| Cover Page for Project/Program Approval Request | | | |
|---|---|---|---|
| 1. **Country/Region**: | Honduras | 2. **CIF Project ID#**: | |
| 3. **Source of Funding:** | ☐ FIP | ☐ PPCR | ■ SREP |
| 4. **Project/Program Title:** | **Sustainable Rural Energization (ERUS) – Parts I & III** | | |
| 5. **Type of CIF Investment:** | ☐ Public | ☐ Private | ■ Mixed |
| 6. **Funding Request in million USD equivalent:** | *Grant:* 2,947,000 (**Part I:** 2,435,000; **Part III:** 512,000) | *Non-Grant: 0* | |
| 7. **Implementing MDB(s):** | IDB/MIF | | |
| 8. **National Implementing Agency:** | **Part I** - Fundación Hondureña de Ambiente y Desarrollo Vida (Fundación Vida)<br>**Part III** - Secretaría de Finanzas (SEFIN) | | |
| 9. **MDB Focal Point and Project/Program Task Team Leader (TTL)**: | *Headquarters- Focal Point:*<br>Claudio Alatorre | *TTL:*<br>Zachary Levey (**Part I**)<br>Claudio Alatorre (**Part III**) | |
| 10. **Project/Program Description**: | | | |

## Package Requested

1. The IDB is submitting the following package which is in line with the Scaling-Up Renewable Energy in Low-Income Countries (SREP) Investment Plan (IP) for Honduras approved in November 2011 for the consideration of the SREP Sub-Committee and includes the following projects:

A. **Part I.** Sustainable Rural Energization (ERUS) for Cookstoves: Promoting Sustainable Business Models for Clean Cookstoves Dissemination, for a total of USD 2.435 Million of SREP resources.

B. **Part III.** Operation Expenses for Investment Implementation (also known as SREP Program Supervision Support) for a total of USD 0.512 Million of SREP resources.

## Part I. Executive Summary for the SREP Subcommittee – ERUS Cookstoves

| | |
|---|---|
| *Name of Project or Program* | **SREP Honduras**<br>**Sustainable Rural Energization (ERUS) – Part I: Promoting Sustainable Business Models for Clean Cookstoves Dissemination** |
| *SREP amount requested* | **USD 2,435,000 (grant resources)** |
| *Country targeted* | Honduras |
| *Indicate if proposal is a Project or Program* | Private Sector Project. This is the first part of the joint IDB-IBRD-Government of Honduras ERUS Cookstoves Program. Part II will be submitted in 2014. |

## Fit with SREP Honduras Investment Plan

2. The Sustainable Rural Energization (ERUS) Program is one of the components of the SREP IP for Honduras, endorsed by the SREP Trust-Fund Subcommittee (TFS) on November 2011. This component is divided in two subcomponents: "Renewable energy systems for isolated communities" (rural electrification), to be executed by the International Bank for Reconstruction and Development (IBRD), and "Sustainable and efficient firewood use" (clean cook-stoves), to be executed jointly by IDB and IBRD. A preliminary allocation of resources is included on the IP (see Table 1).

**Table 1. Indicative, Preliminary Allocation of SREP Resources for ERUS among MDBs (USD Million) as proposed in the Investment Plan**

| Subcomponent | IBRD | IDB | Total SREP Resources |
|---|---|---|---|
| Component preparation | 0.300 | | 0.300 |
| RE systems for isolated communities | 6.000 | | 6.000 |
| Sustainable and efficient firewood use | 1.000 | 1.000 | 2.000 |
| Studies/technical designs/consultancies | 0.712 | 0.238 | 0.950 |
| Capacity building | 0.713 | 0.237 | 0.950 |
| ***Total*** | ***8.725*** | ***1.475*** | ***10.200*** |

Source: Table 33 of the Investment Plan.

3. In 2011 the TFS approved a preparation grant of USD300,000 to be executed by IBRD, aimed at the design of the ERUS Component.

4. After the IP was approved the government of Honduras, the IDB and the IBRD worked together to prepare the clean cook-stove subcomponent of ERUS. A team of consultants was hired by IBRD in coordination with the Government and IDB in early 2013. The consultants carried out several workshops and other activities with the Government of Honduras and relevant stakeholders including representatives from multilateral development banks, NGOs, and cooperation agencies.

5. A project design document was jointly prepared as a result of this process. In order to reduce transaction costs, it was decided that the IDB would execute the entirety of the SREP resources allocated for the cook-stove subcomponent. IBRD will remain engaged in the program, as part of its regional initiative for clean cook-stoves.

6. The cook-stove subcomponent will use a total of USD 2.95 million of SREP resources. This includes the activity on the IP allocation table named **Sustainable and efficient firewood use** (USD 2 Million), and part of the activities **Studies/technical designs/consultancies** (USD 0.475 Million) and **Capacity Building** (USD 0.475 Million) as described on table 1. As preparation activities advanced further funds were identified (see Table 2).

7. The cook stove subcomponent will have two projects, focused respectively on private and public sector activities. The first project, called "Promoting Sustainable Business Models for Clean Cookstoves Dissemination", will focus on market-based solutions to scale up adoption of clean cookstoves. The second project, called "Promoting Sustainable Public Policies for Clean Cookstoves Dissemination" will focus on public sector policies and programs to scale up adoption of clean cookstoves. The financing table for both projects is shown on Table 2.

**Table 2. Financing table for the ERUS clean cook-stove subcomponent (USD million)**

| Part | SREP resources | IDB/MIF resources | Counterpart resources | TOTAL |
|---|---|---|---|---|
| 1. **Part I.** Promoting Sustainable Business Models for Clean Cookstoves Dissemination | 2.435 | 2.189 | 0.85 | 5.474 |
| 2. **Part II.** Promoting Sustainable Public Policies for Clean Cookstoves Dissemination | 0.515 | | TBD | TBD |

8. **The request included as part of this package is only for Part I** (Promoting Sustainable Business Models for Clean Cookstoves Dissemination) (see MIF Donors Memo for the detailed proposal, pages 3 to 24). The Promoting Sustainable Public Policies for Clean Cookstoves Dissemination Public Sector Component section (Part II) is under negotiation and final preparation stage with the government of Honduras. It is expected that this Component will be presented for approval in January 2014.

## Objective and Development Benefits

9. The general objective of this Technical Cooperation (TC) is to have a transformative impact on the market for clean cookstoves by enabling the market conditions for new business models to flourish and develop and by leveraging and strengthening the existing private sector capacity in Honduras. The intended impacts of the project include reductions in health risks associated with indoor air quality in poor and low-income households in Honduras, time and cost savings in household fuel use, and reductions in greenhouse gas emissions. The intended result is to scale up the proper use and adoption of clean cookstoves in poor and low income households in Honduras through sustainable, market-based solutions.

**10.** The proposed ERUS Cookstoves project will focus on building enabling market conditions and strengthening a network of rural enterprises to promote, build, distribute, maintain and supervise the installation and proper use of clean cookstoves. Key dynamics of this model include targeted efforts to: i) improve cookstove quality, from component durability to stove model performance and consistency through a combination of standards and rigorous monitoring and supervision, ii) enhance the demand through aggressive outreach and public promotion campaigns, iii) improve affordability through a combination of direct incentives, micro-loans, and payments for environmental services, and iv) increase access to the clean cookstoves technologies and services by training a network of stove micro-entrepreneurs to promote, install and provide after sales customer support. The proposed model incorporates and draws upon best practices from existing clean cookstoves initiatives in Honduras and other countries with the aim of transforming the sector toward a more sustainable and dynamic market for the sale and distribution of clean cooking technologies.

## SREP Transformational Impact

11. Fuelwood is the country's largest energy source, representing 46 percent of final energy consumption and 86 percent of total domestic energy use. National survey data on domestic fuelwood consumption suggest that 47 percent of Honduran households cook exclusively with fuelwood and another 22 percent cook with fuelwood in combination with other energy sources, such as liquid petroleum gas (LPG) and electricity. Fuelwood is not free and must either be collected or purchased, which can exact significant economic burdens on poor households. Among fuelwood users in Honduras, 26 percent purchase fuelwood. For urban households, the estimated annual cost of purchasing fuelwood is approximately US$ 217 per household per year.

12. **Clean cookstove technologies are a proven means of addressing the myriad problems tied to the use of fuelwood** on traditional wood-burning stoves and have become increasingly accepted by Honduran families. Through more efficient use of non-renewable biomass, stoves can reduce 1.5 to 2.5 tons of CO2-equivalent emissions annually per stove, improve indoor air quality, and reduce household fuelwood expenditures by 50 percent.

13. Over the last decade, a number of organizations and social businesses have made notable progress in developing and disseminating cleaner cookstove technologies, particularly in rural areas of Honduras. Yet, despite these many advances, **the current market penetration of clean cookstoves is approximately 12 percent of the at-need population, thereby leaving an underserved market of nearly 1.2 million households** that cook with traditional woodstoves or open fires.

14. The expected results of the Project are to scale up the proper use and adoption of clean cookstoves in poor and low income households and MSMEs in Honduras. The following indicators will be used to track and measure the project's results: (i) 300 MSMEs offering and manufacturing products and services related to the clean cookstove value chain; (ii) US$ 2,000,000 of additional financing mobilized by the project through capital markets, carbon finance or other public or private non-reimbursable funds; (iii) at least 75,000 households adopting a clean cookstove and using the technology appropriately; (iv) 90 percent of certified MSMEs carrying out periodic after-sales and maintenance visits; and (v) 5,000 clean cookstoves installed by MSMEs outside of the project, representing expansion and sustainability of the market.

## Part III. Executive Summary for the SREP Subcommittee – Operation Expenses for Investment Implementation

| | |
|---|---|
| *Name of Project or Program* | **SREP Honduras**<br>Operation Expenses for Investment Implementation |
| *SREP amount requested* | **USD 512,000 (grant resources)** |
| *Country targeted* | Honduras |
| *Indicate if proposal is a Project or Program* | Public Sector Project. This corresponds to the portion allocated to the IDB in the IP for Operation Expenses for Investment Implementation. |

### Fit with SREP Honduras Investment Plan

15. The coordination activities carried by the Government of Honduras through its Climate Change Economic and Financial Management Unit (UGEFCC) within the Ministry of Finance (SEFIN) have until now been funded with the IP Preparation Grant (USD 375,000). However, these resources will run out by early 2014. Thus there is a need to ensure the continuity of the UGEFCC in order to finalize preparation of all the SREP components and supervise their implementation. An amount of USD 512,000 of SREP resources is requested for this purpose. This amount is included on Table 33 of the IP as "Operation Expenses for Investment Implementation". **See IDB TC Document for more details (pages 25 to 29).**

### 11. Consistency with Investment Criteria:

**Part I: Promoting Sustainable Business Models for Clean Cookstoves Dissemination**

16. The cook-stove subcomponent will finance the same activities described on the IP allocation table named Sustainable and efficient firewood use (USD 2 Million), and part of the activities Studies/technical designs/consultancies (USD 0.475 Million) and Capacity Building (USD 0.475 Million) as described on table 1 (pages 1 and 2 of Document). **More details on the activities to be co-financed by the SREP funds can be found in pages 10 to 17.**

**Part III: Operation Expenses for Investment Implementation**

17. The coordination activities carried by the Government of Honduras through its Climate Change Economic and Financial Management Unit (UGEFCC) within the Ministry of Finance (SEFIN) have until now been funded with the IP Preparation Grant (USD 375,000). However, these resources will run out by early 2014. Thus there is a need to ensure the continuity of the UGEFCC in order to finalize preparation of all the SREP components and supervise their implementation. An amount of USD 512,000 of SREP resources is requested for this purpose. This amount is included on Table 33 of the IP as "Operation Expenses for Investment Implementation". See IDB TC Document for more details (**pages 25 to 29**).

### 12. Stakeholder engagement:

**Parts I and III**

18. After the IP was approved the government of Honduras, the IDB and the IBRD worked together to prepare the clean cook-stove subcomponent of ERUS. A team of consultants was hired by IBRD in coordination with the Government and IDB in early 2013. The consultants carried out several workshops and other activities with the Government of Honduras and relevant stakeholders including representatives from multilateral development banks, NGOs, and cooperation agencies. **See page 16 for coordination mechanisms established for Part 1.**

13. **Gender considerations:**

**Parts I and III**

19. Several gender considerations were incorporated in the project design as women in households are expected to be those most positively affected by the project. Several of the projects direct and indirect indicators were disaggregated by sex and will be assessed by monitoring and evaluation activities. In addition, specific consultancies were identified to continue deepening the analysis in this respect **(see pages 10 to 19**).

14. **Indicators and Targets (consistent with results framework):**

| **Core Indicator** | **Target** |
|---|---|
| (a) Reduction monthly expenses for firewood purchase rural and urban (Baseline: US$219): | 115 |
| (b) New access to efficient cook stoves (# additional cookstoves) | 75,000 |
| (c) Cumulative Tons of CO2e emissions avoided – efficient cook stoves for first 5 years of implementation | 199,093 |
| *Development Indicator(s):*<br><br>d) Time dedicated to the collection of firewood for use in cook stoves by i) women, and ii) men<br>e) Reduced deforestation pressure, as a result of a reduction of woody biomass consumed during cooking (Tons of woody biomass per year per house)[1] | <br><br>TBD at early implementation<br><br>TBD at early implementation |

15. **Co-Financing:**

| | *Amount (in USD million):* | *Type of contribution:* |
|---|---|---|
| **Part I. Promoting Sustainable Business Models for Clean Cookstoves Dissemination** | | |
| • MDB | 2,189,620 | Grant |
| • Private Sector (Fundación Vida) | 544,441 | 50% in-kind;50% cash. |
| • Others (Microfinance Institutions) | 300,000 | Loans |
| **Part III. Operation Expenses for Investment Implementation** | | |
| • Government | 80,000 | In-kind |
| **Co-Financing Total:** | 3,114,061 | |

16. Expected Board/MDB Management approval date:

**Part I** – November 6th

**Part III** – November 15th

[1] This indicator will be derived from the Cumulative Tons of CO2e emissions avoided indicator.

