Request for Proposal

Ref No: RFP/SGPOP7/IND-2025

Upscaling Grants for Renewable Energy and Energy Efficiency under the Seventh Operational Phase of the GEF Small Grants Programme in India

Solicitation of Proposal

Small Grants Programme
Central Project Management Unit
The Energy and Resources Institute
India Habitat Centre, Lodhi Road
New Delhi -110003, India

Subject: **Request for Proposal from NGOs/CSOs/CBOs/ for Upscaling Grants for Renewable Energy and Energy Efficiency under the Seventh Operational Phase of the GEF Small Grants Programme (SGP) in India**

Dear Madam/ Sir,

1. You are hereby requested to submit a Proposal for Upscaling Grants for Renewable Energy and Energy Efficiency in the selected focus landscape North-East/Central Semi-arid/Indian Coast under the Seventh Operational Phase of the GEF Small Grants Programme in India.
2. It may be noted that the proposal submitted by you would be treated as a basis for the contract between TERI and your organization. In case of selection of your organization, you will be required to execute an agreement with TERI. Such an agreement will include entire General Terms and Conditions applicable in the office of TERI for the purpose of hiring and procuring services in terms of Annexure-IV.
3. To facilitate submission of referred proposal, please find appended blow the complete details.
4. This RFP is not to be construed in any way as an offer to contract with your Organization/ Institution.
5. One organization will be eligible to apply for only one upscaling grant.
6. The proposal must be prepared in English.
7. Proposals should be submitted on or before the deadline (i.e., within the stipulated duration from the date of publication of this RFP). Terms and Conditions of your Proposal shall remain binding upon you for a minimum period of one hundred twenty (120) days. You are requested to ensure that your proposal is submitted well before the deadline. It should also be ensured that proposal must be substantiated and documented with necessary documents and certificates duly self-attested in the pdf format.
8. The Proposal that complies with all the requirements, which achieves qualifying marks in technical evaluation criteria and offers the best value for money shall be considered for selection and award of contractual work. Any offer that does not meet the requirements shall be rejected.

9. Please be advised that TERI is not bound to accept any Proposal, award a contract, or be responsible for any costs associated with a Service Providers preparation and submission of the Proposal, regardless of the outcome or the manner of conducting the selection process.
10. The decision of the National Steering Committee of SGP-OP7 on selection of the community grantees will be final.

Thank you and we are anticipating obtaining your proposal.

Yours sincerely,

Manish Kumar Pandey

National Coordinator

SGP-OP7, India

Website- https://sgp-india.org/

GEF (Global Environment Facility) Small Grants Programme in India

The Ministry of Environment, Forest and Climate Change (MoEF&CC) along with UNDP is implementing the Seventh Operational Phase of the GEF (Global Environment Facility) Small Grants Programme in India. The project aims to build capacities of the local communities to take collective action for conservation and sustainable development thereby generating global environmental benefits. It is implemented in close collaboration with The Energy and Resources Institute (TERI) for a period of five years. SGP India has three focal areas i.e. Climate Change, Biodiversity and Land Degradation and is being implemented in three regions of the country.

Landscapes

The SGP-OP7 project is being implemented in three landscapes, as outlined in the following table:

Table 1 Target Regions, State and Districts for SGP-OP7 Project

Region	State	Intervention Landscape Districts
Central semi-arid Region	Madhya Pradesh	Barwani
		Chhatarpur
		Damoh
Indian Coastal Region	Maharashtra	Ratnagiri
		Sindhudurg
	Tamil Nadu	Ramanathapuram
		Virudhunagar
North-East Region	Assam	Baksa
		Barpeta
		Bongaigaon
		Darrang
		Dhubri
		Kokrajhar
		Nalbari
		Udalguri
	Meghalaya	East Khasi Hills
		West Khasi Hills
		Ri Bhoi

Background: Upscaling Grants on Renewable Energy and Energy Efficiency

Despite recent significant progress in development of new low carbon technologies and growing momentum for climate action, climate change remains a defining challenge of our time. The concentration of greenhouse gases in the atmosphere continues to rise with emissions up 20% in last 45 years. The impacts of climate change are increasingly felt around the globe. In recent years, most of the natural hazards that affected millions of people were associated with extreme weather and climate events. The IPCC's special report calls for urgent response at an unprecedented scale as 3°C warming with unknown consequences for life on earth is increasingly likely under current business as usual trajectory. The World Economic Forum's Global Risks Report highlights that climate change, combined with biodiversity loss, is a driver of many of the top global risks to society, including water crises, large scale involuntary migration, natural disasters and extreme weather events. Climate change, however, is not only unprecedented challenge, but also an unprecedented opportunity to unlock massive economic and social benefits through climate action that can help us achieve the Sustainable Development Goals. Recent studies have found that bold climate action could trigger at least US$26 trillion in economic benefits by 2030, create over 65 million new jobs, avoid 700,000 premature deaths and many more. Rapid transformation of energy sector, producing two thirds of global emissions, is crucial for avoiding the worst climate change impacts. The global energy transition is underway with renewable energy as the dominant source of new power generation capacity, the world largest economies increasingly powered by renewables and costs of solar PV and wind energy rapidly falling. In the developing world, where 1 billion people do not have access to electricity, and over 2.9 billion people do not have access to clean cooking, a paradigm shift is under way with new business models and technologies developing off-grid markets with new payment models supported by mobile technology. However, despite these positive developments, the use of renewables in some sectors remains low, CO2 emissions continue to raise, progress in deployment of many technologies is not on track with the emissions reductions goals and current plans and policies are putting the planet on the pathway of dangerous warming above 2 C. The historic Paris Agreement has put in place a framework defining countries' climate action for the next few decades, setting up a mechanism for countries to put forward and implement Nationally Determined Contributions (NDCs) outlining their commitments. These commitments cannot be met without energy decarbonization. However, energy-related emissions have risen around 1% yearly since 2015, while the world's "carbon budget" will run out within a decade. The next 2-3 years are crucial for successful implementation of the agreement and the challenge now is to raise the ambition and accelerate the transition to zero-carbon resilient economy, as many investment decisions taken today will shape the future for decades. The GEF-7 period coincides with this key phase of the implementation of the Paris Agreement. As an operating entity of the financial mechanism of the UNFCCC, the GEF is aligning programming with the priorities identified in countries' NDCs and will provide support in the context of national strategies and plans.

