.

No cost-benefit analysis was done for the project, nor were project costs compared to those of other similar projects. Cost effectiveness is therefore not possible to assess as part of this TER.

| 4.4 **Sustainability** | Rating: **Moderately Likely** |
|---|---|

The TE rates sustainability as likely. This TER rates it as moderately likely as the project's outcomes are not threatened by any of the risks discussed below, but noting that the potential of the project to make a longer time environmental impact is indeed closely linked to some of these risks, some of which have not been adequately addressed as part of the project. The various aspects of sustainability are discussed below.

**Financial Sustainability: Moderately likely**

Despite the lack of future external support, it appears likely that North West Sahara Aquifer System NWSAS activities will continue to be supported by regional and national governments. Surely, financial support will be limited by budgetary constraints, but all three countries are likely to continue providing some support to successful pilot activities. It is however unclear that there will be sufficient financial resources to work on replication and scaling up activities. Because of this uncertainty, a rating of 'moderately likely' is assigned to financial sustainability. (TE p.33)

**Socio-political Sustainability: Moderately Unlikely**

The likelihood of the long-term impact of the project being achieved is not very high. The political climate in Algeria, Tunisia and Libya is very tense, and water resource management issues are far from being a political priority. In addition, and as mentioned above, there is as of now no formal process to integrate the project's recommendations into national policies, despite all the information collected as part of the project being available to policy-makers. Overall, the project was unsuccessful at creating a real political impetus towards better water resources management in the area, and is very vulnerable to political instability. For these reasons, this TE assigns a score of moderately unlikely.

**Institutional Sustainability: Moderately Likely**

Several issues related to institutional sustainability were raised during the project and left unaddressed. First, there are currently no institutional structures in place to ensure the replication or scale up of pilot projects; more generally, there is no structure in place to support the kinds of new technologies used in the pilot projects. Indeed, the project itself did not attempt to create new supportive institutional structures, but only made recommendations and implemented pilot projects.

Second, there is an important unaddressed need to ensure the training of new national information specialists in order to maintain the quality of the information systems, including the socio-economic and hydrologic models developed under the NWSAS.

Overall, there are some non-trivial institutional risks related to this project. While those risks largely pertain to long-term objectives outside the scope of this project, they do prevent the project from having a larger impact following project completion.

**Environmental Sustainability: Moderately likely**

In all three countries, but to a greater extent in Algeria, there is a strong movement to bring more land into production, meaning that the pressure on the NWSAS is likely to be even greater, and the water resources to become even scarcer. This, combined with the fact that the climate is expected to become hotter and drier in coming decades, will challenge the adoption of recommendations, which largely involve convincing farmers to use less water and land. On the other hand, the harsher environmental conditions will mean that the project recommendations will be more necessary than ever, therefore increasing the chances of their adoption (TE p.34). Overall, this TER rates environmental sustainability as moderately likely.

# 5. Processes and factors affecting attainment of project outcomes

5.1 Co-financing. To what extent was the reported co-financing essential to the achievement of GEF objectives? If there was a difference in the level of expected co-financing and actual co-financing, then what were the reasons for it? Did the extent of materialization of co-financing affect project's outcomes and/or sustainability? If so, in what ways and through what causal linkages?

> Government co-financing was higher than expected due to the extension of the project implementation period, but estimates of the value of this additional support are not available. Overall co-financing amount were as planned. Representing two thirds of the project funding, co-financing was absolutely necessary to the achievement of GEF objectives.

5.2 Project extensions and/or delays. If there were delays in project implementation and completion, then what were the reasons for it? Did the delay affect the project's outcomes and/or sustainability? If so, in what ways and through what causal linkages?

> The project start was delayed due to unanticipated challenges in Tunisia and Libya caused by political upheaval and violence as part of the Arab Spring. As a result, the project started two and a half years later, and the implementation schedule was disrupted. A decision was made to extend the project by a year and a half. Despite this challenge, all objectives were met. (TE p.10)

5.3 Country ownership. Assess the extent to which country ownership has affected project outcomes and sustainability? Describe the ways in which it affected outcomes and sustainability, highlighting the causal links:

> There is an overall good sense of national ownership when it comes to the North West Sahara Aquifer System (NWSAS) and its management. Prior to the project, the three governments of Algeria, Libya and Tunisia had set up the Consultation Mechanism, and all three governments took part in various activities related to water resources management. (TE p.32-33)
>
> For this project, the three governments acted as contracting authorities, and contributed to project financing (TE p.15). However, most of the support for the project came through the Sahara and Sahel Observatory (OSS) and the Consultation Mechanism, two regional bodies.

