



REQUEST FOR CEO ENDORSEMENT

PROJECT TYPE: FULL-SIZED PROJECT

TYPE OF TRUST FUND: GEF TRUST FUND

For more information about GEF, visit TheGEF.org

A. PART I: PROJECT INFORMATION

Project Title: Low Carbon Development Path: Promoting energy efficient applications and solar photovoltaic technologies in streets, outdoor areas and public buildings in island communities nationwide (LCDP)			
Country(ies):	Dominica	GEF Project ID: ¹	5686
GEF Agency(ies):	UNDP	GEF Agency Project ID:	4969
Other Executing Partner(s):	Ministry of Health and Environment (MoHE) (Executing Entity) Environmental Coordination Unit (ECU) (Implementing Entity)	Submission Date:	March 10, 2016
GEF Focal Area (s):	Climate Change	Project Duration(Months)	48
Name of Parent Program (if applicable): ➤ For SFM/REDD+ <input type="checkbox"/> ➤ For SGP <input type="checkbox"/>	n/a	Agency Fee (\$):	164,016

B. FOCAL AREA STRATEGY FRAMEWORK²

Focal Area Objectives	Expected FA Outcomes	Expected FA Outputs	Trust Fund	Grant Amount (\$)	Cofinancing (\$)
CCM-3	3.1 Favorable policy and regulatory environment created for renewable energy investments	3.1 Renewable energy policy and regulation in place	GEFTF	300,000	900,000
CCM-3	3.2 Investment in renewable energy technologies increased	3.2 Renewable energy capacity installed	GEFTF	1,004,000	6,800,000
CCM-3	3.3 GHG emissions avoided	3.3 Electricity and heat produced from renewable sources	GEFTF	422,484	1,240,000
Total Project Costs				1,726,484	8,940,000

¹ Project ID number will be assigned by GEFSEC.

² Refer to the [Focal Area Results Framework and LDCF/SCCF Framework](#) when completing Table A.

C. PROJECT FRAMEWORK

Project Objective: Removal of the policy, technical and financial barriers to energy-efficient applications and solar photovoltaic technologies in Dominica's streets, outdoor areas and public buildings nationwide, initially targeting up to 5 communities including Dubic, Boetica, Roseau, Portsmouth, for further scale up.

Project Component	Grant Type	Expected Outcomes	Expected Outputs	Trust Fund	Grant Amount (\$)	Confirmed Co-financing (\$)
1. Institutional and technical knowledge, awareness and capacity for EE applications and RETs	TA	Improved knowledge, awareness and institutional capacity on EE applications and solar PV through demonstrations of their deployment in Dominica	1.1 Desk study of selected EE applications and RETs to be piloted through an EPC arrangement. 1.2 Pilot EE applications and RE technologies with and without battery storage (TA part) 1.3 Knowledge transfer of demonstrated EE applications and RETs.	GEFTF	391,000	300,000 (MoHE) 200,000 (UNDP)
	Inv		1.2 : Pilot EE applications and RE technologies with and without battery storage: 23 Solar PV installations w/battery (59.9 kWp combined capacity) 60 Solar PV installations w/o battery (156 kWp combined capacity) 18 outdoor units of LED lights (52 W each) 700 LEDs of indoor lights (8W each)		275,000	1,000,000 (MoHE)
2. Policy measures and enforcement of EE applications and RETs	TA	Uptake of EE applications and solar PV technology is promoted through adoption of new institutional arrangements, and policy and enforcement measures	2.1: A strengthened Department of Climate Change, Environment and Natural Resources Management. 2.2: Action plan for implementing low carbon development. 2.3: Mandatory minimum energy performance standards (MEPS) for EE and RE products.	GEFTF	190,000	500,000 (MoHE) 200,000 (UNDP)
3. Financing options and mechanisms for EE applications and RET diffusion	TA	Scaled-up EE applications and RET investments through implementation of newly proposed financial and institutional mechanisms	3.1 Plan for scaled-up investments in EE products and RETs for specific communities. 3.2: Established "Climate Change Trust Fund Secretariat"	GEFTF	470,712	300,000 (MoHE) 200,000 (UNDP)
	Inv		3.3: Scaled-up RE and EE installations: 365 kW of RE installations (PV and Hydro) and EE installations (mostly EE lighting)	GEFTF	250,000	4,500,000 (MoHE) 800,000 (UNDP) 540,000 (EMS-Private Sector)
4. Monitoring and Evaluation	TA	Sustained low carbon development	4.1: Monthly progress reports 4.2: Final evaluation	GEFTF	68,000	100,000 (UNDP)
Subtotal					1,644,712	8,640,000
Project management Cost (PMC)				GEFTF	81,772	200,000 (MoHE) 100,000 (UNDP)
Total project costs					1,726,484	8,940,000