India's updated Nationally Determined Contributions (NDCs) aim to reduce emissions intensity of its GDP by 45% by 2030 from 2005 levels, achieve 50% cumulative electric power installed capacity from non-fossil fuel sources by 2030, and reach net-zero emissions by 2070. The SGP – OP 7 also has a critical role to play in helping India to meet the goals of Paris

Agreement and has developed a joint strategic approach. This approach focuses on three core objectives: i) Accelerate current NDC implementation; ii) Strengthen efforts to develop more ambitious next generation NDCs; iii) Mobilize society to contribute and call for climate action from their governments. In coordination with other agencies, UNDP- SGP op 7 will contribute to this approach focusing on three strategic and transformative pathways including: i) Increasing the scope of ambition and accelerating the implementation of NDCs; ii) Accelerating climate action by mobilizing institutions and resources; and iii) Aligning policies and plans with climate-smart resilient approaches. Within these themes, UNDP - SGP will support transition of cities towards cleaner more resilient development pathways; powering rural development by providing renewable energy for rural communities; promoting ecosystem and livelihood resilience and restoration; creating resilient rural agricultural systems, value-chains and markets. Given the above context, SGP is uniquely positioned to contribute to these critical global efforts in galvanizing climate action, while setting up the infrastructure to transition to zero-carbon economy, providing energy access and improving livelihoods for the poor communities. Investing in local solutions and mobilization of civil society is also key for raising ambition of NDCs, galvanizing support and ensuring their implementation.

Key interventions include:

- GHG Emission Mitigation: Introducing, adapting, piloting, and disseminating energy-efficient solutions.
- Renewable and Clean Energy Solutions: Expanding the use of renewable energy for productive purposes (e.g., mills, solar pumps).
- Alternatives to Traditional Fuels: Promoting the use of renewable energy in place of fuelwood and coal.
- Energy Efficiency Improvements: Enhancing energy efficiency for household and community use, including lighting solutions.

Project Results

The strategy of the SGP India OP7 project is centered on building socio-ecological resilience by developing the skills, capacities, and resources necessary to conserve and restore critical ecosystems. This includes sustainable utilization of ecosystem services, improving the sustainability and productivity of agro-ecosystems, and deploying clean energy solutions within the intervention landscapes and the broader target regions.

The expected outcomes of SGP India-OP7 India under climate change theme are as follows:

- Core Indicator 6: Mitigation of 695,000 tCO2e (lifetime direct) emission; 100,000 tCO2e (Lifetime indirect) emission
- Deployment of RE capacity: Solar PV - 2 MW, Solar Thermal – 0.25 MWe = 0.75 MWt, Biomass – 0.5 MWe = 1/5 MWt, Biogas – 0.25 MWe = 0.75 MWt (Please refer to Annexure A: RE and EE Solutions)
- Core Indicator 11: 16,800 direct beneficiaries, including 9,240 women (55%) and 7,560 men (45%)

Terms of Reference (TOR) - SGP Upscaling Grant for community-level application of Renewable Energy and Energy Efficient Solutions

Introduction

The Seventh Phase of the UNDP-GEF (Global Environment Facility) Small Grants Programme in India invites qualified organizations to submit proposals for projects focused on promoting "Renewable Energy and Energy Efficient Solutions".

A number of upscaling grants have been planned to facilitate durable impacts. Theme based grants are envisaged to be awarded to experienced NGOs, of which one is to implement Renewable Energy (RE) and Energy Efficiency (EE) solutions across the three project landscapes. This call for proposals is announced to on board an NGO/ CBO who will be responsible to create business models for upscaling proven community level RE and EE applications. The project will focus on demonstrating new innovative technologies like solar cold rooms, solar powered chakkis, solar dryers, energy efficient irrigation system, solar based fish pond aerators etc and will develop and promote business models for proven technologies like solar cookers, lighting systems, etc.

There are several potential applications in the three target regions and intervention landscapes, including horticulture and spice production and processing, e.g., in the state of Meghalaya, which is a major producer of ginger, turmeric, black pepper and pineapple), or the coastal districts of Ratnagiri and Sindhudurg, where there is extensive production of cinnamon, black pepper, turmeric, chillies and mangoes. In the selected coastal landscapes, there is potential for solar dryers for drying of fish and use of solar-based ice-making for preservation of fish. And there is potential to use solar energy based cold storage in each of the target regions and intervention landscapes. List of probable projects under SGP India, OP 7 attached as Annexure A.

Scope of Work

The objective of this Request for Proposal (RFP) is to select a competent NGO/CSO/CBO capable of implementing RE and EE interventions of minimum in the range of 150- 250 KW across three targeted landscapes. The specific objectives are to:

1. Implement community level RE and EE upscaling projects, preferably run by women and other marginalized groups.
2. Promote solar PV based solutions for community-based energy needs (e.g. drinking water pumping, schools, institutions, health centres etc) and other livelihood applications (e.g. solar based cold storage, solar based processing units/livelihood application etc)

Organizations are encouraged to design projects involving community and robust business models. The proposal should foster innovation through inclusive practices and aim to create a lasting impact on the environment and the broader community. Organizations are invited to submit proposals that focus on solutions for low-emission, efficient, and clean technologies.

They should contribute to the overall SGP goal of achieving 3 MW (of which Solar PV is 2 MW) in renewable energy and energy efficiency applications through the following:

1. Carry out innovative activities that encourage local communities to participate in increasing RE capacity.
2. Develop innovative RE& EE solutions and establish innovative mechanisms of channeling financial resources at local levels to ensure sustainability.
3. Building the local capacity to implement RE&EE solutions and creating institutional capabilities.
4. Develop a regional strategy for renewable energy (RE) and energy efficiency (EE) solutions that provides an overview of the region and explores how these solutions can be scaled up. The strategy should include a baseline study identifying the challenges, risks, and barriers related to RE and EE adoption, and it should be supported by opportunities and region-specific solutions. It is essential to engage multiple stakeholders, including women and youth, to incorporate their perspectives and foster future collaboration for the expansion of such projects.
5. Replicate project activities that are designed using a multi-stakeholder approach.
6. Enhance livelihood opportunities and resources to build and expand upon the existing strategies of a lifestyle that can be sustained.
7. Develop project which promote equality of opportunity to various vulnerable groups; magnifies role of women and youth in being change makers in the community and display inclusivity while carrying out various project activities.
8. Empowering local communities by enhancing their knowledge, enabling them to effectively plan, implement, coordinate, and monitor the outcomes.