# SREP Honduras
# Sustainable Rural Energization (ERUS), Parts I & III

## IDB Private and Public Sector SREP Proposals for Submission to the SREP Sub-Committee

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## LIST OF ABBREVIATIONS

| | |
|---|---|
| AHDESA | *Asociación Hondureña para el Desarrollo* (Honduran Association for Development) |
| ADERC | *Apoyo al Desarrollo de las Energías Renovables en Conexión con la Red* (Grid-connected Renewable Energy Development Support) |
| AOP | Annual Operation Plan |
| CABEI | Central American Development Bank |
| CEPAL | Comisión Económica para América Latina y el Caribe (United Nations Economic Commission for Latin America and the Caribbean) |
| CIFs | Climate Investment Funds |
| CO2 | Carbon Dioxide |
| DGCP | *Dirección General de Crédito Público* (General Directorate of Public Credit, SEFIN) |
| DGIP | *Dirección General de Inversión Pública* (General Directorate of Public Investment, SEFIN) |
| DNA | Diagnostic of Executing Agency Needs |
| EnDev | Energizing Development Program |
| ENEE | *Empresa Nacional de Energía Eléctrica* (National Electricity Company) |
| ERUS | *Energización Rural Sostenible* (Sustainable Rural Energization) |
| FIN | IDB's Finance Department |
| FOMPIER | *Fortalecimiento del Marco de Políticas e Institucional para Energías Renovables* (Strengthening the Renewable Energy Policy and Institutional Framework) |
| FPA | Financial Procedures Agreement |
| GACC | Global Alliance on Clean Cookstoves |
| GCI-9 | Ninth General Capital Increase in Resources for the IDB |
| GIZ | *Deutsche Gesellschaft für Internationale Zusammenarbeit* (German Association for International Cooperation) |
| GHG | Greenhouse Gas |
| GoH | Government of Honduras |
| GPS | Global Positioning System |
| IDB | Inter-American Development Bank |
| IBRD | International Bank for Reconstruction and Development |
| IP | Investment Plan |
| LAC | Latin America and the Caribbean |
| LEG | IDB's Legal Department |
| MIF | Multilateral Investment Fund |
| MSMEs | Micro, Small and Medium Enterprises |
| NSG | Non-sovereign guarantee |
| NGOs | Non-governmental organizations |
| OP | Operating Regulations |
| ORP/GCM | IDB's Outreach and Partnerships Office |
| PEU | Project Execution Unit |
| PSC | Project Steering Committee |
| PV | Solar Photovoltaic |
| SCF | Structured Corporate Finance Department of IDB |
| SEFIN | *Secretaría de Estado en el Despacho de Finanzas* (Ministry of Finance) |
| SERNA | *Secretaría de Recursos Naturales y Ambiente* (Ministry of Natural Resources and Environment) |
| SICA | *Sistema de Integración Centroamericana* (Central American Organization for Integration) |
| SMEs | small and medium-sized enterprises |
| SREP | Program on Scaling-Up Renewable Energy in Low-Income Countries |
| SPD | IDB Office for Strategic Planning and Development Effectiveness |
| TC | technical cooperation |
| UAP | *Unidad de Administración de Proyectos* (Project Management Unit, SEFIN) |
| UGEFCC | *Unidad de Gestión Económica y Financiera de Cambio Climático* (Unit for the Mobilization of Economic and Financial Resources for Climate Change, SEFIN) |
| UNDP | United Nations Development Program |

| | |
|---|---|
| USD | United States Dollars |
| WB | World Bank |

## MIF DONORS MEMORANDUM

### PROJECT SUMMARY

### PROMOTING SUSTAINABLE BUSINESS MODELS FOR CLEAN COOKSTOVE DISSEMINATION

### (HO-M1038, HO-G1004)

More than half of Honduran households cook with fuelwood on rudimentary cookstoves that are highly inefficient, unhealthy and unsafe. They can have major health impacts on users and stay-at-home inhabitants, in the form of acute and chronic respiratory illness and disease from the hazardous indoor air pollutants they emit. Global estimates suggest that as many as 4 million people die pre-maturely every year from exposure to indoor air pollution, which are predominately women and children.

The use of fuelwood on traditional cookstoves not only impacts the health and well-being of poor families but it also impacts the natural environment as a source of GHG emissions. Researchers have estimated that potential greenhouse gas emission reductions could exceed 1 billion tons of carbon dioxide equivalent emission per year.

Over the last decade, a number of organizations and social businesses have made notable progress in developing and disseminating cleaner cookstove technologies, particularly in rural areas. Some of these technologies have shown to be a proven means of addressing the myriad problems tied to the use of fuelwood on traditional wood-burning stoves. Despite major advances, the current market penetration is low, with as many as 1.2 million families in Honduras that still cook with traditional woodstoves or open fires.

In partnership with the Government of Honduras under the Scaling Up Renewable Energy Program (SREP), the MIF seeks to develop a national level program to promote sustainable business models for clean cookstove distribution in Honduras. The project will support pioneering efforts to pilot new models that will enhance the long-term sustainability of the sector for the first time in the region. Innovations that will be introduced through this project include the use of cookstoves standards for quality control, the incorporation of microloans for cookstoves, and the consolidation of the cookstove value chain. Through these efforts, the project will coordinate a multi-stakeholder initiative that will provide market-oriented solutions to increase access to clean cookstoves for at least 75,000 additional poor and low income households and contribute to significant reductions in GHG emissions.

This will be the first clean cookstoves project in the world to receive climate finance through the Climate Investment Funds (CIFs). The project expects to have a transformational impact for Honduras and drive important learning that will be relevant to other LAC countries and SREP and CIF pilot countries. It will also form an important global benchmark for the efforts of the Global Alliance on Clean Cookstoves (GACC).

## ANNEXES

| Included Annexes | |
|---|---|
| ANNEX I | Logical Framework (Results and Risks Matrix) |
| ANNEX II | Budget Summary (in Spanish) |
| ANNEX III | Quality for Effectiveness in Development (QED) |
| **Annexes Available Upon Request** | |
| ANNEX IV | Detailed Budget |
| ANNEX V | Preliminary List of Milestones |
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| ANNEX VIII | Procurement and Contracting Plan |
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**PROJECT INFORMATION**

**PROMOTING SUSTAINABLE BUSINESS MODELS FOR CLEAN COOKSTOVE DISSEMINATION**

**(HO-M1038, HO-G1004)**

| | | | |
|---|---|---|---|
| **Country and Geographic Location:** | Honduras | | |
| **Executing Agency:** | Fundación Hondureña de Ambiente y Desarrollo Vida ("Fundación Vida") | | |
| **Access Area:** | Access to Basic Services and Green Growth | | |
| **Agenda:** | Access to Clean and Efficient Energy | | |
| **Coordination with Other Donors/Bank Operations:** | The project will coordinate closely with the World Bank and with other windows of the IDB Group on the overarching implementation of the project under the SREP. In addition, the project expects to derive synergies and co-finance activities with the Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ), which is exploring the opportunity to support cookstoves in Honduras through the ENDEV program[1]. The project was designed in close coordination and partnership with GIZ. | | |
| **Direct Beneficiaries:** | • 75,000 poor and low income households. (Women in these households are expected to be those most positively affected by the project.)<br>• 300 small and micro enterprises<br>• The environment (reductions in GHG emissions) | | |
| **Indirect Beneficiaries:** | • women in poor and low income households<br>• Children in poor and low income households and other household members affected by indoor air pollution, disaggregated by sex | | |
| **Financing:** | MIF Technical Cooperation (HO-M1038): | US$ 2,189,620 | 40% |
| | Counterpart: | US$ 844,441 | 15% |
| | *Co-financing from:* | | |

[1] Energizing Development - EnDev - is an impact-oriented initiative between the Netherlands, Germany, Norway, Australia, the United Kingdom and Switzerland. EnDev promotes the supply of modern energy technologies to households and small-scale businesses. The Partnership cooperates with 24 countries in Africa, Latin America and Asia. Since its start in 2005, EnDev has taken a leading role in promoting access to sustainable energy for all. The Deutsche Gesellschaft für Internationale Zusammenarbeit (GIZ) acts as lead agency for the implementation of the Energizing Development Program

| | | | |
|---|---|---|---|
| | Strategic Climate Fund: non-reimbursable investment operation (HO-G1004)[2] | US$ 2,435,000 | 45% |
| | **TOTAL PROJECT BUDGET:** | US$ 5,469,061 | 100% |
| **Execution and Disbursement Period:** | 60 months of execution and 64 months of disbursement. | | |
| **Special Contractual Conditions:** | Conditions prior to the second disbursement of MIF and SREP resources will be: (i) the presentation of cooperation agreements with sub-executing agencies and bylaws and supervision structure of the financing mechanisms under component 3 of this project to the MIF Office in Honduras; and (ii) the approval of the final governance structure and steering committee guidelines which will be approved at the first steering committee meeting. An initial disbursement of up to $100,000 will be issued upon signature of the agreement and before complying with conditions prior to hire an expert project coordinator and other key members of the project execution unit to carry out a workshop to launch the project, to finance technical workshops for the development of a griddle stove testing protocol and the subsequent testing and evaluation of the cookstove models and to finance the collection of additional baseline data. | | |
| **Environmental and Social Impact Review:** | This operation was screened and classified as required by the IDB's safeguard policy (OP-703) on September 13, 2013. Given the limited impacts and risks, the proposed category for the project is C. | | |
| **Unit with Disbursement Responsibility:** | IDB Representation in Honduras | | |

[2] The IDB is an Implementing Entity of the Strategic Climate Fund, as outlined in GN-2604. Paragraphs 3.13-3.16 of GN-2604 define the principles of use of SCF funds for NSG operations; Paragraph 3.20 of GN-2604 expressly indicates that all NSG windows of IDB Group will have access to SCF resources. Document GN-2674 and Resolution DE-9/11, as amended by Resolution DE-123/12, authorize the MIF Donors Committee to approve on behalf of the IDB the use of SCF resources administered by the IDB.

## 1. BACKGROUND AND JUSTIFICATION

### A. Diagnosis of the Problem to be addressed by the Project

1.1. As countries across the globe continue to make major advances in providing universal access to electricity, a second energy divide remains in which nearly half the world's population relies on firewood, dung and other solid fuels to meet basic energy needs for cooking, heating and boiling drinking water. These tasks are almost entirely carried out using rudimentary cooking devices or open fires that are inefficient, unhealthy and unsafe.

1.2. Daily exposure to toxic smoke from traditional cooking practices is one of the world's most potent but least known killers. The smoke generated by burning biomass fuels and exposure to indoor air pollution lead to as many as 4 million premature deaths each year from chronic and acute respiratory illness and disease.[3] Those most affected are stay-at-home-inhabitants, which are predominately women and children.

1.3. The predominant use traditional biomass stoves also place major stresses on the natural environment in the form deforestation and greenhouse gas emissions. Incomplete fuelwood combustion releases methane gas, nitrous oxide, and aerosols, such as black carbon. When fuelwood is harvested unsustainably, which it oftentimes is, it prevents biomass regrowth to sequester carbon dioxide.

1.4. With a growing evidence base and level awareness of these problems, the global community is moving on multiple fronts. In 2010 a diverse group of governments, multilaterals, philanthropic organizations, NGOs, academic institutions and the private sector launched a Global Alliance on Clean Cookstoves (GACC). Across the LAC region, countries' interest in addressing this challenge is growing: the Central American Integration System (Sistema de la Integracion Centroamericana or SICA) countries have set a regional goal to reduce 10% of firewood consumption for cooking by using more efficient stoves in one million rural households[4] by 2020.

1.5. The Honduran government has requested financing from the Scaling Up Renewable Energy Program (SREP) to transform the sector for domestic cooking fuel toward a more sustainable and low carbon pathway through primarily private sector initiatives. Fuelwood is the country's largest energy source, representing 46 percent of final energy consumption and 86 percent of total domestic energy use.[5] National survey data on domestic fuelwood consumption suggest that 47 percent of Honduran households cook exclusively with fuelwood and another 22 percent cook with fuelwood in combination with other energy sources, such as liquid petroleum gas (LPG) and electricity.[6]

[3] A comparative risk assessment of burden of disease and injury attributable to 67 risk factors and risk factor clusters in 21 regions, 1990—2010: a systematic analysis for the Global Burden of Disease Study 2010. The Lancet, Volume 380, Issue 9859, Pages 2224 - 2260, 15 December 2012

[4] Central American Sustainable Energy Strategy 2020

[5] Balance Energético Nacional, Honduras, 2010. DGE-SERNA

[6] CEPAL 2011, Encuesta Nacional de consumo de Leña en Hogares y Pequeña Industria en Honduras. Escuela Agrícola Panamericana, El Zamorano.