National support was thinner as the issues at play did not represent high political priorities for the countries.

## 6. Assessment of project's Monitoring and Evaluation system

Ratings are assessed on a six point scale: Highly Satisfactory=no shortcomings in this M&E component; Satisfactory=minor shortcomings in this M&E component; Moderately Satisfactory=moderate shortcomings in this M&E component; Moderately Unsatisfactory=significant shortcomings in this M&E component; Unsatisfactory=major shortcomings in this M&E component; Highly Unsatisfactory=there were no project M&E systems.

Please justify ratings in the space below each box.

| 6.1 **M&E Design at entry** | Rating: **Moderately Unsatisfactory** |
|---|---|

The TER rates M&E as moderately unsatisfactory. Because it took a long time for the project to define an M&E plan and logical framework, which were only adequate, we also rate M&E design as moderately unsatisfactory.

The M&E design for this project did not follow best practices. The PD did not include a logical framework, nor did it have a detailed M&E plan. Those were only included in the Inception Report, prepared in late 2010. The Inception Report not having been made available for this TE, this author cannot independently assess the quality of the logical framework or M&E plan proposed in the Inception Report.

According to the TE, "The logical framework in this Inception Report clearly outlined the project's expected progress from outputs to outcomes, though not towards longer term goals. The M&E plan in the Inception Report was very detailed, calling for more detailed monitoring information than the project was subsequently able to provide." (TE p.42) According to the TE, the Inception Report stated that "... the PMU will develop a national monitoring template for Impact Measurement which directly relates to the requirements for International Water indicator monitoring and this will be adopted and implemented within the first six months so as to allow monitoring to proceed at the national level during or immediately after the Inception Phase. This will provide measured and verified data for the overall M&E plan which will confirm Project delivery and confirm successful achievement of International Water Indicator targets in Process and Stress Reduction" (TE p.42). This commitment was very ambitious and never came through. That being said, in the Inception Report, "responsibilities for M&E activities were clearly defined and appear to have been well understood" (TE p.42).

| 6.2 **M&E Implementation** | Rating: **Moderately Satisfactory** |
|---|---|

The TER rates M&E budgeting and funding as moderately unsatisfactory, and M&E implementation as moderately satisfactory. This TER finds M&E implementation to be moderately satisfactory, with strong

monitoring that has provided valuable feedback for the project, but noting that some of the planned M&E activities did not take place.

Indeed, the planned mid-term evaluation did not take place. However, semi-annual progress reports (PIRs and progress reports to the Steering Committee) were prepared most of the time, although not all years (TE p.43).

Monitoring appears to have run fairly smoothly and to have generated useful results. According to the TE, "The project's partners in the three countries certainly participated fully and enthusiastically in the terminal evaluation. They also appear to have collaborated extensively in monitoring, especially in monitoring the progress and results of the pilot demonstration projects. Both farmers and local technicians participated in monitoring things like crop responses to new irrigation system, economic returns on water and land, levels of water tables, levels of water consumption, water prices, soil and water quality (especially salinity). This participatory monitoring approach not only ensured valuable feedback to the project but also promoted experiential learning on the ground. " (TE p.43)

The TE found some inconsistencies in reporting, suggesting "that at least some project reporting may have been done, at least in part, as a pro forma exercise, without concern that they are being read critically" (TE p.44).

## 7. Assessment of project implementation and execution

Quality of Implementation includes the quality of project design, as well as the quality of supervision and assistance provided by implementing agency(s) to execution agencies throughout project implementation. Quality of Execution covers the effectiveness of the executing agency(s) in performing its roles and responsibilities. In both instances, the focus is upon factors that are largely within the control of the respective implementing and executing agency(s). A six point rating scale is used (Highly Satisfactory to Highly Unsatisfactory), or Unable to Assess.

Please justify ratings in the space below each box.

| 7.1 **Quality of Project Implementation** | Rating: **Moderately Satisfactory** |
|---|---|

The TE rates the performance of the UNEP, this project's implementing agency, as satisfactory. This TER assesses project implementation as moderately satisfactory as the UNEP appears to have fulfilled its duties as project implementer and satisfactorily dealt with implementation delays, but could have done more during the design phase to identify risks and strengthen the project's M&E framework.