Deliverables

The selected NGO is expected to deliver the following:

1. Inception Report: A detailed work plan, methodology, and timeline for project implementation.
    a. Baseline Assessment/ Detailed Project Report (DPR): A report on the current state of applications of renewable energy (RE) and energy efficient (EE) solutions
    b. Implementation Plan: A comprehensive plan to upscale RE and EE applications.
    c. Business Model: A detailed plan on implementing quality project ensuring its sustainability
2. Progress Reports: Regular updates on project implementation and community engagement.
3. Final Report: A comprehensive report on project results, including lessons learned and recommendations for future sustainability.

4. Capacity Building Materials: Resources for training local communities and stakeholders.

Duration and Location

Project Duration: The total project duration is 12 months

Location: The project will be implemented across the specified landscapes and districts.

Funding

The Small Grants Programme (SGP) can fund individual projects with grants up to USD $50,000 each.

Grant Awards

The GEF SGP awards grants to NGOs on a competitive basis. NGOs are encouraged and advised to apply as a Consortium, in partnership with the private sector, CSR institutions, governments and other relevant organizations.

Co-Financing

Applicants must demonstrate co-financing for the project. The proposal must clearly outline the amount of co-financing (both in investment mobilized and in-kind) and the sources of this funding.

Eligibility Criteria

Registration:

1. The NGO/CSO/CBO should be registered as a trust / society in India for more than 5 years. The organization must have a minimum of 5 years of experience. Registration documents of the NGO to be submitted.
2. NGO/CSO/CBO must be registered at the DARPAN portal of NITI Aayog and should have a valid unique ID with updated details.
3. IT returns for the FY 2021-22, 2022-23 and 2023-24 (mandatory) and FCRA (if applicable) to be submitted.
4. Audited accounts (including Balance Sheet, Income and Expenditure, Schedules, Notes of Accounts, and Auditor's Report) for the FY 2021-22, 2022-23 and 2023-24 to be submitted.
5. The latest Annual Report be submitted (FY 2023-24)

Organizational Requirements:

1. The organization should have undertaken projects in the field of renewable energy, energy efficiency, climate change, biodiversity and climate change in the last 5 financial years, viz. FY 2019-20, 2020-21, 2021-22, 2022-23 and 2023-24.
2. The organization should have prior experience in renewable energy projects along with proven track record of mobilizing co-funding from the community/private sector and government agencies.
3. The applicant organization should have an office in the selected intervention state (Madhya Pradesh/ Maharashtra/ Tamil Nadu/ Meghalaya/ Assam) (Proof of the office in the focus landscape to be submitted).
4. The organization is encouraged to submit the proposal in consortium with private/ government partner.
5. A baseline study should be given by the NGOs highlighting the opportunity of low carbon technology and methodology of community engagement.
6. NGO/CBO/CSO should have experience in implementing minimum 3 government/philanthropy/foundation funded projects in focused landscapes.
7. The organization must have generated co-finance through parallel sources. (Proof of co-financing generated in the last three financial years to be submitted). Assessment study on willingness to pay by the community should be attached.
8. Preference will be given to organizations who have participated in the earlier phases of the Small Grants Programme in India.
9. The organization should not have been debarred by any Government or UN agency, at any point of time. A self-declaration to this effect to be submitted.

Financial Capacity

The Applicant Organization should have received an average turnover of INR 30,00,000 (Thirty Lakhs) from project grants during last 3 (three) financial years viz. 2021-22, 2022-23, 2023-24 preceding the Proposal due date. (Organizations need to provide audited accounts and Auditor's Report).

Availability of Key Professionals

The Organization must have professionals having adequate experience and expertise in the thematic area and project management for this assignment. Organization should make available Curriculum Vitae of all Key Professionals meeting the requirements of the project. Detailed and duly verified CVs of such professionals should be provided as per the format given in Annexure II.

Proposal Submission Requirements

Proposals should be submitted in the given format (Annexure I) and include the following:

Technical Proposal:

- Justification of selection of intervention for upscaling
- Proposed Technology, Business Model for upscaling and Work Plan.
- Team composition and CVs of key personnel.
- Previous similar projects and references.

Financial Proposal:

Detailed breakdown of costs, including personnel, travel, materials, and other expenses.

Total project budget (in INR).

Evaluation Criteria

Proposals will be evaluated based on the following criteria:

- **Technical Expertise**: Relevance of the firm's/consultant's experience (25%). This includes:
    - Proposed capacity of RE intervention (in KW) (List of probable projects under SGP India, OP 7 attached as Annexure A)
    - Proposed business model to leverage co-funding from private sector/ government schemes/ financial institutions, facilitating increased access to hybrid grant and micro lending schemes with credit cooperatives and banks.
    - Replication potential of business model
    - Previous experience in RE&EE projects
- **Proposed Methodology**: Feasibility and innovation in achieving project goals (30%).
- **Community Engagement Approach**: Strategy for involving local communities and stakeholders (20%).
- **Cost-Effectiveness**: Competitive and realistic pricing (25%).

Submission and Contact Information

Proposals must be submitted no later than **10 April 2025** by email on sgpindia@teri.res.in. Late submissions will not be considered.

For further information or clarifications, please contact:

National Coordinator

UNDP GEF Small Grants Programme, India

Email: sgpindia@teri.res.in

Annexure A Renewable Energy (RE) and Energy Efficiency (EE) Solutions

The expected outcomes of SGP India-OP7 India

- **Core Indicator 6: 695,000 tCO2e (lifetime direct); 100,000 tCO2e (Lifetime indirect)**

Outcome 1.2 Appropriate low emission, efficient and clean technologies and solutions adopted at scale.