1.6. Fuelwood is not free and must either be collected or purchased, which can exact economic burdens on poor households. Among fuelwood users in Honduras, 26 percent purchase fuelwood. The estimated annual cost of purchasing fuelwood for an urban household is approximately US$ 217 per household per year. In addition, many small businesses, often owned by women, such as tortilla makers, bakeries, small restaurants and food stands use fuel wood on inefficient stoves. For example, there are as many as 18,000 micro and small tortilla maker businesses nationwide, of which 5,000 to 6,000 are in Tegucigalpa, that use inefficient wood-burning stoves.[7]

1.7. **Clean cookstove** technologies are a proven means of addressing the myriad problems tied to the use of fuelwood on traditional wood-burning stoves and have become increasingly accepted by Honduran families. Through more efficient use of non-renewable biomass, stoves can reduce 1.5 to 2.5 tons of CO2-equivalent emissions annually per stove, improve indoor air quality, and reduce household fuelwood expenditures by 50 percent[8]. Improved wood-burning cookstoves[9] have shown to be the more cost effective and culturally accepted cooking solution for rural populations over other alternative cooking fuels, such as LPG, electricity, biogas, pellets and briquettes. Studies have found that the substitution of tradition wood-burning stoves to improved cookstoves in households have substantially greater benefits than costs, particularly when timing saving benefits are taken into account.[10] In Honduras, commercial cooking fuels are expensive and often not available in rural areas, with the price of LPG reaching US$1.06 per kilogram in March 2013. The price of LPG as the primary alternative clean cooking fuel would need to be substantially reduced and rural wages substantially increased for its benefits to exceed its costs.

1.8. Over the last decade, a number of organizations and social businesses have made notable progress in developing and disseminating cleaner cookstove technologies, particularly in rural areas of Honduras. Yet, despite these many advances, the current market penetration of clean cookstoves is approximately 10 percent of the at-need population, thereby leaving an underserved market of nearly 1.1 million households that cook with traditional woodstoves or open fires.[11] The limited market uptake of clean cookstoves is explained by several key factors.

1.9. First, there are low levels of awareness of the economic impacts and health risks of traditional cookstoves and the availability of improved cookstove technology. While a number of local organizations have greatly increased awareness and understanding of the acute and chronic health impacts associated with traditional wood burning stoves, general population awareness remains low, contributing to weak demand.

1.10. Second, the price of improved cookstove technologies is too high for many families. Of Honduras' 7 million inhabitants, 67 percent of the population lives below the poverty

[7] Miranda, Rogerio. "Ecological stoves in Honduras: Assessment of the current market situation." Draft report. March 2013

[8] Miranda, 2013

[9] The primary clean cookstove model (the Justa) costs between US$80 to US$100 and is made of primarily locally purchased materials and is built in-situ.

[10] Benefits and costs of rural HAP control in Rural Honduras. Source: Country Environmental Analysis (CEA) for Honduras. World Bank, 2007.

[11] Miranda, 2013

line and 43 percent live in extreme poverty.[12] The limited purchasing power of users to acquire an improved cookstove is a major market limitation. Innovative sources of finance, such carbon finance[13], microloans, and cost-share schemes can help lower the cost hurdles for large segments of the market. Microfinance products are currently unavailable for the cookstoves market and only one organization has been able to access to the carbon market, leaving much of the market without access to this source of revenue.

1.11. Third, clean cookstove products and services are not available to a large part of the market. Access to clean cookstove technology is still mostly restricted to the territorial coverage of a few NGOs and projects promoting cookstoves. Even when clean cookstove technologies are available, there is typically limited presence of after sales services, follow up support and locally available replacement parts.

1.12. Fourth, there is a significant amount of variation in the quality and performance of clean cookstoves. Often stoves are promoted as clean stoves, but are in fact equally as dirty and inefficient as traditional stoves. In addition, many clean cookstoves in Honduras are built *in-situ*, thereby leaving significant room for human error in the construction and maintenance process. This in turn undermines market actors that are building or selling quality stoves and lowers general confidence in the technology.

## B. Project Beneficiaries

1.13. The project's beneficiaries will include: (a) poor and low income households in urban and rural areas that cook exclusively with fuelwood on traditional woodstoves and open fires; (b) the inhabitants of these households that do most of the cooking or are most exposed to indoor air pollution, which are predominantly women and children; (c) micro and small businesses that will provide installation of improved cookstoves and after-sales services; (d) MSMEs in urban and rural areas that provide products and services along the stove components value chain (manufacture and distribution); and (e) the environment, which will benefit from avoided greenhouse gas emissions.

## C. Contribution to MIF Mandate, Access Framework and IDB Strategy

1.14. Climatescope Score.[14] Honduras ranked 14th among 26 Latin American and Caribbean countries in the Climatescope index, 2013 edition. The proposed project, along with the broader SREP program, expects to contribute to improving Honduras' Climatescope score through mobilizing new clean energy investment and climate finance, including green microfinance, enhancing new opportunities for low-carbon businesses and clean energy value chains, and expanding greenhouse gas management activities and the volume of emissions reductions from carbon credits issued.

[12] CEPAL: Comisión Económica para América Latina y el Caribe: División de Estadísticas. Unidad de Estadísticas Sociales, sobre la base de tabulaciones especiales de las encuestas de hogares de los respectivos países.

[13] In 2012, voluntary offset buyers channeled $80 million to offsets from projects that distribute clean cookstoves and water filtration devices. The average price for offsets from clean cookstove projects was $11.3/tCO2e. *Source: Voluntary Carbon Markets 2013.* A Report by Forest Trends' Ecosystem Marketplace & Bloomberg New Energy Finance, June 2013. Online: http://www.forest-trends.org/vcm2013.php

[14] http://www5.iadb.org/mif/climatescope/2012/contact.html

1.15. Poverty Reduction: The project will directly support access to improved cookstoves for poor and low income households. The direct intended impact on poverty reduction stems from reduced expenditures from fuelwood purchases and time dedicated to fuelwood collection, particularly in rural areas. Reduced household air pollution will improve health outcomes and reduce health expenditures as well as improve quality of life among poor households.

1.16. Private Sector Development: The program will support market-oriented solutions for expanding access to and use of improved cookstoves, create jobs and new entrepreneurship opportunities in the cookstove value chain, and facilitate the development of micro finance schemes and access climate funds.

1.17. Link to Agenda: The project contributes to the MIF's Clean & Efficient Energy agenda by scaling up market-based solutions for dissemination of cleaner, more energy-efficient cookstoves. It will be the first MIF project that supports the large-scale promotion and adoption of clean cooking technology, which will inform future MIF efforts and contribution to the Clean Energy agenda goals of households with clean cooking technology and significant reductions in GHG emissions.

1.18. Climate Investment Funds.[15] The proposed project will be implemented with co-financing from the Climate Investment Funds (CIFs). The CIFs help developing countries pilot low-emissions and climate-resilient development and are channeled through MDBs, including the IDB/MIF. One program under the CIFs is the Scaling-Up Renewable Energy in Low Income Countries Program (SREP). The SREP seeks to create new economic opportunities and increase energy access through the production and use of renewable energy. SREP promotes both public and private sector actions to remove barriers that might otherwise inhibit scaled-up private sector investments. In Latin America and the Caribbean, Honduras was selected as the pilot country for the SREP.

1.19. For the proposed SREP program in Honduras, a Country Investment Plan (IP) was approved in November 2011, which included three components: (1) Regulatory framework improvements, (2) Private Investment in Grid-Connected Renewable Energy - "ADERC", and (3) Rural Energy Access and Electrification. The proposed project will be implemented under the third component of the SREP Investment Plan.

1.20. Collaboration with the IDB Group. The proposed project has been developed as part of a multi-departmental effort at the IDB including CCS, ENE, SCF and MIF. The proposed project will contribute to the following priorities and objectives of the IDB Country Strategy for Honduras: (i) increased financial sustainability and operational capacity of the electric power sector; (ii) health and (iii) social protection. The project will contribute to these objectives by promoting more sustainable use of biomass as a residential fuel source and to reduce indoor air pollution and it related health outcomes for poor and low income populations. The Energy Division and the Climate

[15] The IDB is an Implementing Entity of the Strategic Climate Fund, as outlined in GN-2604. Paragraphs 3.13-3.16 of GN-2604 define the principles of use of SCF funds for NSG operations; Paragraph 3.20 of GN-2604 expressly indicates that all NSG windows of IDB Group will have access to SCF resources. Document GN-2674 and Resolution DE-9/11, as amended by Resolution DE-123/12, authorize the MIF Donors Committee to approve on behalf of the IDB the use of SCF resources administered by the IDB.

Change and Sustainability Division of the IDB are supporting a Technical Cooperation (HO-T1178) for the first component of the SREP program, FOMPIER, to support a long-term energy policy to increase the share of renewable energy through legislation and technical standards for each Renewable Energy Technology (RET), incentive models (including tariffs) for the effective development of each RET, guidelines for renewable installations, and definition of intra and inter-agency responsibilities, while building capacity in order to improve the integration of renewables in the energy sector. The proposed project will seek to coordinate and derive synergies whenever possible with the activities to be financed under HO-T1178. The project will also seek to derive synergies with other Bank-financed programs, such as the conditional cash transfer program called Bono 10,000. The project will also coordinate closely with the World Bank on the implementation of the rural electrification activities of the EURUS component of the Honduras SREP program and their efforts to working regionally in Central America on promoting the use of clean cookstoves.

## 2. PROJECT DESCRIPTION

### A. Objectives

2.1. The intended impacts of the project include reductions in health risks associated with indoor air quality in poor and low-income households in Honduras, time and cost savings in household fuel use, and reductions in greenhouse gas emissions. The intended result is to scale up the proper use and adoption of clean cookstoves in poor and low income households in Honduras through sustainable, market-based solutions.

2.2. The project will aim to have a transformative impact on the market for clean cookstoves by enabling the market conditions for new business models to flourish and develop and by leveraging and strengthening the existing private sector capacity in Honduras.

### B. Description of Model/Solution/Intervention

2.3. The proposed intervention model will focus on building enabling market conditions and strengthening a network of rural enterprises to promote, build, distribute, maintain and supervise the installation and proper use of clean cookstoves. Key dynamics of this model include targeted efforts to: i) improve cookstove quality, from component durability to stove model performance and consistency through a combination of standards and rigorous monitoring and supervision, ii) enhance the demand through aggressive outreach and public promotion campaigns, iii) improve affordability through a combination of direct incentives, micro-loans, and payments for environmental services, and iv) increase access to the clean cookstoves technologies and services by training a network of stove micro-entrepreneurs to promote, install and provide after sales customer support. The proposed model attempts to incorporate and draw upon best practices from existing clean cookstoves initiatives in Honduras and other countries with the aim of transforming the sector toward a more sustainable and dynamic market for the sale and distribution of clean cooking technologies.

### C. Components

**Component I: Improving clean cookstove quality and performance. (MIF: US$608,525; Counterpart: US$67,425).**

2.4. The objective of this component is to ensure that all "clean" cookstoves meet minimum and standardized criteria in terms of fuel use efficiency, indoor air quality, emissions of particulate matter and carbon monoxide, durability and safety. The activities and the products of this component are the following: (i) development of testing protocols for the griddle stove under the framework of the ISO cookstove performance guidelines; (ii) evaluation of clean cookstove models and performance; (iii) definition of specific performance limits that cookstove technologies will need to achieve in order to be supported under the project; (v) certification of clean cookstove technologies; (vi) development of technical specifications for evaluation and testing of quality of stove component parts; (vii) accreditation of clean cookstove implementing organizations; and (viii) design and implementation of a monitoring and supervision of scheme.

2.5. Specifically, the project will develop and implement a certification scheme to help strengthen confidence in the technology in terms of quality, performance and durability. All cookstove models will be certified through the Clean Cookstove Testing Center at the University of Zamorano, which is one of the regional testing centers supported by the Global Alliance for Clean Cookstoves (GACC). The parameter limits and testing protocols to be used for the certification process in Honduras will be developed for the Honduran market in consultation with local and international stakeholders and following the ISO framework for clean cookstoves[16]. In addition, the project will also work with the National Autonomous University of Honduras (UNAH) to develop a mechanism to ensure consistency in the quality of materials used (metal top, chimney and combustion chamber), which can be sold in local stores to stove technicians and stove owners for new cookstoves or replacement parts for damaged stove components.

**Component II: Strengthening clean cookstove enterprises and the supply chain. (MIF: US$137,000); Counterpart: US$5,500).**

2.6. The objective of this component is to increase access to clean cookstove technologies and related services through expanding and strengthening a network of clean cookstove microenterprises. The project will develop and implement a technical training program for stove microenterprises and technicians through the National Institute of Professional Training (INFOP). The stove microenterprises will be trained on stove installation, training of end-users, stove repairs, follow up services, sales and promotion, and proper monitoring and documentation for carbon credits as needed. The training program for this project will train the stove microenterprises on all clean cookstove technologies, including in-situ built stoves, such as the Justa, along with the growing number of pre-fabricated cookstoves that are being offered in the market. The training program will also provide enterprises with on-going support related to business skills development and professional growth as well as relationship management with local financial institutions and NGOs looking to promote clean cookstoves or other

[16] ISO, IWA 11:2012, *Guidelines for evaluating cookstove performance*

clean energy products. The clean cookstove microenterprises will be selected based on a core set of criteria, with a preference for enterprises within close geographic proximity to the beneficiary communities of the project as means of promoting local employment and permanent capacity on stoves within the communities. The project will also emphasize and prioritize opportunities for women-owned and run businesses.

2.7. The activities and products of this component are the following: (i) definition of content and design of training modules; (ii) selection of stove technicians to be trained; (iii) implementation of trainings and certification of stove technicians in two modules of 40 hours each; (v) training workshops on professional and business development; (vi) awareness raising of local shops in rural areas and hardware stores for supplying spare parts; (vii) technical assistance for linking rural shops and hardware manufacturers of spare parts to stove MSMEs; and (iv) the creation of an association cookstove enterprises and technicians and business plan for the association.

