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: October 07, 2013 Screener: Nijavalli H. Ravindranath

Panel member validation by: Ralph E. Sims
Consultant(s):

I. PIF Information *(Copied from the PIF)*
FULL SIZE PROJECT GEF TRUST FUND
GEF PROJECT ID: 5363
PROJECT DURATION : 4
COUNTRIES : Philippines
PROJECT TITLE: Development for Renewable Energy Applications Mainstreaming and Market Sustainability (DREAMS) Project
GEF AGENCIES: UNDP
OTHER EXECUTING PARTNERS: Department of Energy
GEF FOCAL AREA: Climate Change

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): **Consent**

III. Further guidance from STAP

The project aims at promoting commercialisation of RE markets for power generation projects in the Philippines. The majority of the components focus on developing financial and market mechanisms, guidelines and procedures for approval of projects, market assessment, development of renewable energy database, etc. The PIF lists all potentially possible interventions or activities (or at least a large number). STAP has a few comments and suggestions which could be incorporated in the next phase.

1. It is hoped that the renewable energy resource database covers all the RETs for power generation such as solar, PV, wind, geothermal, biogas, biomass combustion and gasification, etc. Biomass and other renewable energy resources must also be assessed.

2. If there are successful renewable energy based power generation projects already implemented, they can be show-cased.

3. Will the focus be on â€˜off-grid' or â€˜grid connected' renewable energy systems or both?

4. Development of implementable renewable energy models is critical for both off-grid and grid-connected projects. Will the project cover all the renewable technologies and will it also cover a combination of RETs which can be integrated into a single system for a given location.

5. The PIF lists a large number of potential interventions, literally covering all aspects - technical, financial, institutional, capacity building, etc. It may be desirable to identify the key interventions needed which can lead to market development.

6. Will there be demand for the renewable energy power generated at economic and financially viable tariffs?

7. There are a large number of ongoing programs and projects in the Philippines and there is a need to bring synergy and complementarity among the different interventions. A few are listed below, but many more exist.

a. Title: Support to the Climate Change Commission in the implementation of the National Climate Change Strategy and the National Climate Change Action Plan Commissioned by: German Federal Ministry for the Environment, Nature Conservation and Nuclear Safety (BMU) Lead executing agency: Climate Change Commission, Department of Energy Overall term: 2012 to 2015

b. ADB-Expanding the Use of Clean Energy: ADB is identifying and promoting cost-effective energy efficiency improvements, expanding the use of renewable energy, facilitating the introduction of new clean energy technologies, and giving incentives for the public and private sectors to invest in these areas

c. UK-Philippines: partnership for renewable energy

d. Department of Energy (DOE) of Philippines involving local banks to harmonize laws to further promote renewable energy (projects

8. The proposal revolves around renewable electricity. Is there no heating or cooling demand from using coal or natural gas that could use renewable energy resources (solar, geothermal, biomass)? This could be from solar water heating, ground source heat pumps, woody biomass, crop residues etc.

9. Integrating higher shares of variable renewable energy systems into a grid (national or local) is a challenge. The IPCC Special Report on Renewable Energy (Chapter 8, Integration) and IEA reports on flexible grids could prove useful in this regard.

10. It is encouraging that local governments are to be involved â€“ see IEA report "Cities, Towns and Renewable Energy" for policy experiences: http://www.iea.org/publications/freepublications/publication/cities2009.pdf

11. Instigating the renewable energy market is a key component of the project â€“ and the Australian experience of trading RECs (The MRET scheme â€“ Mandatory RE Targets) now around 12 years old, would be worth investigating.

12. Training is a critical part of the project as renewable energy integration into existing electricity systems can be challenging. It would be useful to detail further who will be contracted to undertake the training. It could take 1-2 years to develop the course material if not already taught at a suitable level at a University.

STAP advisory response	*Brief explanation of advisory response and action proposed*
1. Consent	STAP acknowledges that on scientific or technical grounds the concept has merit. However, STAP may state its views on the concept emphasizing any issues where the project could be improved. Follow up: The GEF Agency is invited to approach STAP for advice during the development of the project prior to submission of the final document for CEO endorsement.
2. Minor revision required.	STAP has identified specific scientific or technical challenges, omissions or opportunities that should be addressed by the project proponents during project development. Follow up: One or more options are open to STAP and the GEF Agency: (i) GEF Agency should discuss the issues with STAP to clarify them and possible solutions. (ii) In its request for CEO endorsement, the GEF Agency will report on actions taken in response to STAP's recommended actions.
3. Major revision required	STAP has identified significant scientific or technical challenges or omissions in the PIF and recommends significant improvements to project design. Follow-up: (i) The Agency should request that the project undergo a STAP review prior to CEO endorsement, at a point in time when the particular scientific or technical issue is sufficiently developed to be reviewed, or as agreed between the Agency and STAP. (ii) In its request for CEO endorsement, the Agency will report on actions taken in response to STAP concerns.