D. SOURCES OF CONFIRMED COFINANCING FOR THE PROJECT BY SOURCE AND BY NAME (\$)

Sources of Co-financing	Name of Co-financier (source)	Type of Co-financing	Co-financing Amount (\$)
National Government	MoHE	In-kind	1,300,000
National Government	MoHE	Investment	5,500,000
GEF Agency	UNDP	In-kind	800,000
GEF Agency	UNDP	Investment	800,000
Private Sector	EMS (Dominican-based ESCO)	Investment	540,000
Total Co-financing			8,940,000

F. CONSULTANTS WORKING FOR TECHNICAL ASSISTANCE COMPONENTS:

Component	Grant Amount (\$)	Co-financing (\$)	Project Total (\$)
International Consultants	156,000	100,000	256,000
National/Local Consultants	608,000	500,000	1,108,000

G. DOES THE PROJECT INCLUDE A “NON-GRANT” INSTRUMENT? No**PART II: PROJECT JUSTIFICATION****A.1: National strategies and plans or reports and assessments under relevant conventions, if applicable, i.e. NBSAPs, national communications, TNAs, NCSA, NIPs, PRSPs, NPFE, Biennial Update Reports, etc.**

N/A

A.2: GEF focal area and/or fund(s) strategies, eligibility criteria and priorities.

N/A

A.3: The GEF Agency’s comparative advantage:

N/A.

A.4. The baseline project and the problem that it seeks to address:

Baseline Analysis

Situation with Solar PV and Energy Efficient Lighting in Dominica

1. Despite several efforts in recent years to promote renewable energy technologies (RETs), Dominica is still largely dependent on fossil fuel as its main source of energy for power generation and other applications. Currently, the country imports in the range of 900 - 1,000 barrels of oil daily for energy generation and other applications. Power generation represents the main use of imported fossil fuels (50%), followed by transport (33%). Dominica’s current electricity power generation comes from diesel generators fuelled by imported oil (71%), hydropower (27.4%) with marginal generation from wind power (0.95%) and solar (0.25%). Dominica does not have any domestic sources of fossil fuels, and therefore the fluctuations in the import price of oil have posed challenges for Dominica, notably when oil reached a high of USD 145 per barrel in 2008. In 2011, Dominica spent USD 41 million on oil imports, representing 20% of its GDP.

2. Growth in the Solar PV market is currently limited by a DOMLEC-driven limit to IRE inputs into the national grid at 10% of peak annual demand or equivalent to 2.5 MW of installed RE capacity. Since January 2014, DOMLEC has been operating under two licenses granted by the IRC, the first being a non-exclusive generation license, and the second

as an exclusive transmission, distribution and supply entity for electricity within Dominica. The most recent information indicates one independent power producer (IPP) with a 225 kW wind turbine at Rosalie Bay.

3. DOMLEC has a total installed electricity capacity of 23.8 MW with peak demand of 16.8 MW. There are two operating diesel plants (Fond Cole and Sugar Loaf (Portsmouth) with a combined capacity of 20.0 MW. The three hydropower facilities (Laudat, Trafalgar and Padu) account for 6.72 MW. Average system losses for DOMLEC are in the order of 9.5% of net generation which is added to the electricity cost of the end consumer.

4. With the exception of an expanding hydro power industry, and political preference for investment in geothermal energy, the growth and diversification of Dominica's RE and EE sectors have been limited to the following:

- Solar technologies accounting for approximately 0.25% of the energy generation mix³ and comprising of 190 kW of solar PV in Roseau with a private entity and another 100 kW at the Rosalie Bay Resort. While there is high interest amongst Dominicans for additional solar PV installations on residential and commercial properties as a means to reduce electricity costs, there are regulatory barriers to adoption of these technologies that constrain the markets potential.
- EE measures have been marginal with no formalized energy codes or standards for buildings, and no energy efficiency appliance standard for its import, sale and installation in legislation or policy. The GoCD has waived VAT on a number of selected EE appliances, and in 2009, DOMLEC installed 26,000 smart meters as part of its Automated Meter Infrastructure (AMI) project. This project continues to provide utility companies with real-time data about power consumption, and allow customers to make informed choices about energy usage based on the price at the time of use. 2015 electricity rates are \$0.39 per kilowatt-hour (kWh), and forecasted to potentially reach \$0.45 per kilowatt-hour (kWh) by 2030⁴; higher than the Caribbean regional average of \$0.33/kWh. This monitoring system does have potential benefit in measuring the financial savings associated with future RE and EE technology deployment.
- In the lighting sector, compact fluorescent bulbs (CFL's) have been in use through an extensive distribution program in 2007 to all residences. In 2014 however, the Government of China donated 2,500 LED street lights to be powered by solar PV. By late 2014, an estimated 100 - 50W LED street light were installed with an approximate lifetime C02 reduction of 200 tCO2e.