Output 1.2.1 Broader adoption of successfully implemented community level renewable energy and energy efficient technologies and solutions through upscaling partnerships

Output 1.2.2: Community level initiatives implemented that apply integrated RE and energy efficient technologies and solutions for productive use.

This annex presents the calculations for the estimated greenhouse gas (GHG) emissions mitigated through renewable energy (RE) and energy efficiency (EE) interventions under the Seventh Operational Phase (OP7) of the GEF Small Grants Programme (SGP) in India.

The types of interventions and estimated mitigation benefits are based on findings of stakeholder consultations carried out during the project preparation grant (PPG) phase and on the actual approved projects under the fifth operational phase (OP5) of the SGP in India.

Consistent with GEF guidelines, the estimated GHG emission reductions are reported in tons of carbon dioxide equivalent (tCO2e). CO2e reductions are cumulative, calculated for the lifetime of the envisaged investments. It is important to note that no GEF projects can claim impacts for more than 20 years. Typical investment lifetimes are outlined in the GEF Manual for Calculating GHG Benefits of GEF Projects: Energy Efficiency and Renewable Energy Projects (GEF/C.33/Inf.18, April 16, 2008).

Options for community-based Renewable Energy (RE) and Energy Efficiency (EE) Solutions

A) Renewable Energy Solutions

No.	Renewable Energy Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
A1	Solar PV Induction cookers	Central region	The intervention landscape (Chhatarpur, Damoh and Barwani Districts) in the Central region	Given the intensity of solar radiation almost throughout the year in the central region, solar induction cookers may be a feasible option in the central region. As solar energy intensity in most parts of Manas and Khasi Hills landscapes is not that good (due to cloud covers) for significant part of the year, use of 'Solar Induction Cookers' for cooking need to be ascertained before suggesting such an intervention in these landscapes in the North East region.

No.	Renewable Energy Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
				For any given location, an analysis would need to be made to ascertain the cost effectiveness of a solar electric cooking system, taking into account the costs for solar PV panels (this will vary depending on the intensity of solar radiation), the batteries, the induction cooker, etc. The Government of India is contemplating a programme to distribute millions of electric/solar induction cookstoves (or solar stoves) in rural areas[1]. Here, the model would be similar to that of UJALA[2] (Unnat Jyoti by Affordable LEDs for All) scheme wherein prices of LED bulbs were brought down drastically through bulk procurement. The LED lamps were supplied to the households at reduced prices and the balance recovered through the subsequent electricity bills.
A2	Solar PV systems for groundwater pumping for drinking water and community lighting and other needs along with the village level water harvesting plan (community centre, information centre, rural health centre etc)	Central region	Intervention landscape (Chhatarpur, Damoh and Barwani) in Central region	The government is implementing a large project to make available solar PV based pumps for irrigation needs by the farmers (KUSUM). Under a separate programme (Har Gar Nal Jal Yojana) the Government of India plans to make available piped drinking water to each household in the country. It is an ambitious plan. Many of the piped drinking facilities under the programme will be based on groundwater and solar energy. The government scheme for the state of Madhya Pradesh alone may not be sufficient, particularity considering regarding the availability of ground water. The intervention landscape at the west coast has plentiful rain and availability of surface water for drinking is considered adequate. Similarly, the intervention landscape in the NE region has good rains and surface water availability is good.
A3	Solar PV for institutions (schools,	Central region		With the recently implemented scheme by the government, the electrification of all villages in the

[1] Clean cooking challenges in rural India, Amit Kumar, TERI Newsletter, The Energy and Resources Institute (TERI), 09 Apr 2018

[2] Unnat Jyoti by Affordable LEDs for All (UJALA) was launched in May 2015. It is a non-subsidized LED lamp distribution project. It was implemented largely in urban areas of the country.

No.	Renewable Energy Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
	community centre, health centre etc.) in rural areas			country has been achieved. Availability of electricity is also satisfactory. However, with some of the institutional consumers of electricity in the rural areas there are issues regarding the payment of electricity bills on a regular basis. Provision of solar PV based systems for such institutions (particularly those working largely during daytime e.g. schools, health centres) is a viable solution.
A4	Solar PV based small cold rooms for fruits, vegetables, dairy products	North East region, Coastal region	Intervention landscapes in the NE region and the Coastal region	The intervention landscapes at the west coast and NE regions are major producers of fruits and spices. Provision of cold storage at the community level with provide the time in the hands of the farmers to send the produce to market. Also, availability of cold storage will help to further boost horticulture activities.
A5	Solar based small ice making plants for preservation of fish	Coastal region	Ramanathapuram in Tamil Nadu Sindhudurg and Ratnagiri in Maharashtra	Virudhnagar District may not be suitable due to not limited scale of fishing activities.
A6	Solar PV power for milk chilling at milk collection centre	Coastal region, Madhya Pradesh State (Central region)	Intervention landscapes in the coastal region (both the west coast and the east coast)	There is not much dairy activity in the intervention landscape of the central region (except to some extent in the Chhatarpur District). But there is significant level of dairy activity in the other districts of Madhya Pradesh. Presently there is not much dairy activity in the NE region.
A7	Solar PV Pumps for Horticulture combined with micro irrigation plans		Each intervention landscape in the three regions	
A8	Solar PV aeration of fishing lake/ponds		Each intervention landscape in the three regions	

No.	Renewable Energy Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
A9	Solar pumps for irrigation		Each intervention landscape in the three regions	The government is implementing a large project to make available solar PV based pumps for irrigation needs by the farmers (KUSUM). These solar PV pumps will be used both for groundwater and the surface water. Apart from providing the new solar pumps the program has the provision to convert the existing diesel/electricity-based pumping systems to solar PV based systems. In the NE partially due to the agriculture practices and partially due to comparatively good availability of surface water the use of pumps for irrigation is not much prevalent. However, there is good potential to use pumps for irrigation (particularly for horticulture when combined with micro irrigation practices. In case of the Coastal region and Madhya Pradesh (Central region), the ongoing programme by the government may not be enough to provide solar PV pumps to the large number of farmers.
A10	Solar Thermal conduction dryers for drying of spices, fruits and vegetables	North East region, Coastal region		These regions have significant production of spices. Use of drying would increase the quality of spices In the central region, the pulses produced are dried in the sunshine. Due to intense heat, generally sun drying is considered sufficient and use to solar conduction dryers may not be required.
A11	Solar conduction dryers for drying of fish	Coastal region	Ramanathapuram in Tamil Nadu Sindhudurg and Ratnagiri in Maharashtra	Virudhnagar may not be suitable due to not limited scale of fishing activities
A12	Biomass briquettes for cooking and other heating applications (combined with suitably designed stove) in cottage	North East region	All the selected landscapes (Khasi Hills in Meghalaya and Manas In Assam) within the NE region. Can be replicated	Such a project was implemented in Manipur State under OP5 of SGP in India. There is a potential to replicate / upscale the intervention for all the NE states of the country. It may be tired out in other states as well but the socio-economic conditions and availability of agricultural residue in other states are different, and the suitability and acceptability of the RE technology need to be ascertained. For example, the type of agricultural residue may not suit the technology being used for

