## **Scientific and Technical Advisory Panel**

The Scientific and Technical Advisory Panel, administered by UNEP, advises the Global Environment Facility

(Version 5)

## STAP Scientific and Technical screening of the Project Identification Form (PIF)

Date of screening: June 04, 2018 Screener: Guadalupe Duron Panel member validation by: Annette Cowie Consultant(s):

I. **PIF Information** (Copied from the PIF)

FULL-SIZED PROJECT	GEF TRUST FUND
GEF PROJECT ID:	10020
<b>PROJECT DURATION:</b>	4
COUNTRIES:	Lesotho
PROJECT TITLE:	Integrated Watershed Management for Improved Agro- pastoral Livelihoods in the Sepabala Sub-catchment
GEF AGENCIES:	UNDP
OTHER EXECUTING PARTNERS:	Ministry of Forestry, Range and Soil Conservation (MFRSC) Ministry of Water (MoW) - Department of Water Affairs Ministry of Agriculture and Food Security (MAFS) Ministry of Tourism, Environment and Culture (MTEC) - Department of Environment Ministry of Local Government and Chieftainship Affairs (MLGCA)

GEF FOCAL AREA: Land Degradation

II. STAP Advisory Response (see table below for explanation)

Based on this PIF screening, STAP's advisory response to the GEF Secretariat and GEF Agency(ies): **Minor issues to be considered during project design** 

## III. Further guidance from STAP

STAP welcomes UNDP's project "Integrated Watershed Management for improved agro-pastoral livelihoods in the Sepabala subcatchment". STAP is pleased the project will apply integrated watershed management to reduce land degradation, and improve the flow of agro-ecosystem services to sustain food production and improve livelihoods. STAP appreciates the clear explanation in Annex 1 of the baseline and project details, and how the project will deliver environmental benefits. STAP is also pleased to see the intention of building on and collaborating with current projects.

Addressing the drivers of environmental degradation in a holistic manner is important for the success and sustainability of the project. STAP is pleased the project will be based on a strong stakeholder engagement, which recognizes that behavioral change (Annex 1) is necessary to achieve change. To support the project developers' efforts, STAP offers suggestions below to support planning for change, include climate change. Climate variability and climate change, among other risks, will have impacts on managing land and water resources in Lesotho, and meeting the project objective will require identifying and evaluating different intervention options to enhance resilience and devising adaptation pathways to deal with change.

To strengthen the project during its design, STAP recommends addressing the points below.

1. STAP recommends detailing the climate data for Lesotho, such as the average monthly temperature and rainfall, information on weather variability, and anticipated climate change trends, which are important for planning, and managing the project. This information can be obtained from various sources including the

## following:

http://sdwebx.worldbank.org/climateportal/index.cfm?page=country\_historical\_climate&ThisCCode=LSO; https://www.climatewatchdata.org/ndcs/country/LSO/; https://resourcewatch.org/data/explore/Climate-Change-Impacts-on-Crop-Production

The project developers may also consider collecting climate data for the project site. The following documents can be helpful for collecting climate data and information, and for describing the climate projections for southern Africa: 1) Morueta-Holme, N. et al. (2018). "Best practices for reporting climate data in Ecology". Nature Climate Change.; 2) Conway, D. et al. (2015). "Climate and southern Africa's water–energy–food nexus". Nature Climate Change.

2. STAP suggests that the project developers provide detail on the current land tenure system, and the objectives of the current land management legislation and its weaknesses. The proposal lists a broad range of governance concerns, that will be challenging to overcome. STAP suggests that the project developers provide detail on the practical approach that will be taken to devising effective policy solutions. Consider the linkages between national and local level.

3. STAP suggests that the project developers include a description of the catchment management approach, and detail the methods that will be used to identify suitable SLM interventions for each part of the catchment. With respect to the latter, STAP suggests that the project developers consider the guidance provided in the Scientific Conceptual Framework for Land Degradation Neutrality (see below).

4. STAP is pleased that Lesotho committed to setting LDN targets. To embrace this opportunity STAP suggests for UNDP and Lesotho to consider how this project can contribute to LDN. The Science-Policy Interface of the UNCCD developed the "Scientific Conceptual Framework for Land Degradation Neutrality", which can assist in planning sustainable land management interventions. The framework can be accessed at: https://www.unccd.int/sites/default/files/documents/2017-08/LDN\_CF\_report\_web-english.pdf

5. STAP recommends applying the Resilience, Adaptation Pathways, and Transformation Assessment (RAPTA) Framework to assist Lesotho plan for changes, including climate risks. RAPTA is based on the principles of resilience thinking. It assists in analyzing the interactions across sectors, for example, between social, biophysical and economic variables, and how risks and shocks (e.g. drought) may influence the project's ability to meet its objective. RAPTA could assist in devising mitigation strategies for the risks identified in section 4. RAPTA also encourages consideration of the linkages between scales – for example, how national policies on agricultural prices influences household decisions in the project area. Based on a resilience assessment, the project developers can identify the need for adaptation or transformation, and develop alternative options to steer away from unsustainable paths. More detailed guidance on applying RAPTA can be found at: http://www.stapgef.org/rapta-guidelines