On the one hand, according to the TE, UNEP fulfilled all of its duties as project implementer. It was an active member of the project Steering Committee, and provided adequate technical guidance and backstopping. Its annual trips were useful to project management, and UNEP showed good flexibility regarding making budgetary adjustments when responding to delays in project implementation. On the other hand, UNEP could have more proactively identified and dealt with "the growing risk of political disruption" in the region (TE p.42). In addition, and as mentioned above, the M&E framework for this

project was very weak. UNEP did not ensure the project had a strong logical framework to guide project activities and drive M&E from the start. A logical framework was only defined in the Inception Report for the project, prepared in late 2010.

| 7.2 **Quality of Project Execution** | Rating: **Satisfactory** |
|---|---|

The TE rates project execution as highly satisfactory. This TE rates execution by the OSS and the national agencies as satisfactory given their ability to overcome the initial delays and achieve all project objectives in half the time expected.

As mentioned above, project execution faced challenges due to political upheaval during the Arab Spring. This caused a delay of two and a half years, significantly disrupting the project's implementation schedule. The OSS and the national agencies were able to ensure smooth project implementation despite the disruption, and despite the shorter than expected amount of time available for implementation.

According to the TE, general execution was very good, "with OSS project management working closely and effectively not only with their partners in the national water authorities but also with regional level governments, mostly in Algeria and Tunisia. They worked closely with local specialists, providing them supplementary training when required" (TE p.37). They were able to draw on their networks to better deliver outputs (for example, the higher than expected number of surveys conducted), and to achieve all project objectives. The TE only criticizes project execution for their poor translation of various project documentation from French to English, which may have been the result of underfunding translation activities as part of the project budget. (TE p.38)

# 8. Assessment of Project Impacts

***Note - In instances where information on any impact related topic is not provided in the terminal evaluations, the reviewer should indicate in the relevant sections below that this is indeed the case and identify the information gaps. When providing information on topics related to impact, please cite the page number of the terminal evaluation from where the information is sourced.***

8.1 Environmental Change. Describe the changes in environmental stress and environmental status that occurred by the end of the project. Include both quantitative and qualitative changes documented, sources of information for these changes, and how project activities contributed to or hindered these changes. Also include how contextual factors have contributed to or hindered these changes.

> There is as of now no measured environmental change, although the pilot projects are most likely making a local impact on water resources. The recommendations made by the project,

when implemented, will have the potential to make a large environmental impact. Much is left to do for environmental change to truly take place.

8.2 Socioeconomic change. Describe any changes in human well-being (income, education, health, community relationships, etc.) that occurred by the end of the project. Include both quantitative and qualitative changes documented, sources of information for these changes, and how project activities contributed to or hindered these changes. Also include how contextual factors have contributed to or hindered these changes.

Here too, there is as of now no measured socioeconomic change. Over time, as (and if) pilot projects are replicated and if recommendations are implemented, the better water resource management might ensure more secure livelihoods for producers relying on the NWSAS. Much is left to do for socioeconomic change to truly take place.

8.3 Capacity and governance changes. Describe notable changes in capacities and governance that can lead to large-scale action (both mass and legislative) bringing about positive environmental change. "Capacities" include awareness, knowledge, skills, infrastructure, and environmental monitoring systems, among others. "Governance" refers to decision-making processes, structures and systems, including access to and use of information, and thus would include laws, administrative bodies, trust-building and conflict resolution processes, information-sharing systems, etc. Indicate how project activities contributed to/ hindered these changes, as well as how contextual factors have influenced these changes.

a) Capacities

As part of the Pilot Projects component, farmers were introduced to new technologies and crops in order to increase their yields and incomes, while making more efficient use of irrigation water. Those pilot projects were successful and achieved their objectives. As a result of the project, farmers in the pilot areas are now better equipped to manage water resources efficiently.

b) Governance

The strengthening of the regional Consultation Mechanism supported better environmental governance in the region, and in particular regarding water resource management issues. That being said, the TE does state that it remains unclear how exactly the Consultation Mechanism was supported, and the extent to which this project really improved environmental governance therefore remains unclear.

8.4 Unintended impacts. Describe any impacts not targeted by the project, whether positive or negative, affecting either ecological or social aspects. Indicate the factors that contributed to these unintended impacts occurring.

No unintended impact was recorded as part of this project.

8.5 Adoption of GEF initiatives at scale. Identify any initiatives (e.g. technologies, approaches, financing instruments, implementing bodies, legal frameworks, information systems) that have been mainstreamed, replicated and/or scaled up by government and other stakeholders by project end. Include the extent to which this broader adoption has taken place, e.g. if plans and resources have been established but no actual adoption has taken place, or if market change and large-scale environmental benefits have begun to occur. Indicate how project activities and other contextual factors contributed to these taking place. If broader adoption has not taken place as expected, indicate which factors (both project-related and contextual) have hindered this from happening.