No.	Renewable Energy Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
	industry applications		in all other NE states of the country	briquetting or enough quantity of surplus agricultural residue/biomass may not be available.
A13	Biogas (at community level) for cooking	Central region, North East region, Coastal region	Each intervention landscape in the three regions	

B) Energy Efficiency Solutions

No.	Energy Efficiency Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
B1	LED lamps replacing incandescent lamps		Each intervention landscape in the three regions	UJALA (Unnat Jyoti by Affordable LEDs for All) is being implemented by the government in the country to replace incandescent lamps with the LED lamps. Under the UJALA programme, the price of a LED bulb was brought down drastically through bulk procurement. The LED lamps were supplied to the households at reduced prices and the balance is recovered through the subsequent electricity bills. It is a non-subsidy scheme. The scheme is being implemented largely in the urban areas of the country. This leaves the scope for implementing project to replace the incandescent lamps in the rural households with the LED lamps. Considering that in many areas there are no meters for electricity and the consumers pay a fixed charge for a very basic electricity connection, there is no motivation at the household level to replace the present inefficient lamps with LEDs. This is despite the comparatively much higher life of LED lamps.
B2	Improved cookstoves		Each intervention landscape in the three regions	In India the first government scheme in support of 'Improved Cook Stoves' was the National Programme on Improved Chulhas[3] (NPIC), which distributed 35 million chulhas in 16 years since its launch in 1986. NPIC was discontinued in 2002. The government's present 'Unnat Chulha Abhiyan (UCA)' scheme could meet just one per cent of its target of deployment of 2.75 million Improved Cook Stoves between 2014 and 2017[4]. Considering a wide gap in the implementation of the government schemes for improved cook stoves there is an opportunity for improving the efficiency of the cook stoves

[3] Chulha = Cook stove

[4] Sasmita Patnaik, Saurabh Tripathi, Access to Clean Cooking Energy in India, State of the Sector, CEEW Report, October 2017

No.	Energy Efficiency Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
				using biomass. However, the design of the improved cook stoves needs to the customised depending upon the type of biomass, food habits and the cooking habits of the targeted communities.
B3	Replacement of inefficient fans with super-efficient fans		Each intervention landscape in the three regions	In comparison to the fans presently being used by the households in the country, brush-less direct-current (BLDC) motor-based fans are 30 t0 40% more energy efficient for same level of performance. Energy Efficiency Services limited (EESL) has launched the National Energy Efficient Fan Programme (NEEFP) to promote efficient use of energy by increasing the use of energy efficient appliances at the residential level. Under the NEEFP, EESL provides EE ceiling fans which are 30% more energy efficient as compared to conventional fans. The energy efficient fans will be available to the consumers on an upfront payment of INR 1,150/- per fan. EESL has distributed over 500,000 energy efficient fans under this scheme. The difference in the price between the efficient and the inefficient fan is the primary reason for its low penetration along with the lack of awareness. The NEEFP is being implemented mainly in the urban areas. Almost all households which have electricity own fans for cooling. Thus, there is potential to implement efficient fans-based EE projects in some of the rural areas of the intervention landscapes.
B4	Energy efficiency in edible oil expellers	Central region and Coastal region (mainly west coast)		Maharashtra and Madhya Pradesh are two large edible oil producing states in the country. The extraction of oil is carried out in several cottage size oil expellers and some of the solvent extraction units. The oil expellers still use primitive inefficient technologies. Many of these oil expellers use motors and heating methods which require improvements to ensure energy efficient operations.
B5	Energy Efficiency in Power looms	Central region, North East region and Coastal region		India manufactures 5% of fabric through the organized sector, 20% through handloom sector, 15% through knitting sector and 60% of Indian fabric is produced through the decentralized power loom sector. All the selected regions (NE, Coastal, and Central) have significant handloom activities. However, in case of Central Region there are limited handloom activities in the intervention landscape, but such activities are quite predominant at the state level. In order to increase the competitiveness of the power loom sector there is a programme in the country to increase the EE of power looms. Efficiency Services Limited (EESL) provides energy efficient power looms, motors, and rapier kits to small and medium power loom units at zero upfront cost. This comes after Ministries of Power and Textiles have joined

No.	Energy Efficiency Solution	Relevant Regions / Landscapes	Intervention landscapes	Comments
				hands under a new initiative SAATHI — Sustainable and Accelerated Adoption of efficient Textile technologies to Help small Industries. "Under this initiative EESL would procure energy efficient power looms, motors and rapier kits in bulk and provide them to the small and medium power loom units at no upfront cost," The government's SAATHI initiative is being jointly implemented by EESL and the office of the Textile Commissioner on a pan India basis. The use of energy efficient equipment would result in savings in terms of energy and cost to the unit owner. He would repay in instalments to EESL over a period of four to five years. This is the aggregation, bulk procurement and financing model that EESL has successfully deployed in several sectors like LED bulbs, smart meters and electric vehicles.