**Component III: Increasing access to cookstove finance. (MIF: US$259,100; SREP: 2,435,000; Counterpart: US$321,000).**

2.8. The objective of this component is to close the financial gap between the price and affordability of clean cookstoves for poor and low income fuelwood users. To close this gap, the project will promote three financing modalities::

a) Cost-share incentives. To incentivize potential beneficiaries to purchase clean cookstoves, the project will offer an initial cost-share incentive for the first 50,000 units sold under the project to enhance affordability for poor households. Cost-share incentives will be channeled through accredited stove implementing organizations and will be targeted at poor households. No stoves will be given away. The stove implementing organizations must be local entities (NGOs or social businesses) with a proven experience and track record in the deployment of quality clean cookstoves and the capacity to administer international cooperation resources. Each organization or business interested in becoming a stove implementing organization will submit a formal request to Fundación Vida, for which they will receive temporary accreditation against several key parameters. In addition, the project will offer a result-based financing mechanism to stove micro enterprises and implementing organizations, which will be linked to proper stove use and performance 12 months after installation through a sample of beneficiaries.

b) Payments for environmental services. Payments for environmental services, such as carbon credit revenues, can help ensure the financial sustainability and affordability of clean cookstoves. Cash flows from the sale of carbon credits can be reinvested into the project to recapitalize the cost-share incentive scheme or to support other on-going fixed costs of the project, such as training, promotion, and certification. Currently, there is only one organization in Honduras that is able to sell carbon offsets from cookstoves. The project will develop carbon finance scheme using the *Gold Standard* certification to expand access to this source of income for other stove implementers, which will initially focus on the

voluntary carbon market[17]. The carbon finance scheme will be structured as an open platform, in which any organization can participate as long as they meet the minimum criteria required by the program. Revenues from the sale of carbon credits for stoves financed by the project must be incorporated back into the project to be used explicitly for activities related to expanding access to cookstoves. However, organizations that wish finance additional stoves outside the project with their own resources will be able to retain a larger share of the revenues from carbon credits as a way to incentivize the mobilization of additional funding. The project will select a specialized, professional organization to support the development of the carbon finance mechanism to through international competitive selection process and will take into account key factors, such as cost-benefit, carbon market volatility and capacity limitations. The selected proposal should be submitted to the Project Steering Committee for feedback and submitted to the MIF office before final contracting and selection.

c) Loan products for the clean cookstoves sector. As part of the project's goal of transforming the cookstoves sector toward a more sustainable and dynamic market environment, this component will develop a pilot activity to facilitate the development of loan products for the clean cookstoves. SREP resources will be used to capitalize a pilot revolving mechanism that will be managed by one or two second-tier financial institutions in Honduras that provide direct lending, advisory services and technical assistance to large network of 1st tier financial intermediaries, including microfinance institutions, cooperatives and community-based savings and credit associations. SREP resources will be blended 1:1 on concessional terms with local bank financing to help catalyze commercially-oriented financing into the clean cookstoves sector, while ensuring a sufficient margin for intermediation to cover administration costs of the mechanism and to avoid distorting the financial market. Fundación Vida will assign dedicated personnel that support and supervise the implementation the revolving mechanism and review periodic reports that will be submitted detailing the status of portfolio.

2.9. The activities and products of this component are the following: (i) definition and publication of accreditation criteria of stove implementing organizations and operational guidelines of cost-share scheme; (ii) accreditation of stove implementing organizations; (iii) trainings of stove implementing organizations on project requirements; (iv) development of credit methodology and monitoring and supervision mechanism; (vii) supervision of revolving fund mechanisms; (viii) design governance structure and step up of carbon finance mechanism, including bylaws regarding reflows and use of proceeds; (ix) development, registration and validation of carbon finance scheme; and (xii) implementation of stove projects.

[17] In 2012, voluntary offset buyers channeled $80 million to offsets from projects that distribute clean cookstoves and water filtration devices. The average price for offsets from clean cookstove projects was $11.3/tCO2e. *Source: Voluntary Carbon Markets 2013.* A Report by Forest Trends' Ecosystem Marketplace & Bloomberg New Energy Finance, June 2013. Online: http://www.forest-trends.org/vcm2013.php

2.10. SREP non-reimbursable investment resources will be used to capitalize the cost-share scheme and the revolving loan mechanism. MIF technical cooperation resources will be used to support capacity building of local actors and the set up and supervision of the financing mechanisms.

2.11. More information regarding the dynamics of these three financing modalities is available in Annex X of the technical files.

**Component IV: Enhancing demand through marketing, promotion and awareness raising. (MIF: US$229,400; Counterpart: US$29,500).**

2.12. The objective of this component is to strengthen demand by financing the design and implementation of an aggressive awareness and social marketing campaign, targeting men and women in rural and urban areas. The activities and products of this component are the following: (i) design and implementation of a communications and promotion strategy; (ii) design, production and dissemination of communication and social marketing products; (iii) awareness and dissemination events; (iv) implementation of a national awareness raising multi-media campaign. The national awareness campaigns will work through mass media (TV and radio) aimed at regions of the country where the project will work as well as the design specific social marketing strategies for project implementers, local organizations and stove microenterprises. The campaigns will be designed explicit gender perspective.

**Component V: Knowledge and Dissemination Platform. (MIF US$275,000; Counterpart US$73,000).**

2.13. The objective of this component is to disseminate knowledge and information generated by the project in order to transform the perceptions regarding the environmental and health benefits of clean cookstoves and the corresponding business opportunities. The primary knowledge gap that this project will fill will be around finding the optimal combination of distribution channels and finance to expand cook stove use. The key audiences include: (i) other member governments of SICA; (ii) other LAC governments looking to promote clean cookstoves; (iii) NGOs, cooperatives, banks and entrepreneurs looking to participate in cookstove value chain; (iv) members of the Global Alliance on Clean Cookstoves, (v) other pilot countries of SREP and CIFs and (vi) other donors. The *main knowledge sharing products* will include case studies on key innovative aspects of the project model, including construction of the cookstoves value chain, incorporation of the microfinance sector, and the application of standards to improve quality control. All training materials, technical studies and evaluations and knowledge materials will be published for public use. In addition, the project expects to conduct an impact evaluation, which will serve as an important knowledge input on clean cookstoves and a tool to influence key audiences.

2.14. The activities and products of this component are the following: (i) analyses and development of stove designs for indigenous and afro-descendent communities and the incorporation of gender in the specific activities and training modules of the program; (ii) specialized workshops on topics such as refractory ceramics, chimney

design and multi-energy applications of cookstoves; (iii) implementation and design of a pilot activity on the sustainable commercial uses and harvesting of fuelwood; (iv) design and implementation of program website and online knowledge repository; (v) development of specific knowledge products, such as case studies and info-graphics; (vi) creation of technology innovation incentive fund; (vii) annual dissemination and knowledge sharing workshops and (viii) an international event in Honduras in collaboration with the Global Alliance on Clean Cookstoves.

## D. Project Governance and Execution Mechanism

2.15. **Project Execution Unit**. To facilitate implementation of the proposed project, a Project Execution Unit (PEU) will be set up in Fundación Vida's offices in Tegucigalpa, Honduras. The PEU will consist of a Project Coordinator, a Financial-Administrative Manager, an Accountant, and a part-time consultant on procurement issues, which will be hired by the project. In addition, the PEU will have a Permanent Technical Advisor, who be an international expert on cookstoves and dedicate approximately two weeks per year to advise on the strategic direction of the project. The PEU will be responsible for technical implementation, project management and all reporting and administration related to Bank/MIF and SREP requirements under the leadership of the Project Coordinator.

2.16. **Sub-project execution mechanisms.** The components of the project will contain activities that will be implemented by sub-executing agencies through a cooperation agreement between Fundación Vida and the local entity. The agreements will be compatible and aligned with the cooperation agreement between Fundación Vida and the Bank and Bank policies. This approach is consistent with sub execution mechanisms used in other MIF projects.

2.17. **Project Steering Committee.** It is planned that a Project Steering Committee (PSC) will be established to advise on the strategic direction of the Project and strengthen the Project's synergies with concurrent policy developments and national initiatives. The Steering Committee will also serve to ensure project alignment and synergies with the broader implementation of the SREP program. The PSC will be comprised of at least the MIF/IDB, World Bank, the Ministry of Finance (SEFIN), University of Zamorano and Fundación Vida. In addition, it is expected the Steering Committee may include, on a permanent or temporary basis, additional members representing other public sector agencies, local cookstove organizations, donors, universities, companies, and representatives from relevant scientific and technical fields related to clean cookstoves.. The final governance structure and steering committee guidelines must be approved by the steering committee members and submitted to the MIF Office in Honduras as conditions prior to the second disbursement of MIF and SREP funds for the project.

2.18. One year before the project ends, a **sustainability workshop** will be held with all key stakeholders to identify specific actions needed to ensure the continuity of the project's activities after the project funding has been expended.

## E. Sustainability

2.19. The project will achieve sustainability through the following mechanisms: (i) expanding access to carbon finance on the voluntary carbon market, which will potential provide an additional source of revenue to finance to continuation of the program; (ii) facilitating the participation of the local financial sector, which will bring more commercially-oriented and sustainable sources of financing; (iii) building the capacity of local market actors and building the necessary market infrastructure to ensure the long-term growth of the sector through private actors beyond the life of the project; (iv) building the capacity of local private and public institutions to provide on-going support to the sector; and (v) strategically disseminating knowledge and information to influence key actors and audiences in the public and private sector.

## F. Experience and Lessons Learned from MIF or other Institutions

2.20. Over the last decade, the clean cookstoves sector has evolved rapidly, with advances in technology, a growing body of scientific evidence on the health benefits of improved stoves, and a consolidation of lessons learned and best practices from across the globe through the Global Alliance on Clean Cookstoves (GACC), a process in which the MIF participated by serving on several working groups of the Alliance.

2.21. The MIF, along with other organizations, have acquired important knowledge and expertise from similar projects and initiatives that have informed the design of this project. The MIF has financed several projects that focus on promoting or scaling up markets for green technologies, such as solar PV, biogas digesters, energy efficiency, and cleaner production. The MIF also has a large portfolio of projects related to ISO standards and certification. In addition, a number of local organizations in Honduras have built up significant experience and specialized expertise related to improved cookstoves. These organizations include the University of Zamorano, ADHESA, and Proyecto Mirador, among others. To date, these organizations have been highly effective at promoting improved cookstoves that are adapted to local culture and cooking habits with high adoption rates. These institutions as well as others such as Fundación Vida have also piloted a number of distribution models with the potential to be refined, strengthened and scaled-up. As part of the preparation of this project the MIF, World Bank and the Government of Honduras commissioned a review of cookstoves initiatives to date in Honduras and existing best practices that have been incorporated into this project.

2.22. Some key lessons and best practices that have been incorporated into the design of this project include: (a) tailoring stove designs, marketing strategies, training delivery and content to the needs and customs of the primary user, which are typically women; (b) improved stove designs must reflect local cooking culture and cuisine; (c) not all improved stoves yield similar improvements in efficiency or have similar quality and should be evaluated and tested in the laboratory as well as the field; (d) considerable training and follow up for end-users is an important success factor for stove adoption

and must be factored into the cost of stoves; (e) small pilot projects can provide valuable lessons, but can rarely achieve the scale needed to create a sustainable market; and (f) incentives schemes should be designed based on results and a counterpart from the beneficiary (in-kind at least) to foster local appropriation and care of the technology.

## G. MIF Additionality

2.23. Non-Financial Additionality. MIF non-financial additionality includes the following: (i) image and convening power to support the coordination of a fragmented sector; (ii) technical expertise and skills complementing those of the executing agency in the design of the project, particularly around market and enterprise development; (iii) regional and global networks and vision for disseminating results, sharing knowledge, and replication; and (iv) ability to attract and leverage financial and non-financial support from additional donors and organizations.

2.24. Financial Additionality. MIF financial participation is critical for leveraging co-financing from the SREP and other potential donors.

## H. Project Results

2.25. The expected results of the Project are to scale up the proper use and adoption of clean cookstoves in poor and low income households and MSMEs in Honduras. The following indicators will be used to track and measure the project's results: (i) 300 MSMEs offering and manufacturing products and services related to the clean cookstove value chain; (ii) US$ 2,000,000 of additional financing mobilized by the project through capital markets, carbon finance or other public or private non-reimbursable funds; (iii) at least 75,000 households adopting a clean cookstove and using the technology appropriately; (iv) number of loans for clean cookstoves; (v) 90 percent of certified MSMEs carrying out periodic after-sales and maintenance visits; and (vi) 5,000 clean cookstoves installed by MSMEs outside of the project, representing expansion and sustainability of the market.

## I. Project Impact

2.26. The intended impacts of the project include reductions in health risks associated with air quality in poor and low-income households in Honduras and reductions in greenhouse gas emissions. In addition, the project expects to have an impact on the profitability and sales of business the offer products and services related to the clean cookstove value chain. The following indicators will be used to track the project's impact: (i) tons of avoided CO2-equivalent emissions[18]; (ii) number of people that state reductions in respiratory illnesses disaggregated by gender and age; (iii) average time savings on wood collection as result of clean cookstoves disaggregated by gender; (iv)

[18] The amount GHG emissions avoided will depend on number of stoves installed, fraction of non-renewable biomass harvested for fuel wood, household consumption of fuelwood. Based on calculations in other cookstove projects, the project expects that each cookstove will reduce between 1.5 to 2.5 tons of CO-equivalent emissions per year.

reductions in average monthly expenditures on cooking fuel for households and businesses that purchase fuelwood; (v) Number of MSMEs showing increased profits; (vi) number of households with improved indoor air quality; and (vii) Rate of attrition of certified MSMEs to track business sustainability over time.