So far, none of the pilots were replicated, nor were the new technologies adopted at scale. Indeed, and as mentioned above, according to the TE, there would need to be "a more diverse set of larger scale demonstration activities if they are to contribute to a shift in national policy" (TE p.29) as national strategic programs and plans are unlikely to emerge from the pilot projects alone. More needs to happen before the three national governments are ready to engage in a massive scale up of the pilot projects. However, according to the TE, "the demand for the technologies successfully demonstrated by the project is likely to exceed government capacities to support their spread, at least in the short term, in Tunisia and Libya. " (TE p. 35) This TER notes that the TE provides no evidence as to the extent of this demand.

# 9. Lessons and recommendations

9.1 Briefly describe the key lessons, good practices, or approaches mentioned in the terminal evaluation report that could have application for other GEF projects.

A summary of the lessons is provided below. More information can be found in the TE p.50

1. While climate change complicates water management challenges it can also help push needed change.
2. Behavioral improvements that require changes in long established government policies and traditional cultural attitudes take time and careful planning to achieve effectively.
3. Providing conclusive proof of irrational resource use and micro scale demonstrations of effective alternatives are necessary first steps but are not sufficient to induce broad policy change across a complex region such as the NWSAS basin.
4. Producers can play lead roles in local adoption of technological improvements when these changes are introduced through well adapted participatory approaches but they still need effective technical support.
5. Innovative ways can be found to carry out cross-border activities in difficult times.

(TE p.6)

9.2 Briefly describe the recommendations given in the terminal evaluation.

A summary of the recommendations is provided below. More information can be found in the TE p.51

1. The three countries sharing the NWSAS should launch a network of larger scale demonstration activities around the basin, linked to and supported by a system of regional support and information sharing similar to that of the NWSAS III project.

2. Farmers who want to derive greater value from irrigation water should be supported and protected by their governments and those working with them.

3. Extension services should be enhanced by the three countries in order to support a shift in technology led by producers.

4. Generalizing the results of the micro scale pilot demonstration projects and responding to the recommendations emerging from OSS's socio-economic-hydrologic models will require astute strategies to overcome significant cultural and political barriers to such moves.

5. The NWSAS partner organizations, led by a strengthened Consultation Mechanism and the OSS, should move quickly to share as much information as possible, as widely as possible, within the region and beyond.

6. The OSS should continue to provide intellectual leadership & technical support for improved irrigation water management in the NWSAS basin.

7. Future activities carried out by the NWSAS partners, with or without external support, should be complemented by robust, efficient and well-financed national and local systems for monitoring and evaluating the socio-economic and environmental results of innovative approaches.

8. 27. There is an interesting opportunity for UNEP-GEF to support future activities in the NWSAS basin.

(TE pp.50-52)

# 10. Quality of the Terminal Evaluation Report

A six point rating scale is used for each sub-criteria and overall rating of the terminal evaluation report (Highly Satisfactory to Highly Unsatisfactory)

| Criteria | GEF EO comments | Rating |
|---|---|---|
| To what extent does the report contain an assessment of relevant outcomes and impacts of the project and the achievement of the objectives? | The report contains an assessment of all project outcomes and outputs, as well as a discussion of impact. | **S** |
| To what extent is the report internally consistent, the evidence | The report is consistent, ratings are very well justified, but the evidence provided is not complete. For example, | **MS** |

| | | |
|---|---|---|
| presented complete and convincing, and ratings well substantiated? | quantitative information against logical framework indicators is not provided. | |
| To what extent does the report properly assess project sustainability and/or project exit strategy? | The report addresses all relevant aspects of sustainability, but appears overly optimistic. This might be because limited evidence is provided in the report to substantiate some of the assessments made. | **MS** |
| To what extent are the lessons learned supported by the evidence presented and are they comprehensive? | Lessons learned appear to be comprehensive. They are consistent with the assessments made in the rest of the report. Again, there is limited evidence presented to back up the lessons learned. | **MS** |
| Does the report include the actual project costs (total and per activity) and actual co-financing used? | The report includes actual project costs and co-financing. | **S** |
| Assess the quality of the report's evaluation of project M&E systems: | The report provides all necessary information about the project's M&E, as well as a good evaluation. | **S** |
| **Overall TE Rating** | | **S** |

## 11. Note any additional sources of information used in the preparation of the terminal evaluation report (excluding PIRs, TEs, and PADs).

No additional sources were used in the preparation of this terminal evaluation report.