GHG mitigation potential

C) Renewable Energy Solutions

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
A1	Solar PV Induction cookers	Replacement of 150 number of cookstoves using wood (non-sustainable wood sourced from the forest) replaced with solar PV based induction cookers. Although the life of the solar panels ranges from 20 to 25 years, the life for computing the GHG emission reduction has been considered as 12 years. Although the solar induction cookers will either replace LPG or wood for cooking, for simplicity	150*1000 W = 150 kW[6]	3942 tons of wood over the lifetime of the Solar Induction Cookers (approx.) = 3942*15000 MJ/ton[7]= 59130000 MJ = 59.13 TJ of biomass energy	59.3 TJ * 109.6 CO_2/TJ[8] = 6499 tons of CO_2 equivalent (tCO_2e)

[6] The capacity of the solar panel in the overall system is a variable and depends upon the required duration of cooking in a day, time of cooking, along with the solar energy potential of the location etc. The systems available in the market use solar panel capacity ranging from 340 W to 1500 W. It is estimated that with the solar panel capacity of 1000 W and with battery backup, it would be possible to have cooking time of 4-5 hrs and day and the system would be able to support the cooking requirements of an average household comprising of 4-6 members.

[7] IPCC default Calorific value for wood.

[8] IPCC default emission factor for biomass.

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
		the baseline has been considered as wood-based cook stoves. Average wood consumption per stove per day has been considered[5] as 6 kg. Wood saved per day per stove = 6 kg. No of days used in a year = 365 Wood saved over the lifetime of the induction cookers = 0.006 Tons*150 numbers*365 days*12 years = 3942 tons over 12 years			
A2	Solar PV systems for groundwater pumping for drinking water and community lighting and other needs along with the village level water harvesting plan (community centre, information centre, rural health centre etc.).	A single installation would comprise of a borewell, solar PV based ground water pumping system, overhead water storage, small battery backup for lighting, LED based lighting points. 30 such installations may be supported under the SGP. Number of systems supported under SGP = 30 Connected load of pump = 5 kW Capacity of the Solar panel = 7.5 kW. Capacity of overhead water storage = 10000 litres Hours of operations for the pump in a day = 6 to 8 hrs. Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.	7.5 kW*30 = 225 kW	Avoided generation of Grid energy over the lifetime of the system= 30 numbers*7.5 kW*365 days*24 hrs*0.12(Capacity Utilisation Factor) *12 Yrs. = 2838240 kWh = 2838 MWh	2838 MWh*0.83 tCO2e/MWh[9] = 2355 tCO2e
A3	Solar PV for institutions (schools, community centre, health centre etc.) in rural areas	A single installation would comprise of a solar panel, inverter, battery storage, LED based lighting points for common areas 35 such installations may be supported under the SGP. Number of systems supported under SGP = 35.	7.5 kW*35 = 262.5 kW	Avoided generation of grid energy over the lifetime of the system= 35 numbers*7.5 kW*365 days*24*0.12 (CUF)*12 Yrs.	3311 MWh*0.83 tCO2e /MWh = 2748 tCO2e

[5] The wood consumption per stove per day may vary over a large range (say from 3 kg to 8 kg per day), depending upon the design of the baseline cookstove, the quality of wood, moisture of wood, cooking habits etc. It is suggested that at the time of implementation of the project, the average consumption of wood in the cook stoves be determined by carrying out a small survey.

[9] Grid emission factor of 0.83 tons of CO2e/ MWh.

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
		Capacity of the Solar panel = 7.5 kW. Hours of operations in a day = 4 to 8 hrs for appliances during the day and 8 hours a day for lighting of common areas during night. Capacity utilization factor (CUF) of the solar panel = 12% Life of the system = 12 years		=3311280 kWh = 3311 MWh	
A4	Solar PV based small cold rooms for fruits, vegetables, dairy products	A single installation would comprise of a solar panel, insulated cold room, inverter, battery storage (optional), 35 such installations may be supported under the SGP. Number of systems supported under SGP = 35 Capacity of the Solar panel = 7.5 kW. Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.	7.5 kW*35 = 262.5 kW	Avoided generation of grid energy over the lifetime of the system= 35 numbers*7.5 kW*365 days*24*0.12 (CUF)*12 Yrs. =3311280 kWh = 3311 MWh	3311 MWh*0.83 tO2e /MWh = 2748 tCO2e
A5	Solar PV based small ice making plants for preservation of fish	Capacity of the plant = One ton of block ice per day No of Ice making plants supported under SGP = 12 A 20 kW PV-system Life of the system = 12 years	20 kW*12 = 240 kW	Avoided generation of grid energy over the lifetime of the system= 12 numbers*20 kW*365 days*24*0.12 (CUF)*12 Yrs. =3027456 kWh = 3027 MWh	3027 MWh*0.83 tCO2e/MWh = 2513 tCO2e
A6	Solar PV for milk chilling at milk collection centre	A single installation would comprise of a solar panel, insulated cold room, inverter, battery storage (optional). Rated refrigeration capacity of the system would be 5 tons 25 such installations may be supported under the SGP. Number of systems supported under SGP = 25. Capacity of the Solar panel = 7.5 kW.	7.5 kW*25 = 187.5 kW	Avoided generation of grid energy over the lifetime of the system= 25 numbers*7.5 kW*365 days*24*0.12 (CUF)*12 Yrs. =2365200 kWh = 2365 MWh	2365 MWh*0.83 tCO2e/MWh= 1963 tCO2e

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
		Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.			
A7	Solar PV Pumps for Horticulture combined with micro irrigation plans	A single installation would comprise of a borewell, solar PV based ground water pumping system, overhead water storage. 25 such installations may be supported under the SGP. Number of systems supported under SGP = 25. Connected load of pump = 5 kW. Capacity of the Solar panel = 3.5 kW. Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.	5.0 kW*25 = 125 kW	Avoided generation of grid energy over the lifetime of the system= 25 numbers*5 kW*365 days*24 hrs*0.12*12 Yrs. = 1576800 kWh = 1577 MWh	1577 MWh*0.83 tCO2e/MWh = 1309 tCO2e
A8	Solar PV aeration of fishing lake/ponds	50 such installations may be supported under the SGP. Number of systems supported under SGP = 50. Capacity of the Solar panel = 2.5 kW. Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.	2.5 kW*50 = 125 kW	Avoided generation of grid energy over the lifetime of the system= 50 numbers*2.5 kW*365 days*24 hrs*0.12*12 Yrs. = 1576800 kWh = 1577 MWh	1577 MWh*0.83 tCO2e/MWh = 1309 tCO2e
A9	Solar PV pumps for irrigation	A single installation would comprise of a solar PV based water pumping system (PV panels, control system, pump) 100 such installations may be supported under the SGP. Number of systems supported under SGP = 100. Connected load of pump = 3.5 kW. Capacity of the Solar panel = 5.0 kW. Capacity utilization factor (CUF) of the solar panel = 12%. Life of the system = 12 years.	5.0 kW*100 = 500 kW	Avoided generation of Grid energy over the lifetime of the system= 100 numbers*5 kW*365 days*24 hrs*0.12*12 Yrs. = 6307200 kWh = 6307 MWh	6307 MWh*0.83 tCO2e/MWh = 5235 tCO2e
A10	Solar Thermal conduction dryers	A single installation would comprise of a solar conduction dryer, small solar PV panel with	1.0 kW*300 = 300 kW	Avoided generation of grid energy over	1620 MWh*0.83