## J. Systemic Impact

2.27. This project is uniquely suited to create systemic impact and support the long-term transformation of the market. First, the project will introduce a number of key innovations into Honduras, which will be "firsts" in the region. These include the incorporation of the first microloan mechanism for the cookstoves sector in LAC, development of a model to consolidate the cookstove value chain, creation of technology innovation incentive mechanism, creation of a clean cookstove industry association and the introduction and testing of cookstove standards for quality control in the sector. Second, the project will also facilitate greater public-private partnership and coordination on this issue of clean cookstoves in Honduras, strengthen key public and private institutions, and support the participation of new market actors, such local financial intermediaries. Third, the innovations and learning generated from this project will form an important global benchmark for the efforts of the Global Alliance on Clean Cookstoves, which is undertaking international coordination of cookstove actors. Through strategic dissemination efforts through the Alliance and the SREP platform, the project will be able to influence future efforts to promote clean cookstoves by neighboring Central American and other fuelwood dependent countries around the globe.

# 3. MONITORING AND EVALUATION STRATEGY

3.1. Baseline: In the first year of implementation, the project will establish a monitoring and evaluation system that will collect baseline data from the beneficiary households. The MIF, World Bank and Government of Honduras commissioned an initial market assessment with SREP preparation funds to collect baseline data. Any remaining gaps in baseline information will be collected within the first 6 months of the project.

3.2. The project will partner with local NGOs and stove enterprises to collect baseline data at the household level. This will require that approximately 50 percent of the households in beneficiary communities are visited. For each household adopting the new technology, a questionnaire will be filed to collect baseline information and will include information on socio-economic variables, characteristics of present use, as well as other variables deemed important as baseline information. For each household adopting a clean cookstove, the project will take a photo of the old and new stoves along with the GPS coordinates of the beneficiary household.

3.3. Monitoring: The program will establish a monitoring and evaluation system to track, monitor and report project results and impact. As the project will be implemented under the SREP program, additional resources will be made available to track and monitor project results. The executing agency will establish a core unit for monitoring and will define a monitoring methodology and data collection plan within the first 6

months of the project's execution and annual work plans, deploying a field monitoring team responsible for collecting the original forms and documentation as needed. Due to the fact that carbon finance is viable for cookstoves, the project will also rigorously track and monitor cookstove deployment, use rates, fuelwood consumption, and emissions at the household level as part of the requirements for Gold Standard certification, which will be aggregated along with other logical framework indicators by the executing agency.

3.4. Evaluation: Due to the project's potential for providing important lessons in catalyzing a market for clean cookstoves as well as its ability to generate carbon credits, this project will be heavily monitored and evaluated. The evaluation will undergo three or four types of evaluations:

3.5. (1) A mid-term evaluation will be conducted halfway through the project's implementation. This evaluation will mostly focus on process and project implementation, although the evaluator will also take stock of any observable outcomes. Some evaluation questions to be answered will likely include the following: Are project activities and deliverables being completed on time, on budget, and with acceptable quality? Have any of the previously identified risks of the project materialized and are there newly identified factors that may affect the project's implementation? Can we extract any lessons from implementation thus far? Is there a need to adjust the project design? In addition, several stakeholders have expressed interest in understanding the drivers for proper usage of clean cookstoves over time. To the extent possible, the mid-term evaluation will try to gather this information.

3.6. (2) A final evaluation will be conducted, which will assess project implementation, but will mostly focus on whether the project achieved its intended outcomes (results and impacts). Beyond this assessment, the evaluation may also address other questions, such as the following: What is the prognosis for the market sustainability of this model? Can the project be expanded in Honduras or replicated in other countries? Which other stakeholders are most interested in the results of this project and has this project already had any of influence over policy or program decisions of other actors? What are the key lessons which could be applied in similar clean cookstoves projects? The final evaluation will again re-visit the issue of drivers for proper usage of improved cookstoves.

3.7. (3) An independent verification will be conducted annually by an accredited third-party to verify reduced greenhouse gas emissions, as part of the requirements for obtaining carbon credits. This process involves collecting precise quantitative data on emissions from a random, representative sample of households, and will likely include less rigorous assessments of other social, environmental, and economic benefits of the project.

3.8. (4) Although not confirmed, an impact evaluation will likely be conducted to address questions of attribution of several outcomes to the project. Questions addressed will include the following: To what extent can observed changes in indoor air quality, emissions, inhabitant exposure to air pollution, health effects such as respiratory illness, incidents of burns or other cooking related accidents, fuel costs, cooking time, firewood collection time, etc., be attributed to this project? The Government of

Honduras, the University of Zamorano, and several organizations promoting clean cookstoves have expressed interest in conducting an impact evaluation. While several impact evaluations have been conducted on the subject, few have been conducted in LAC and this project contains unique characteristics within its business model to emphasize sustainability and improved uptake and proper usage of the stoves over time. The MIF is already collaborating with SPD and has reached out to researchers in order to develop an impact evaluation design. Funding for an impact evaluation will be provided from sources other than the project and may include the MIF's Impact Evaluation Account.

3.9. Closing Workshop. The executing agency will organize a closing workshop at the appropriate time to assess, along with other key stakeholder, the outcomes achieve, identify additional tasks to guarantee sustainability and identify and disseminate lessons learned and best practices.

## 4. COST AND FINANCING

4.1. The project has a total cost of US$5,469,061, of which US$ 2,189,620 will be provided by the MIF, US$844,441 will provided as local counterpart resources. In addition, the MIF resources will leverage an additional US$2,435,000 in co-financing from the SREP that will be implemented as a non-reimbursable investment operation. The execution period will be of 60 months and the disbursement period will be of 64 months.

4.2. The MIF Donors Committee will be authorized to approve the use of MIF technical cooperation resources and the use co-financing resources from the SREP for this project. SREP resources will be provided to the IDB from the World Bank, in its capacity as trustee of the Strategic Climate Fund (SCF). As explained above in paragraph 1.18, the IDB is an Implementing Entity of the SCF. Pursuant to Resolution DE-123/12, the Board of Directors of the IDB authorized the Donors Committee of MIF to approve the use of SCF resources when such resources are being used to co-finance a MIF operation. SREP resources will be administered by the IDB pursuant to the terms of a Financial Procedures Agreement (FPA) signed between the IDB and the World Bank, as authorized by the Board of Executive Directors in Resolution DE-9/11 (document GN-2604). The Office of the MIF will be responsible for actively collaborating with other IDB departments (such as ORP/GCM, FIN and LEG) in complying with the fiduciary, reporting, administration and other legal requirements established in the FPA, to ensure that IDB can comply with such obligations on a timely fashion. Furthermore, as stipulated in the FPA, the use of SREP resources should be consistent with the approvals granted by SCF governing bodies for this project and the applicable policies and guidelines issued by the SCF. Pursuant to such policies and guidelines, SREP resources include certain fees to assist in the defrayment of project costs, which are duly identified in the budget of this operation. Availability of SREP resources for this project is subject to the World Bank transferring such resources to the IDB, pursuant to the terms of the FPA.

| Components | MIF | Counterpart | SREP | Total |
|---|---|---|---|---|
| Component 1 Improving clean cookstove quality and performance | $ 608,525 | $ 67,425 | - | $675,950 |
| Component 2 Strengthening clean cookstove enterprises and the supply chain | $137,000 | $ 5,500 | - | $142,500 |
| Component 3 Increasing access to cookstove finance | $ 259,100 | $ 321,000 | $ 2,435,000 | $3,015,100 |
| Component 4 Marketing, promotion and awareness raising | $ 229,400 | $ 29,500 | - | $258,900 |
| Component 5 Knowledge Management and Communications Strategy | $ 275,000 | $ 73,000 | - | $348,000 |
| Executing Agency/ Administrative | $ 479,280 | $ 348,016 | - | $897,296 |
| Baseline, Monitoring and Evaluation | $ 120,000 | - | - | - |
| Ex post reviews | $ 8,000 | - | - | - |
| Contingencies | - | - | - | - |
| **Sub-total** | $ 2,066,305 | $ 844,441 | $2,435,000 | $5,345,746 |
| **% of Financing** | 36% | 15% | 42% | 100% |
| Impact Evaluation Account (5%) | $103,315 | - | - | - |
| Agenda Account | $20,000 | - | - | - |
| **Grand Total** | $2,189,620 | $844,441 | $2,435,000 | $5,469,061 |

## 5. EXECUTING AGENCY

### A. Executing Agency

5.1. The Fundación Hondureña de Ambiente y Desarrollo Vida ("Fundación Vida") will be the Executing Agency of this project and will sign the agreement with the Bank. Fundación Vida is a private, non-profit organization that was created in 1992. For more than 20 years it has implemented more than 600 projects on environment and development issues in Honduras and neighboring countries. The project is aligned with the mission and goals of Fundación Vida, as well as its strategic work areas for 2012-2014. The institution's mission is to facilitate processes of socio-environmental improvement, creating skills and capabilities with strategic partners at local, national and international level, through transparent management of financial and other resources, contributing to the implementation of policies on environmental and development issues.

5.2. The project objectives and results align with Fundación Vida's priority areas of i) Conservation of environmental goods and services, and iii) Local Development, specifically the "Sustainable Production Systems" thematic area. The promotion of clean energy is closely related to its crosscutting strategic axis called "Climate Change and Risk Management". Fundación Vida's main strengths are i) its institutional image and credibility on issues involving natural resources, ii) high commitment by its Board and operational team, iii) experience on administration and implementation of large programs funded by international cooperation agencies, iv) capacity to work as an honest broker to coordinate efforts among private sector actors, NGOs, and government, and vi) the existence of an endowment fund to sustain project efforts and

after the project ends. Fundación Vida has no recent experience managing Inter-American Development Bank or the World Bank funds, but it has administered large projects and donors funds from Central American Development Bank (CABEI), United Nations Development Program (UNDP) and the European Commission.

5.3. Fundación Vida will establish an executing unit and the necessary structure to effectively and efficiently execute project activities and manage project resources. Fundación Vida will also be responsible for providing progress reports on project implementation. Details on the structure of the execution unit and reporting requirements are in Annex 7 in the project technical files.

## 6. PROJECT RISKS

6.1. Coordination of Local Actors. The market currently consists of a diverse set of commercial and non-commercial actors that have been working in a highly fragmented way and are involved in promoting cookstoves for distinct reasons – i.e. profit vs. social mission vs. political posturing. The executing agency is less experienced in clean cookstoves than other actors in Honduras. Fundación Vida was chosen based on an extensive survey of over 10 organizations carried out by MIF, World Bank and the Government of Honduras. Fundación Vida was elected due to their ability to coordinate a large program, as neutral third-party. A major challenge will be to coordinate these multiple actors around a long-term vision for scaling up access to improved cookstoves in a way that also satisfies each organization's specific motivations and interests. In addition, there are potential coordination risks among donor organizations, such as MIF, GIZ, World Bank and GACC. To mitigate this risk, the project will set up a steering committee as part of the project governance structure, which will seek to ensure adequate communication, coordination and communications among the key actors, among other duties.

6.2. Sustainability Risks. The project will support market-oriented solutions to cookstove dissemination. However, many of the target clients are poor and low income women in rural areas with limited resources to purchase cookstoves at full price. While cost-share mechanisms, micro-credits, carbon finance and improved market efficiency to lower product cost can significantly help to deepen market penetration and accessibility of these technologies, there may be a need for some on-going financial assistance and subsidies to enable access to these technologies for the poor. In addition, carbon financing has breathed new life into the market-based solutions for cookstoves sector, with the average price on the voluntary market at $11.3 per ton of $CO_2$ reduced due to the high social spillovers of cookstoves programs. Nonetheless, the lack of an international agreement climate change greatly diminishes the long-term outlook of the carbon market and the ability for cookstoves program to sell credits at a premium.

6.3. Security and safety issues. Over the last several years, the security situation in Honduras has greatly deteriorated, presenting important risks to the project in terms travel, mobility and access to certain parts of the country. The project will mitigate this risk by taking the security situation into account in the design of all activities. For

example, training of stove technicians will be carried out at a local university instead of in the communities. In addition, the decentralized approach through locally based microenterprises will ensure that qualified stove builders exist in the communities, thereby limiting the need for travel in unfamiliar parts of the country.

6.4. Credit Risk. The principal financial risks relates to the limited experience and precedent for lending for clean cookstoves. As such, there is limited knowledge related to pay back rates, technology risks, and other factors that may impact the credit portfolio of local financial institutions. As a means of mitigating this risk, the project will set up a co-financing mechanism using SREP funds. The co-financing mechanism will match local financial institution resources on a 1:1 basis, thereby sharing the perceived credit risk and facilitating local Bank participation.

## 7. Environmental and Social Effects

7.1. This project expects to have significant social and environmental benefits. First, the transition from traditional to improved cookstoves will result in significant reductions in GHG emissions and firewood consumption. The component parts of cookstoves are made of conventional and construction materials (cement, bricks, steel, and wood ash from bakeries for insulations) and are not expected to have positive or negative environmental impacts associated with their use. Second, the project will have important positive social impacts on the health of women in from poor and extreme poor households.

7.2. This operation was screened and classified as required by the IDB's safeguard policy (OP-703) September 13, 2013. Given the limited impacts and risks, the proposed category for the project is C.