6. STAP welcomes the map of Lesotho's sub-catchments as an initial step to identifying the location of sub-catchment #54, which the project will target. As the project is designed, STAP encourages the project developers to consider applying Trends.Earth (or a similar geographic information system) that uses district level data (e.g. for land cover) to estimate the baseline, and monitor changes that are potentially resulting from the project activities. Trends Earth's calculations also can be used to report to UNCCD's impact indicators on land cover, land productivity and soil organic carbon. Further information about Trends.Earth can be found at: http://trends.earth/docs/en/

7. STAP welcomes a component on gender mainstreaming and knowledge management. As the project is designed, STAP recommends considering the following issues:

On gender: 1) consider the differentiated risks and opportunities for men and women, and define the preliminary response measures to address these differences; and, 2) consider whether the interventions hinder full participation of an important stakeholder group (or groups)? If so, how will these obstacles be addressed by the project.

On knowledge management: 1) detail how the project will use the theory of change to adjust the project so it deals with expected and possible change. (The project description summary begins to describe adaptive management as an outcome. Therefore, it would be valuable to describe how the project will gather information, iteratively monitor change, and how the information and knowledge will be used to improve the project's management.); and, 2) identify indicators to measure knowledge sharing, learning, and other related outcomes described in the project description summary.

8. STAP encourages the project developers to detail the integrated catchment approach that will be applied, and to identify indicators at this scale. This will allow the project to detail how the approach has been applied, how progress has been measured, and provide data to support the outcomes resulting from integrated catchment planning. A combination of environmental management, governance, and production variables can be used to monitored and assess progress. The following paper can help the project developers identify indicators at the catchment level, and strengthen the rationale for selecting catchment indicators: Reed, J., Van Vianen, J., Deakin, E. L., Barlow, J., & Sunderland, T. (2016). Integrated landscape approaches to managing social and environmental issues in the tropics: learning from the past to guide the future. Global change biology, 22(7), 2540-2554.

9. For developing component 2, it would be valuable to utilize UNDP's "Sustainable Land Management Toolkit" developed in partnership with the Government of Lesotho:

http://www.undp.org/content/dam/lesotho/docs/Other/SLM-Toolkit.pdf The toolkit offers guidance on applying integrated watershed management, including through the application of soil and conservation technologies, rangeland management, and agro-forestry.

10. Additionally, there a few details that are unclear in the PIF and require clarification as the project is developed:

a. The stocking rates are described as ranging from 40-80%. If this is 40-80% of carrying capacity, it is not clear how this amounts to overstocking and results in overgrazing.

Extensive grazing is discussed under the heading of "Overcultivation". Are the extensively grazed pastures cultivated?

b. In the description of forests, which are stated to cover 1% of the land area, there is also reference to "total crown cover of 34.14% of the country". Please reword to explain this point.

c. Scarcity of monitoring equipment is stated as a limitation: explain what monitoring equipment is required for rangelands management.

STAP advisory	Brief explanation of advisory response and action proposed
response	
1. Concur	In cases where STAP is satisfied with the scientific and technical quality of the proposal, a simple "Concur" response will be provided; the STAP may flag specific issues that should be pursued
	rigorously as the proposal is developed into a full project document. At any time during the
	development of the project, the proponent is invited to approach STAP to consult on the design prior to submission for CEO endorsement.
2. Minor issues	STAP has identified specific scientific /technical suggestions or opportunities that should be discussed
to be considered during	with the project proponent as early as possible during development of the project brief. The proponent may wish to:
project	(i) Open a dialogue with STAP regarding the technical and/or scientific issues raised.
uesign	(ii) Set a review point at an early stage during project development, and possibly agreeing to terms of reference for an independent expert to be appointed to conduct this review.
	The proponent should provide a report of the action agreed and taken, at the time of submission of the full project brief for CEO endorsement.
3. Major issues to be considered during project	STAP proposes significant improvements or has concerns on the grounds of specified major scientific/technical methodological issues, barriers, or omissions in the project concept. If STAP provides this advisory response, a full explanation would also be provided. The proponent is strongly encouraged to:
design	(i) Open a dialogue with STAP regarding the technical and/or scientific issues raised; (ii) Set a review point at an early stage during project development including an independent expert as required.
	The GEF Secretariat may, based on this screening outcome, delay the proposal and refer the proposal back to the proponents with STAP's concerns.
	The proponent should provide a report of the action agreed and taken, at the time of submission of the

full project brief for CEO endorsement.