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
	for drying of spices, fruits and vegetables	battery backup for powering the air circulation fan, control system etc. Baseline considered is the use or electrically operated dryers. 300 such installations may be supported under the SGP. Number of systems supported under SGP = 300. Energy Output of the system = 1kWt Average duration of operation in a day = 3 hrs. Average number of operations in a year =150. Life of the system = 12 years		the lifetime of the system= 300 numbers*1 kW*150 days*3 hrs*12 Yrs. = 1620000 kWh = 1620 MWh	tCO2e/MWh = 1345 tCO2e
A11	Solar Thermal conduction dryers for drying of fish	A single installation would comprise of a solar conduction dryer, small solar PV panel with battery backup for powering the air circulation fan, control system etc. Baseline considered is the use or electrically operated dryers. 150 such installations may be supported under the SGP. Number of systems supported under SGP = 150. Energy Output of the system = 3kWt. Average duration of operation in a day = 3 hrs. Average number of operations in a year =150. Life of the system = 12 years.	3.0 kW*150 = 450 kW	Avoided generation of grid energy over the lifetime of the system= 150 numbers*3 kW*150 days*3 hrs*12 Yrs. = 2430000 kWh = 2430 MWh	2430 MWh*0.83 tCO2e /MWh = 2017 tCO2e
A12	Biomass briquettes for cooking and other heating applications (combined with suitably designed stove) in cottage industry/community cooking / Small	The project would comprise of production of briquettes (out of agriculture residue), specifically designed stoves suitable for the briquettes produced, fabrication of the machinery for production of briquettes. Baseline considered is the use wood collected from the forests (non-sustainable biomass).	25.0 kW*60 = 1500 kWt	Wood saved over the lifetime of the stoves = 60 numbers* 365 days*80 kg = 1752 tons 1752 tons of wood * 15000 MJ/Ton = MJ	26.28 TJ * 109.6 CO2/TJ = 2880 tCO2e

No.	Renewable Energy Solution	Project Structure and RE Capacity	RE Capacity Created	Fossil Fuel based Energy Avoided	GHG Emission Mitigation Potential
	eateries etc. applications	60 such installations may be supported under the SGP. Number of systems supported under SGP = 60. Energy Output of the system = 25 kWt. Average duration of operation in a day = 6 hrs. Average number of operations in a year =365. Life of the system = 6 years Consumption of wood in the baseline = 80 kg/day per system.		= 26.28 TJ of biomass energy	
A13	Biogas (at community level) for cooking	The project would comprise of number of owned biogas reactors using animal manure as the substrate. One such biogas reactor would be able to support the cooking energy needs of about 15 to 20 households Baseline considered is the use wood collected from the forests (non-sustainable biomass). 30 such installations may be supported under the SGP. Number of systems supported under SGP = 30. Energy Output of the system = 25 kWt. Average number of days of operations in a year =365. Life of the system = 6 years. Consumption of wood in the baseline = 14 households*6 Kg/household per day = 84 kg/day per reactor (80 kg/day per reactor). Life of the biogas reactor = 6 years.	25.0 kW*30 = 750 kWt	Wood saved over the lifetime of the stoves = 30 numbers* 365 days*80 kg = 876tons 876 tons of wood * 15000 MJ/Ton = MJ = 13.14 TJ of biomass energy	13.14 TJ * 109.6 CO2/TJ = 1440 tCO2e
Sub-total, RE solutions:					**34343 tCO2e Say 34000 tCO2e**

Target for implementation of RE capacity and the corresponding GHG emission mitigation

- RE Capacity = 3 MWe (this capacity will be achieved by a combination of the implementation of the above RE technologies or some of the other RE technologies as picked up by the NGOs/CBOs)
    - Solar PV = 2.0775 MW (Say 2 MW)
    - Solar Thermal = 0.75 MWt
    - Biomass = 1.50 MWt
    - Biogas = 0.75 MWt
- GHG Mitigation Potential over the duration of project implementation = 34000 tCO2e

A. Energy Efficiency Solutions

No.	Energy Efficiency Intervention	Project Structure and Potential Energy Savings	Energy Savings Potential	GHG Emission Mitigation Potential
B1	LED lamps replacing incandescent lamps	Replacement of 3000 incandescent lamps with LED lamps. Energy Saving per LED lamp = 60-4 = 56 W. Hrs. = 5. No. of days operations in a year =365. Savings = 365*5*56 = 102200 W = 102.22 kWh per lamp per yr. Life of LED lamp = 10 Yrs. No of Lamps = 3000.	Total energy savings over lifetime of lamp = 102.22*10*3000 = 3066600 kWh = 3066.6 MWh	3066.6 MWh * 0.83 tons of CO2/MWh = 2545 tCO2e
B2	Improved cookstoves	This is being envisaged as a replication and scale up project of an earlier similar project implemented in Manipur under SGP OP5. Replacement of 550 number of cookstoves using wood (non-sustainable wood sourced from the forest) replaced with the briquetted biomass (briquettes based on agriculture residue), the project may comprise of following two components. • Fabrication of hardware like briquetting machines and the corresponding burning stoves • Installation and use of the improved cookstoves by the households Life of the improved cookstove has been considered as 5 years.	550 *6 Kg wood per day per stove* 365* 5 Yrs. = 6022 tons of wood over the lifetime of the improved cook stoves = 6022*15000 MJ/Ton[11]= 90,33000 MJ = 90 TJ/Yr.	90 TJ * 109.6 CO2/TJ[12] = 9864 tCO2e