## 8. Compliance with Milestones and Special Fiduciary Arrangements

8.1. The Executing Agency will adhere to the standard MIF disbursement by results, procurement and financial management arrangements specified in Annex 8.

## 9. Information Disclosure and Intellectual Property

9.1 The project information is deemed public according to the Bank's Access to Information policy.

**TC Document**
**Operation Expenses for Investment Implementation**

## I. Basic Information for TC

| | |
|---|---|
| ▪ Country/Region: | Honduras |
| ▪ TC Name: | **SREP Program Supervision Support** |
| ▪ TC Number: | HO-T1191 |
| ▪ Team Leader/Members: | Claudio Alatorre (INE/CCS) Team Leader; Emiliano Detta (INE/CCS); Adriana Valencia (INE/ENE); Carlos A. Jacome (ENE/CHO); Zachary Levy (MIF/MIF); Ana Paz Doblado (CID/CHO); and Juan Carlos Perez-Segnini (LEG/SGO). |
| ▪ Date of TC Abstract authorization: | 2/6/2013 |
| Donors providing funding: | Strategic Climate Fund (SCX) SREP Program |
| ▪ Beneficiary: | Republic of Honduras |
| ▪ Executing Agency and contact name | Ministry of Finance, *Secretaría de Estado en el Despacho de Finanzas* (SEFIN). Contacts: Mrs. Evelyn Lizeth Bautista Guevara, Vice Minister; Mr. Leonardo Matute; and Mr. Mario Bonilla. |
| ▪ IDB Funding Requested: | US$ 512,000 |
| ▪ Local counterpart funding, if any: | US$ 80,000 |
| ▪ Disbursement period: | 40 months (including execution period of 36 months) |
| ▪ Required start date: | May 2013 |
| ▪ Types of consultants: | Individual |
| ▪ Prepared by Unit: | INE/CCS |
| ▪ Unit of Disbursement Responsibility: | CID/CHO |
| ▪ TC Included in Country Strategy (y/n):<br>▪ TC included in CPD (y/n): | Y<br>Y |
| ▪ GCI-9 Sector Priority: | Climate change and supporting development in small and vulnerable countries |

## II. Objectives and Justification

This technical cooperation (TC) is part of the Investment Plan (IP) that was prepared under the leadership of the Government of Honduras for the Scaling-up Renewable Energy Program (SREP).[1] The objective of the proposed IP is to create an enabling environment for scaling-up the use of renewable energy for (i) grid-connected power generation as an alternative to increasing dependence to oil products; and (ii) a comprehensive approach for scaling-up the provision of sustainable rural energy services (rural —energization ), including off-grid stand-alone systems to provide basic electricity services in poor rural areas too distant to be connected to the conventional grid, and clean and sustainable cooking technologies. The IP proposed for SREP is structured around three main components: (i) Strengthening the RE Policy and Regulatory Framework (FOMPIER); (ii)

[1] SREP Honduras Investment Plan: IDB docs # 36760118

the Grid-Connected RE Development Support (ADHERC); and (iii) Sustainable Rural Energization (ERUS).

In order to prepare and coordinate activities under the IP the Ministry of Finance (*Secretaría de Estado en el Despacho de Finanzas*, SEFIN acronym in Spanish) established in 2011, through Ministerial Decree, a Unit for the Financial and Economic Management of Climate Change (*Unidad de Gestión Económica y Financiera para el* Cambio Climático, UGEFCC for its acronym in Spanish). This unit, that is currently being financed by the IDB through the CT HO-T1156, is also responsible for the general coordination and liaison with the National Committee for Climate Change which involves the President´s Office (*Secretaría de Estado en el Despacho Presidencial*), the SEFIN, the Natural Resources Ministry (*Secretaría de Estado en los Despachos de Recursos Naturales y Ambiente*, SERNA acronym in Spanish), the ENEE, National Electricity Company (*Empresa Nacional de Energía Eléctrica*), the energy regulator (*Comisión Nacional de Energía*) and the National Renewable Energy Association (*Asociación Hondureña de Productores de Energía Renovable*).

The IDB has approved three TCs with SREP funds that are currently under execution: (i) the Preparation of the SREP IP (HO-T1156) for US$375,000 executed by SEFIN; (ii) the Strengthening the Renewable Energy Policy and Regulatory Framework, FOMPIER (HO-T1178) of US$850,000 and is carried out by SEFIN; and (iii) a Program Preparation Grant for ADHERC (HO-T1176) of US$195,000 executed by the Multilateral Investment Fund (MIF). In addition, two new TCs part of the same Program (ERUS Cookstoves Program) are expected to be approved in the fourth quarter of 2013 involving the development of Sustainable Business Models for Improved Cookstove Dissemination totaling US$6,150,000 (of which US$2,950,000 are expected to be financed through SREP funds). In addition, a loan and a TC component part of the ADERC are anticipated to be approved in 2014.

The preparation TC (HO-T1156) is expected to be completely disbursed by the beginning of 2014 thus there is a need to maintain and strengthen the UGEFCC currently financed by this TC. The specific objective of this TC is to consolidate and maintain the UGEFCC support to the executing agency of the IP (*Secretaría de Estado en el Despacho de Finanzas*, SEFIN) in order to finish preparation and supervise execution of the multiple SREP components as described above.

**GCI-9:** This TC is aligned with IDB's institutional priorities as outlined in the report on the Ninth General Capital Increase in Resources for the Inter-American Development Bank (GCI-9) as it contributes to the goals of (i) "supporting development in small and vulnerable countries", and (ii) "supporting climate change initiatives, renewable energy and the environment", which includes the 'need to increase the knowledge base, strengthen frameworks and build capacity'. In addition, the TC is in line with the IDB's Integrated Strategy for Climate Change Adaptation and Mitigation, and Sustainable and Renewable Energy.

**Country Strategy:** This Technical Cooperation (TC) is aligned with the Bank´s country strategy with Honduras 2011-2014, as one of its focus sectors is energy. In relation to this sector the country strategy states that: "the objective of the Bank´s interventions is to promote the financial sustainability and enhanced operational capacity of the electric power sector. To this end, Honduras will be provided assistance in consolidating an institutional and regulatory framework that provides a true separation of roles and makes the ENEE financially sustainable, through measures such as the use of a rate scheme that covers the cost of supply, the targeting of subsidies, improved procedures for energy contracts, and reductions in commercial losses. Bank support for the sector, in the form

of investment loans, will be subject to progress on the issues described in the preceding paragraph regarding the role and financial sustainability of the ENEE."

This TC will not support investments related to the electric power sector that are mentioned in the strategy. This TC will focus in providing assistance in consolidating an institutional and regulatory framework in the country to meet the primary goal stated in the country strategy. In addition, this TC will strengthen the capacities of Honduras in the area of renewable energy in general with the objective of reducing its reliance on fossil fuels.

## III. Description of Activities and Budget

The TC will involve the following activities:

1) **Coordination of SREP Program.** This set of activities involves the financing of a team of climate mitigation experts for the management of the SREP for three years. The team will include one General Coordinator specialist in Renewable Energy and Climate Change, a Climate Change Finance expert, a Climate Change Resource Mobilization Consultant, a Procurement Specialist, and Administrative support to coordinate the activities of the SREP. The expected outcome from this component includes the establishment of a coordinating focal point for the SREP.

2) **Capacity Building and Logistical Support for Coordination.** This section involves the financing of workshops, training and attendance to events (such as the SREP annual meeting) in order to coordinate the SREP activities through the National Committee for Climate Change and with other local and international instances.

In addition to the activities of the two abovementioned components the TC also includes provisions for an internal audit that will be carried out by an independent consultant at the end of the CT.

| Outcome Indicators | | | | | | | |
|---|---|---|---|---|---|---|---|
| | Unit | Baseline | Year 1 | Year 2 | Year 3 | Target | Data Source |
| SREP Coordination Unit within SEFIN Established and Operational | # | 0 | 1 | 1 | 1 | 1 | SEFIN |

Counterpart funds are in kind and are part of SEFIN staff and managerial expenses. The IDB will ask the Government of Honduras (GoH) to provide a letter with the details of its in-kind commitment to support the TC operation.

**Indicative Budget**

| Activity | Description | IDB (SREP) Funding | Counterpart Funding | Total Funding |
|---|---|---|---|---|
| **Activity 1. Coordination of SREP Program** | Financing general coordinator, a climate change finance expert, climate change resource mobilization, a procurement specialist and administrative support. | 372,000 | 0 | 372,000 |
| **Component 2. Capacity Building and Logistical Support for Coordination** | Financing of workshops, events and training in order to coordinate the SREP activities. | 90,000 | 80,000 | 170,000 |
| **Audits** | | 20,000 | 0 | 20,000 |
| **Contingencies** | | 30,000 | 0 | 30,000 |
| **Total** | | 512,000 | 80,000 | 592,000 |

The supervision and monitoring of the CT will be carried out by the Team Leader (CCS) and a support consultant in Headquarters (HQ) in close coordination with the Country Office of Honduras (CCH).

## IV. Executing agency and execution structure

The SEFIN will be the entity executing the TC with the technical support of the UGEFCC and the administrative support of the UAP (SEFIN's Project Management Unit). As head of the SREP Executive Committee, as well as active member of the SREP Technical Committee, SEFIN will also play a major role in the overall management and coordination of the SREP Program in Honduras. The UGEFCC provides expertise associated with the execution and monitoring of international cooperation programs implemented by SEFIN.

To ensure a more efficient and effective performance, SEFIN has been divided into different under-secretariats, directorates, units, and departments. These entities include and have the following roles: the General Directorate of Public Credit (DGCP) will contribute experience in the management and administration of public debt; the Unit for the Mobilization of Economic and Financial Resources for Climate Change (UGEFCC) will contribute experience in the management of resources from various funds and international financial institutions aimed at financing programs to address the challenges posed by climate change; and the General Directorate of Public Investment (DGIP) offers capacities for technical coordination for public investment.

An independent auditing firm that is acceptable to the Bank will be contracted during the initial stages of the execution period. The auditor will issue an audit opinion on the financial statements of the project, according to the terms to be approved by the Bank. The consultant will provide feedback to the IDB and SEFIN regarding suggestions for improvement and resulting impacts.

As part of the activities of this TC several individual consultants will be hired. Procurement of consultants will be carried out in accordance with IDB's Project Procurement Policies (GN-2350-9). All procurement will be according to the provisions established in the procurement plan.

## V. Major issues

One of the main issues associated with the TC is GoH's lack of resources to undertake the multiple tasks associated with the development of the SREP. This occurs as the SEFIN does not have all the necessary technical personnel to supervise the whole Program.

In order to transform the energy sector in Honduras frequent and coordinated engagement of the different stakeholders involved in the process is needed. This is necessary to ensure the success of any initiative and to empower the different actors involved in the process to discuss the issues with sufficient depth and to come up with workable solutions that are applicable to Honduras.

To mitigate these risks the TC will include financing for climate change experts that will be based in the SEFIN to support technical coordination capacities. These experts, as well as other temporary support, will manage two components that are part of the SREP in order to carry them out effectively.

## VI. Exceptions to Bank policy

This TC does not expect exceptions to Bank Policies.

## VII. Environmental and Social Strategy

The proposed TC will not finance direct investments in infrastructure. There are no environmental issues associated with this operation. The Environmental Screening and Classification Toolkit has been applied, and resulted in a "C" classification (no environmental assessment studies or consultations required).

**Annexes**

| **Annexes Available Upon Request** | |
|---|---|
| ANNEX I | Safeguard Policy Filters |
| ANNEX II | Safeguard Screening Forms |
| ANNEX III | Terms of Reference General Coordinator specialist in Renewable Energy and Climate Change (in Spanish) |
| ANNEX IV | Terms of Reference a Climate Change Finance expert (in Spanish) |
| ANNEX V | Terms of Reference Climate Change Resource Mobilization Consultant (in Spanish) |
| ANNEX VI | Terms of Reference Procurement Specialist (in Spanish) |
| ANNEX VII | Terms of Reference Administrative support (in Spanish) |

| IMPACT | | RISKS |
|---|---|---|
| The intended impacts of the project include reductions in health risks associated with indoor air quality in poor and low-income households in Honduras, time and cost savings in household fuel use, and reductions in greenhouse gas emissions. | **Indicator 1**<br>*Number of people (disaggregated by gender and age) that express reductions in incidence of respiratory illness*<br>*Month 0 Baseline*: --<br>***Formula / Definition***<br>*N/A*<br>***Source***<br>*Data from health centers, household surveys and other sources* | It is possible to have an impact on health culture and that the data on health impacts from cookstoves can be methodically isolated from other disease information.<br><br>Disposable income or timing spent collecting firewood will increase as a result of reduced firewood consumption.<br><br>It is possible to obtain accurate baseline data on use of traditional stoves without including the topic in the national household survey system.<br><br>The proper use and adequate field performance of clean stoves will yield a standardized reduction of GHG emissions.<br><br>The levels of indoor air pollution can serve as a proxy for measuring exposure. |
| | **Indicator 2**<br>*Reductions in greenhouse gas emissions*<br>*Month 0 Baseline*: --; *Month 12*: 13200.00; *Month 24 Cumulative*: 35200.00; *Month 36 Cumulative*: 70802.00; *Month 48 Cumulative*: 124561.00; *Month 60 Final*: 199093.00<br>***Formula / Definition***<br>*Tons CO2-equivalent*<br>***Source***<br>*Independent carbon finance verification report* | |
| | **Indicator 3**<br>*Timing savings on collection of firewood (disaggregated by gender and age) – opportunity cost*<br>*Month 0 Baseline*: --<br>***Formula / Definition***<br>*N/A*<br>***Source***<br>*Household surveys* | |
| | **Indicator 4**<br>*Reductions in monthly expenditures on firewood or other cooking fuels*<br>*Month 3 Baseline*: $219.00; *Month 39 Final*: $115.00<br>***Formula / Definition***<br>*US$*<br>***Source***<br>*Surveys* | |
| | **Indicator 5** | |

| | | | | |
|---|---|---|---|---|
| | *Reductions in monthly expenditures of MSME son firewood or other cooking fuels from improved cooking devices* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 51*<br>*Final*<br>*15.00* | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Surveys, monitoring system, independent Gold Standard verifications, independent studies* | | |
| | **Indicator 6** | | | |
| | *Number of MSMEs showing an increase in profit* | *Month 0*<br>*Baseline*<br>*--* | *Month 60*<br>*Final*<br>*300.00* | |
| | ***Formula / Definition***<br>*EBITDA* | ***Source***<br>*Surveys, financial statements, and sales receipts* | | |
| | **Indicator 7** | | | |
| | *Number of individuals (disaggregated by gender and age) with less exposure to indoor air pollution* | *Month 0*<br>*Baseline*<br>*--* | *Month 60*<br>*Final*<br>*50000.00* | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Secondary studies and impact evaluation* | | |
| | **Indicator 8** | | | |
| | *Number of households with improved indoor air quality* | *Month 0*<br>*Baseline*<br>*--* | *Month 60*<br>*Final*<br>*50000.00* | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Detectors of particulate matter* | | |
| | **Indicator 9** | | | |
| | *Rate of attrition of certified MSMEs to track business sustainability over time.* | *Month 3*<br>*Baseline*<br>*0.00 %* | *Month 27*<br>*30.00 %* | *Month 51*<br>*Final*<br>*30.00 %* |
| | ***Formula / Definition***<br>*Business mortality rate* | ***Source***<br>*Fundación Vida and implementers* | | |
| **RESULTS** | | | | |
| The expected results of the Project are to scale up the proper use and adoption of | **Indicator 1** | | | The increased demand is a sign of a market build-up and |
| | *Number of clean cookstoves installed by MSMEs on their own initiative outside the scope of the project* | *Month 3*<br>*Baseline* | *Month 39*<br>*Final* | |

| | | | | | |
|---|---|---|---|---|---|
| clean cookstoves in poor and low income households and MSMEs in Honduras through sustainable business models and approaches. | | *0.00* | *3000.00* | | development.<br><br>Users are more willing to buy eco-stoves based on awareness, promotion and affordability through subsidies, micro-credit and carbon bonus.<br><br>MSMEs are interested in selling clean cookstove without the presence of the cost-share scheme. |
| | ***Formula / Definition***<br>*(beyond the project – expansion of client base)* | ***Source***<br>*Survey* | | | |
| | **Indicator 2** | | | | |
| | *Number of MSMEs offering and/or manufacturing products and services related to the clean cookstove value chain* | *Month 3 Baseline* | *Month 27* | *Month 3 Final* | |
| | | *0.00* | *150.00* | *300.00* | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Project data base and monitoring system* | | | |
| | **Indicator 4** | | | | |
| | *Additional financing mobilized for clean cookstoves* | *Month 3 Baseline* | *Month 60 Final* | | |
| | | *$0.00* | *$2,000,000.00* | | |
| | ***Formula / Definition***<br>*Loans, carbon credit revenues, additional public, private and donor funds* | ***Source***<br>*Carbon credit reports and reports from Banks and donors* | | | |
| | **Indicator 5** | | | | |
| | *Number of households using the technology appropriately* | *Month 3 Baseline* | *Month 60* | *Month 60 Final* | |
| | | *0.00* | *50000.00* | *50000.00* | |
| | ***Formula / Definition***<br>*Appropriate defined as use 100% of the time and correctly define by technology* | ***Source***<br>*Carbon credit verification reports and Project monitoring system* | | | |
| | **Indicator 6** | | | | |
| | *Number of loans for clean cookstoves* | *Month 3 Baseline* | *Month 51 Final* | | |
| | | *0.00* | *8000.00* | | |
| | ***Formula / Definition***<br>*Loans from MFIs, community based savings and loan organizations, retail banks, cooperatives, mixed cooperatives etc., Includes loans for the purchase of clean cookstoves and financing provided to value chain participants* | ***Source***<br>*Financial intermediaries.* | | | |
| | **Indicator 7** | | | | |
| | *Percent of MSMEs certified that are complying* | *Month* | *Month* | *Month 24* | *Month* |

| | | | | | | |
|---|---|---|---|---|---|---|
| | *with periodic maintenance and follow up visits* | *0*<br>*Baseline*<br>*--* | *12*<br><br>*98.00 %* | *Cumulative*<br>*98.00 %* | *36*<br>*Final*<br>*98.00 %* | |
| | ***Formula / Definition***<br>*(months 1, 4, 7, 10)* | ***Source***<br>*Project monitoring system* | | | | |
| **COMPONENT 1** | | | | | | **RISKS** |
| Quality control and technical standards for cookstoves | **Indicator 1** | | | | | |
| | *Alliance with the certification of eco stove models formalized* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 9*<br>*Final*<br>*1.00* | | | |
| | ***Formula / Definition***<br>*Fundación Vida and Zamorano must formalize their partnership relationship through an agreement.* | ***Source***<br>*Agreement* | | | | |
| | **Indicator 2** | | | | | |
| | *Technologies or models certified* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 27*<br><br>*5.00* | *Month 27*<br>*Cumulative*<br>*5.00* | *Month 63*<br>*Final*<br>*10.00* | |
| | ***Formula / Definition***<br>*Laboratory testing with pre-established criteria for each model or technology in order to provide more information to beneficiaries.* | ***Source***<br>*Technical report of each model.* | | | | |
| | **Indicator 3** | | | | | |
| | *Technical Opinion nonlocal components of cookstoves* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 15*<br>*Final*<br>*1.00* | | | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Technical reports laboratories UNAH, Defense University or another institution with capacity.* | | | | |
| | **Indicator 4** | | | | | |
| | *Percentage of cookstoves installed and used effectively* | *Month 3*<br>*Baseline* | *Month 36* | *Month 60*<br>*Cumulative* | *Month 3*<br>*Final* | |

| | | | | | | |
|---|---|---|---|---|---|---|
| | | 0.00 % | 75.00 % | 80.00 % | 85.00 % | |
| | ***Formula / Definition***<br>*Number cookstoves that are not abandoned and are functioning properly.* | ***Source***<br>*Monitoring system reports.* | | | | |
| | **Indicator 5** | | | | | |
| | *Certification technical norm developed.* | *Month 0*<br>*Baseline* | *Month 21*<br>*Final* | | | |
| | | -- | 1.00 | | | |
| | ***Formula / Definition***<br>*Development of technical standards for building Honduran cookstove Justa.* | ***Source***<br>*Publication of the technical standard for public consultation.* | | | | |
| **COMPONENT 2** | | | | | | **RISKS** |
| Supply management of cookstoves through the organization, training and capacity of micro suppliers. | **Indicator 1** | | | | | |
| | *Number of rural local shops and hardware stores that provide parts and supplies of certified cookstoves* | *Month 0*<br>*Baseline* | *Month 63*<br>*Final* | | | |
| | | -- | 50.00 | | | |
| | ***Formula / Definition***<br>*Rural enterprises will be organized to work together with suppliers and technical implementers on cookstoves* | ***Source***<br>*List of companies* | | | | |
| | **Indicator 2** | | | | | |
| | *Number of MSMEs and technicians trained and certified to build cookstoves* | *Month 3*<br>*Baseline* | *Month 12* | *Month 12*<br>*Cumulative* | *Month 24*<br>*Cumulative* | |
| | | 0.00 | 30.00 | 30.00 | 110.00 | |
| | | *Month 24*<br>*Cumulative* | *Month 36*<br>*Cumulative* | *Month 36*<br>*Cumulative* | *Month 63*<br>*Final* | |
| | | 110.00 | 160.00 | 160.00 | 300.00 | |
| | ***Formula / Definition***<br>*The technical training of cookstoves will address technical, quality and business issues.* | ***Source***<br>*Data from INFOP and ESNACIFOR* | | | | |
| | **Indicator 3** | | | | | |
| | *Annual workshops for capacity building of technicians in cookstoves* | *Month 0*<br>*Baseline* | *Month 21* | *Month 21*<br>*Cumulative* | *Month 33*<br>*Cumulative* | |

| | | | | | | |
|---|---|---|---|---|---|---|
| | | -- | 1.00 | 1.00 | 2.00 | |
| | | Month 33<br>Cumulative | Month 45<br>Cumulative | Month 45<br>Cumulative | Month 57<br>Final | |
| | | 2.00 | 3.00 | 3.00 | 4.00 | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Participant list.* | | | | |
| | **Indicator 4** | | | | | |
| | *technical training program for cookstove implementers designed* | Month 0<br>Baseline | Month 9<br>Final | | | |
| | | -- | 1.00 | | | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Training modules.* | | | | |
| | **Indicator 5** | | | | | |
| | *Agreements signed with technical training institutions.* | Month 0<br>Baseline | Month 12<br>Final | | | |
| | | -- | 1.00 | | | |
| | ***Formula / Definition***<br>*Process definition of responsibilities between the parties, activities, resources involved through formal document.* | ***Source***<br>*Signed agreements* | | | | |
| **COMPONENT 3** | | | | | | **RISKS** |
| Increased access to financing for cookstoves. | **Indicator 1** | | | | | |
| | *Credit Management agreement with local financial institutions and creation of financing mechanism for cookstoves* | Month 3<br>Baseline | Month 15<br>Final | | | |
| | | 0.00 | 1.00 | | | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Agreement* | | | | |
| | **Indicator 2** | | | | | |
| | *Microfinance mechanism for eco stove developed and implemented* | Month 3<br>Baseline | Month 18<br>Final | | | |
| | | 0.00 | 1.00 | | | |
| | ***Formula / Definition***<br>*Operating manual and credit regulations have to be designed* | ***Source***<br>*Financial Product with annexes* | | | | |

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| **Indicator 3** | | | | |
| *Governance scheme and management of carbon finance mechanisms established* | *Month 3 Baseline* | | *Month 24 Final* | |
| | *0.00* | | *1.00* | |
| ***Formula / Definition*** *N/A* | ***Source*** *Governance Document* | | | |
| **Indicator 4** | | | | |
| *Project Activity (VPA / CPS) is developed for Justa cookstove* | *Month 3 Baseline* | *Month 21* | *Month 21 Cumulative* | *Month 48 Final* |
| | *0.00* | *3.00* | *3.00* | *1.00* |
| ***Formula / Definition*** *N/A* | ***Source*** *Gold Standard website, and validation and verification reports.* | | | |
| **Indicator 5** | | | | |
| *Carbon credits issued* | *Month 3 Baseline* | | *Month 51 Final* | |
| | *0* | | *100000* | |
| ***Formula / Definition*** *Emission of carbon credits for cookstoves implemented in the project.* | ***Source*** *Public records of issued Carbon Credits.* | | | |
| **Indicator 6** | | | | |
| *Cookstove implementers credentialed and trained* | *Month 3 Baseline* | | *Month 51 Final* | |
| | *0.00* | | *10.00* | |
| ***Formula / Definition*** *This activity will be done through workshops led by the executing agency. It also includes the development of an accreditation scheme and guidelines for implementers of cookstoves (community approach, quality control, monitoring scheme)* | ***Source*** *Executing agency reports* | | | |
| **Indicator 7** | | | | |
| *Number of implementers channeling resources for cookstove subsidy mechanism* | *Month 3 Baseline* | *Month 18* | *Month 18 Cumulative* | *Month 33 Cumulative* |
| | *0.00* | | *4.00* | *10.00* |

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|---|---|---|---|---|---|
| | | | 4.00 | | |
| | | Month 33<br>Cumulative<br>10.00 | Month<br>60<br>Final<br>10.00 | | |
| | ***Formula / Definition***<br>*Formalizing by agreement of the alliance between implementers and the executing agency for dissemination of cookstoves* | ***Source***<br>*Agreements* | | | |
| | **Indicator 8** | | | | |
| | *Operating Manual for eco stove subsidy designed and validated* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 12*<br>*Final*<br>*1.00* | | |
| | ***Formula / Definition***<br>*Consultancy for design operating manual subsidy scheme* | ***Source***<br>*Operating Manual Document* | | | |
| | **Indicator 9** | | | | |
| | Design and Management Regulations approval Solidarity Fund | *Month 3*<br>*Baseline*<br>*0.00* | *Month 18*<br>*Final*<br>*1.00* | | |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Solidarity Fund Regulation* | | | |
| **COMPONENT 4** | | | | | **RISKS** |
| Communication, Promotion and awareness | **Indicator 1** | | | | |
| | *Designed communication strategy and project promotion* | *Month 0*<br>*Baseline*<br>*--* | *Month 15*<br>*Final*<br>*1.00* | | |
| | ***Formula / Definition***<br>*Communications expert consulting firm will develop the communication strategy of the project.* | ***Source***<br>*Communication strategy* | | | |
| | **Indicator 2** | | | | |
| | *Communication and promotion strategy implemented* | *Month 0*<br>*Baseline*<br>*--* | *Month 21*<br>*Final*<br>*1.00* | | |