[11] IPCC default calorific value for wood

[12] IPCC default emission factor for biomass

No.	Energy Efficiency Intervention	Project Structure and Potential Energy Savings	Energy Savings Potential	GHG Emission Mitigation Potential
		Average wood consumption per stove per day has been considered[10] as 6 kg		
B3	Replacement of inefficient fans with super-efficient fans	Replacement of 1500 fans with super-efficient fans. Energy Saving per Fan = 75-30 = 45 W. Hrs. = 16. Fan usage, number of days per year = 180. Savings = 180*16*45W = 129600 W = 130 kWh per fan per yr. Life of fan = 10 Yrs. No of fans = 1500		1950 MWh * 0.83 tons of CO2/MWh = 1614 tCO2e
B4	Energy efficiency in edible oil expellers	Replacement of 50 oil expellers with their energy efficiency counterparts Energy saving per oil expeller system = 15-10 = 5 kW Hrs. of operation per day = 6. Number of operational days per year = 300. Life of the EE Oil Expeller system = 10 Yrs. Savings = 5 kW *50*300*6 = 450000 kWh = 450 MWh. Life of oil expeller = 10 Yrs. No of oil expeller = 50.	5 kW*50 Nos*6 Hrs.*300 days *10 Yrs. = 4500 MWh	4500 MWh * 0.83 tons of CO2/MWh = 3735 tCO2e
B5	Energy Efficiency in Power looms	Replacement of 50 power looms with their energy efficiency counterparts. Energy Saving per power loom = 3-2 = 1 kW Hrs. of operation per day = 6 Number of operational days per year = 300. Life of the EE power loom system = 10 Yrs.	1 kW*50 Nos*6 Hrs.*300 days *10 Yrs. = 900 MWh	900 MWh * 0.83 Tons of CO2/MWh = 747 tCO2e

Lifetime direct GHG emissions mitigated

Target for Energy Savings due to implementation of EE measures and the corresponding GHG emission mitigation during implementation of SGP OP7:

- Energy / Fuel saved[13] (these savings will be achieved by a combination of the implementation of the combination of the above EE measures or some of the other EE measures as picked up by the NGOs/CBOs implementing the projects)
    - Fuel saved = 6,000 tons of wood (approx.)
    - Electricity saved = 10000 MWh (approx.) = 10000*3600 = 36000000 MJ = 36 TJ
- GHG Mitigation Potential over the duration of project implementation

[10] The wood consumption per stove per day may vary over a large range (say from 3 kg to 8 kg per day), depending upon the design of the baseline cookstove, the quality of wood, moisture of wood, cooking habits etc. It is suggested that at the time of implementation of the project, the average consumption of wood in the cook stoves be determined by carrying out a small survey.

[13] This has been worked out considering the grid emission factor of 0.83 tons of CO2/ MWh. For the purpose of this document the overall target of mitigating GHG emissions of 25000 tons of CO2 equivalent has been split equally between the GHG emissions avoided due to fuel savings and those due to savings of electricity, however, the project design has a single target for the GHG emissions avoided due to implementation of EE measures.

- Due to saving of fuel wood = 9,864 tCO2e
- Due to saving of electricity = 8,640 tCO2e

Total lifetime direct GHG emissions mitigation potential = 52,504 tCO2e **(say 50,000** tCO2e**) for the CCM projects supported under the OP7 SGP in India (Sub-Indicator 6.2).**

Approximation of GHG emissions avoided in the agricultural, forestry, land use (AFOLU) sector

The project strategy includes a substantive focus on capacitating local communities in restoring-rehabilitating degraded agricultural land, forests, and mangroves-wetlands and improving management of critical landscapes, to protect biodiversity and ecosystem surfaces and deliver livelihood benefits. The GHG emissions avoided through these interventions are included in the Core Indicator 6 estimations under Sub-Indicator 6.1.

Using version 8 of the FAO Ex-Ante Carbon Balance Tool (EX-ACT), rough approximations were made of the GHG emissions avoided in the AFOLU sector. The approximations considered the envisaged results under Core Indictor 3 (area of land restored): 6,000 ha of agricultural land (Plantation Zone 3), 3,500 of forest land (Forest Zone 3), and 500 ha of mangroves. A conservative approach was applied in the EX-ACT calculations, i.e., the degradation level at the initial state is assumed to be low, and without the SGP OP7 project, the degradation would deteriorate to a moderate level. With the project interventions, the degradation level is assumed to be restored or maintained at low.

The attached output summary of the EX-ACT calculation shows a cumulative total of 645,496 tCO2e (rounded to **645,000 tCO2e**) avoided, over a 20-year lifetime, as a result of the envisaged 10,000-ha of areas restored, under the GEF definition of restoration. Please note that this is a rough approximation, to provide an indicative value of the mitigation benefits generated under the AFOLU sector.

Lifetime indirect GHG emissions mitigated

The estimation of lifetime indirect GHG emissions mitigated is based on the bottom-up approach[14], taking into consideration the likelihood the project results will be replicated in other places/markets. The direct GHG emission reductions are multiplied by an assumed replication factor (RF) to provide the estimated bottom-up indirect reduction:

[CO2e indirect bottom-up] = [CO2e direct] * [RF]

A replication factor (RF) of 2 is assumed for the OP7 project in India, for the lifetime direct mitigation benefits estimated through community RE and EE interventions. Through capacity building, demonstration of community-drive CCM interventions, particularly those associated with small-scale production, and upscaling through expanded access to microcredit and other finance mechanisms and strengthened collaborative arrangements with governmental, NGO, and private sector partners, the OP7 funding is expected to facilitate replication totalling 100,000 tCO2e over 10 years post project.

[CO2e indirect bottom-up] = 50,000 tCO2e * 2 = **100,000 tCO2e**

[14] This approach follows the methodology outlined in the GEF Manual for Calculating GHG Benefits of GEF Projects: Energy Efficiency and Renewable Energy Projects (GEF/C.33/Inf.18, April 16, 2008).