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| | ***Formula / Definition***<br>*Professional communication sciences implementing strategic communication project through events and newspaper articles.* | ***Source***<br>*Events and program reports* | |
| | **Indicator 3** | | |
| | *Strategic communications products and social marketing designed, produced and disseminated* | *Month 3*<br>*Baseline*<br>*0.00*<br>*Month 39*<br>*Final*<br>*12.00* | |
| | ***Formula / Definition***<br>*Tablecloths, radio spots, promotional videos, posters, brochures, banners* | ***Source***<br>*Products* | |
| | **Indicator 4** | | |
| | Dissemination and awareness fairs developed | *Month 3*<br>*Baseline*<br>*0.00*<br>*Month 24*<br>*5.00*<br>*Month 36*<br>*Cumulative*<br>*5.00*<br>*Month 48*<br>*Cumulative*<br>*5.00*<br>*Month 60*<br>*Cumulative*<br>*5.00*<br>*Month 63*<br>*Final*<br>*20.00* | |
| | ***Formula / Definition***<br>*Dissemination and promotion program for all models of cookstoves project by conducting fairs in strategic places or communities* | ***Source***<br>*Participants report and results of the Fairs* | |
| **COMPONENT 5** | | | **RISKS** |
| Knowledge Management and Dissemination | **Indicator 1** | | • |
| | *International event to exchange knowledge about cookstoves* | *Month 3*<br>*Baseline*<br>*0.00*<br>*Month 42*<br>*Final*<br>*1.00* | |
| | ***Formula / Definition***<br>*Event will feature the participation of experts on topics of technological innovation in eco stove, new monitoring technologies, etc.* | ***Source***<br>*Participant list.* | |

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| **Indicator 2** | | | | | |
| *How to guide and package for the implementation of monitoring for carbon finance* | *Month 3*<br>*Baseline*<br>*0.00* | | *Month 57*<br>*Final*<br>*1.00* | | |
| ***Formula / Definition***<br>*N/A* | ***Source***<br>*Guide* | | | | |
| **Indicator 3** | | | | | |
| *Design and Management of program website* | *Month 3*<br>*Baseline*<br>*0.00* | | *Month 18*<br>*Final*<br>*1.00* | | |
| ***Formula / Definition***<br>*Website, Facebook page, or other social outreach* | ***Source***<br>*Website* | | | | |
| **Indicator 4** | | | | | |
| *Knowledge products such as case studies and info graphics* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 12*<br>*1.00* | *Month 12*<br>*Cumulative*<br>*1.00* | *Month 24*<br>*Cumulative*<br>*4.00* | |
| | *Month 24*<br>*Cumulative*<br>*4.00* | *Month 36*<br>*Cumulative*<br>*7.00* | *Month 36*<br>*Cumulative*<br>*7.00* | *Month 48*<br>*Final*<br>*2.00* | |
| ***Formula / Definition***<br>*N/A* | ***Source***<br>*Knowledge products.* | | | | |
| **Indicator 5** | | | | | |
| *Implemented a pilot project for commercial exploitation of firewood* | *Month 3*<br>*Baseline*<br>*0.00* | | *Month 51*<br>*Final*<br>*1.00* | | |
| ***Formula / Definition***<br>*N/A* | ***Source***<br>*Final report of the pilot* | | | | |
| **Indicator 6** | | | | | |
| *Manufactures of cookstoves materials have been improved.* | *Month 1*<br>*Baseline*<br>*0.00* | | *Month 51*<br>*Final*<br>*1.00* | | |
| ***Formula / Definition***<br>*Technical Consultancy (combustion chamber, etc.)* | ***Source***<br>*Project evaluation.* | | | | |

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|---|---|---|---|
| | **Indicator 7** | | |
| | *Study on cookstove models for indigenous and African descent communities.* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 27*<br>*Final*<br>*1.00* |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Study* | |
| | *Indicator 8* | | |
| | *Designed a model of sustainable commercial exploitation of wood (wood chain, consumer market, etc.).* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 39*<br>*Final*<br>*1.00* |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Report on the model* | |
| | **Indicator 9** | | |
| | *Technological Innovation Fund* | *Month 1*<br>*Baseline*<br>*0.00* | *Month 51*<br>*Final*<br>*1.00* |
| | ***Formula / Definition***<br>*Resources available for research and innovation in cookstove models. Also to be designed with counterpart resources and regulations for access to the fund. Additionally contemplated counterpart resources fund users.* | ***Source***<br>*N/A* | |
| | **Indicator 10** | | |
| | *Study on gender issues in the implementation of cookstoves.* | *Month 3*<br>*Baseline*<br>*0.00* | *Month 24*<br>*Final*<br>*1.00* |
| | ***Formula / Definition***<br>*N/A* | ***Source***<br>*Study* | |

Annex II
Budget Summary (Spanish)

| Componentes | MIF | Counterpart | SREP | Total |
|---|---|---|---|---|
| COMPONENTE 1 - Certificación y control de calidad de los eco-fogones | $ 608,525 | $ 67,425 | $ - | $ 675,950 |
| COMPONENTE 2 -Formación de técnicos en eco-fogones | $ 137,000 | $ 5,500 | $ - | $ 142,500 |
| COMPONENTE 3 - Desarrollo de nuevos mecanismos de financiación para eco-fogones | $ 259,100 | $ 321,000 | $ 2,435,000 | $ 3,015,100 |
| COMPONENTE 4 - Promoción de los eco-fogones | $ 229,400 | $ 29,500 | $ - | $ 258,900 |
| COMPONENTE 5 - Fortalecimiento de capacidades e intercambio de conocimientos | $ 275,000 | $ 73,000 | $ - | $ 348,000 |
| GESTION DEL PROGRAMA | $ 479,280 | $ 348,016 | $ - | $ 827,296 |
| Linea de base, monitoreo e evaluacion | $ 120,000 | | | |
| Revisiones expost | $ 8,000 | | | |
| Imprevistos | $ - | | | |
| **SUBTOTAL** | $ 2,066,305 | $ 844,441 | $ 2,435,000 | $ 5,345,746 |
| Percent of financing | 39% | 16% | 46% | 100% |
| Evaluacion de impacto (5%) | $ 103,315 | | | |
| Cuenta de la Agenda | $ 20,000 | | | |
| **GRAN TOTAL** | $ 2,189,620 | $ 844,441 | $ 2,435,000 | $ 5,469,061 |

Multilateral Investment Fund
Member of the IDB Group

# QED - (Quality for Effectiveness in Development)

Donors Memorandum
August 22, 2013

## SECTION 1: PROJECT SUMMARY

| | |
|---|---|
| **PROJECT NAME:** Scaling up a Market for Improved Cookstoves | Project Number: HO-M1038 |
| | |
| **DESIGN TEAM LEADER:** ZACHARY Hartsel LEVEY | **DEU OFFICER:** DOBOIN, RUBEN |

## SECTION 2: QED DETAILS

| | |
|---|---|
| 1. MIF Strategic Development Objectives Dimension | **9.1** |
| 1.1. Relation to the Agenda's Objectives | |
| 1.2. There is a causal relation between project objective and the agenda's objective. | True |
| 1.3. The project has potential for scalability after execution. | High potential |
| 1.4. Specific benefits for women | |
| 1.5. The project has specific benefits for women. | Women benefits in a project that does not target women |
| 1.6. Specific benefits for the environment | |
| 1.7. The project has specific benefits for the environment (GHG reduction, water savings, conservation, biodiversity). | Direct environmental impact: GHG reductions will be measured to generate carbon credits. Approximately 2.2 tons per year per stove. |
| 1.8. Relation to the MIF's Objectives | |
| 1.9. Target 1: Private Sector Development | |
| 1.10. Innovation | True |
| 1.11. Creating Markets and Adding Market Players | True |
| 1.12. Entrepreneurship | True: Particularly as it relates to stove service providers. |
| 1.13. Building Private Institutional Capacity | True: Particularly as it relates to stove service providers, implementation agencies, etc. |
| 1.14. Technology & Human Capital | True |
| 1.15. Higher Standards of Corporate Governance | False |
| 1.16. Strengthening Legal and Regulatory Framework | True: Will promote standards for quality control following ISO framework; Will also seek to develop a proposed public policy on cookstoves |
| 1.17. Development of financial institutions and financial markets | True: Will work with local financial sector to enter cookstoves market |
| 1.18. Improved access to basic services | True: Cookstoves should be considered a clean energy and a basic service, as an energy service and health service. It is also contributes to clean and healthy housing environment. |
| 1.19. Target 2: Targeting the poor | |
| 1.20. The project will be implemented in a region with a high incidence of poverty (poverty map resources http://mif.iadb.org/poverty/home) or target beneficiaries from the poor strata | Target population: Poor: Project will target primarily rural households living below the national poverty line. |
| 2. Additionality Dimension | **9.0** |
| 2.1. MIF non-financial contribution is critical for developing the project. | True: MIF non-financial contribution has been critical. MIF has been intimately involved in the initial design, market research and structuring of this program. Moreover, MIF participation brings credability, transparency and important conveneing influence. |
| 2.2. MIF financial contribution is critical for developing the project (there is little or no alternative funding) | Ambiguous: Funding cookstoves in Honduras is scarce and to date been available in small amounts. MIF funding critical for rolling out a comprehensive national program. |
| 2.3. MIF participation will mobilize counterpart funding that otherwise won't be available. | True: MIF will mobilize at least 2.43 million in SREP and over 800,000 in local counterpart. In addition, other donors have signaled interest in participating as a result of MIF participation |
| 2.4. MIF participation will likely improve project structure by providing technical advice, institutional credibility and/or lessons learned/best practices from other MIF projects | True: MIF has been intimately involved in the project design and set up that has improved the project design and structure. |
| 2.5. MIF participation will likely strengthen the institution(s) directly involved with the project | True: The project will build the capacity within Fundacion Vida to manage a comprehensive cookstoves program, training staff, enhancing information management systems for carbon finance, and installing clear governance structures for the sustainability and continuity of the program after the project. |
| 3. Project Diagnosis Dimension | **10.0** |

| | |
|---|---|
| 3.1. Diagnostic of the problem | |
| 3.2. The problem or need that the project attempts to address has been clearly identified in consultation with stakeholders (borrowers, executing agencies, male and female beneficiaries, other interested parties) | Compliant |
| 3.3. The causes of the problem, their interrelationships and magnitudes are clearly identified | Compliant |
| 3.4. Proposed Solution | |
| 3.5. The proposed solution is logically connected and related to the magnitude of the problem | Compliant |
| 3.6. Relevant lessons learned from previous similar interventions in this country or other country (PSRs, ASRs, mid-term evaluations, final evaluations or other evaluation document) are taken into consideration | Compliant: A comprehensive market study was undertaken as part of the project preparation, which analyzed in great detail the exisitng experiences, lessons learned and best practices in Honduras, which were integrated into the project design. |
| 3.7. Evidence is provided as to the effectiveness of the intervention proposed based on experience in other settings, or previous experience in the same setting | Compliant |
| 4. Logical Framework Quality Dimension | **8.5** |
| 4.1. The desired impact of the project is clearly stated in the logic framework | Compliant |
| 4.2. The result of the project contributes to the achievement of the impact and is clearly stated in the logic framework | Compliant |
| 4.3. The components contribute to the achievement of the results and include the necessary outputs to attain the purpose | Compliant |
| 4.4. The activities contribute to the achievement of the outputs | Compliant |
| 4.5. A baseline value or a predetermined starting point has been identified for each relevant indicator, as well as intermediate values, target values and sources of data or a plan for collecting them | Partially compliant: Several indicators will require further analysis to estabilish baseline values and intermediary and final targets |
| 4.6. Indicators are SMART (Specific, Measurable, Achievable, Realistic and Time-Bound) | Compliant |
| 4.7. The source, or means for collecting data (for outcomes, outputs and activities) actually exist, either with the executing agency or in any other external or internal source | Partially compliant: Several indicators will require further analysis regarding verification methods |
| 4.8. The assumptions needed for the execution of the project and the achievement of the objectives have been identified | Compliant |
| 5. Risks Dimension | **10.0** |
| 5.1. The experience and the skills of the executing agency have been evaluated | Compliant: The executing agency was selected based on an in-depth and competitive assessemnt of potential executing agencies in Honduras carried out in partnership with the government. |
| 5.2. The risks for the execution of the project and the achievement of the objectives have been identified | Compliant |
| 5.3. All risks have identified proper mitigation measures which can be tracked during project implementation | Compliant |
| 5.4. Compliance with IDB environmental/social policies | Compliant |
| 6. Monitoring & Evaluation, and Strategic Communication Dimension | **9.5** |
| 6.1. Monitoring & Evaluation | |
| 6.2. Monitoring mechanisms have been planned and budgeted | Compliant |
| 6.3. The project has an evaluation plan | Compliant |
| 6.4. The evaluation questions are defined | Compliant |
| 6.5. The evaluation type/ methodology is defined | Compliant |
| 6.6. Results potential | True |
| 6.7. Impact Potential | True |
| 6.8. Knowledge Sharing & Communication | |
| 6.9. The audiences and the desired action of the audiences as a result of the communication strategy have been identified | Partially compliant: There is clarity on audiences and desired actions that this project could influence, most which is detailed in the operational guidelines. This is partially compliant for not being reflected in DM for issues of space. |
| 6.10. The message and the communication channels that the communication strategy will convey are clearly defined and appropriated according to the different audiences identified | Compliant: Detailed explaination of communications strategy is available in the operational guidelines |
| 6.11. The knowledge sharing products are defined and appropriate to the different audiences | Compliant: Detailed in operational guidelines |

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| **TOTAL** | **9.4** |