5. The C02 emissions reductions associated with solar RE and EE projects in Dominica have therefore been marginal with current C02 reductions for the existing Solar PV generation at 184.28 tCO2e, and no current measure of the contribution of efficient lighting programs. At this rate, it is unlikely that the market will develop without intervention. Therefore, the ability of the market to offset the approximate 35,949 tCO2e emissions produced by the current installed diesel generation in Dominica is undermined. Without planned interventions for catalyzing low carbon development in Dominica, the GoCD will continue along its development of geothermal energy without any certainty of its development dates, and with continued uncertainty over the development of alternative sources of indigenous energy generation that would result in lower electricity prices. Moreover, the absence of support for demonstrating alternative financing and institutional mechanisms would increase the risk of insufficient numbers of interested proponents in RE or EE installations on their premises, and poor progress on mainstreaming low carbon adoption in Dominica.

6. A case can be made for an increase in the use of RE and EE applications such as those proposed in this project. Table A outlines a summary of the costs and associated benefits of Solar PV installations during the initial GEF project period and Table B summarizes those economic performance of the outdoor LED interventions during the initial GEF project period.

³ NREL 2015

⁴ World Economic Outlook 2014. Based on assumed increase in oil prices by 20% between 2020 and 2013 that will directly affect the surcharge/VAT component of the electricity rate in a Business As Usual (BAU) case.

7. Assuming all excess generation can be sold to the grid at \$0.30/kWh, annual savings from 580.8 Kwp of Solar PV installation can return between \$33,534 and \$104,976.

8. The combined economic benefits of the Solar PV projects depend heavily on:
- The electricity price at which DOMILEC agrees to purchase excess generation currently and in the future;
 - The RE quota allowed to be sold to the grid. Currently, there is an IRE ceiling of 10% and the market is further constrained to less than 0.5 MW that available as additional IRE for new projects;
 - The ability to reduce the cost of solar PV RET for units with storage capacities. These units currently cost \$USD 5.50 per watt and extend the payback period on this investment to an unfavorable timeline of 10 years. This is opposed to \$USD 3 per watt for units with no storage which return a more attractive 5 year payback period.

Table A: Economic Performance of UNDP-GEF Solar PV 2.6 Kwp Interventions during initial GEF Project Period

Proposed UNDP-GEF Project Solar PV Interventions -during GEF project period	Combined Annual Output (MWh)**	Annualized Savings (\$USD)	Total Cost of Solar PV Installations (\$USD) ***	Simple Payback
2.6 Kwp solar PV w/battery (23 units)	166.2	\$ 33,534.0	\$ 179,400.0	5
2.6 Kwp solar PV w/o battery (72 units)*	517.1	\$ 104,976.0	\$ 427,680.0	4

* combined 60 units + 12 unit assumption ~ 30Kwp installation subsumed in phase I of project 3 (see Table II-1)

**2.6Kwp Solar PV installations in Year 2,3,4. 2.6kWh units w/storage cost= USD 7800 per unit. 2.6kWh units w/o storage cost USD 6240 per unit. Based on aUSD \$3/watt assumption.

***The cost of installed solar PV in Dominica is in the range of USD 3.00 per watt to USD 5.50 per watt with a battery storage system. Assuming that a 2.5 kW installation is required for each household, a USD 7,500 reqd. 2.6kw = \$7,800, and =6240 (20% buy down). per unit generation of 18.2 kWh. Average monthly household consumption of 141kWh. Assumes DOMILEC accepts all excess generation at \$0.30/hWh

Table B: Economic Performance of UNDP-GEF Outdoor LED Interventions during initial GEF Project Period

Proposed UNDP-GEF Project LED lighting Interventions -during GEF project period*	Demand Saving (kVA)	Energy Savings (kWh)	Cost Savings (US\$)	Estimate Installed cost (US\$)	Simple Payback
52 Watt outdoor LED street lights - 18 units	1.9	9358.3	\$ 1,719.43	\$ 1,008.0	0.59

*estimated Dominica outdoor LED project LED cost analysis from similar case as proxy. Derived results using a per unit cost for LED lights of similar wattage (50 v 52W) and description

9. The primary and key baseline activity of this GEF Project is the National Low Carbon Climate Resilience Strategy 2012-2020 (LCCRS) that considers climate change mitigation measures (CCM) as a priority. The LCCRS provides the rationale and strategies towards the development of a low carbon path including the promotion of energy conservation and RE development to address rising energy costs that affect the cost of living and quality of life, the high costs manufacturing and services, and the challenges of remaining competitive. CCM is a priority with the understanding that CCM will generate energy savings and funds that can be availed through a sustainable financing mechanism for Dominica to invest into urgent climate change adaptation measures.

10. The LCCRS identifies the pathway for low carbon development including:
- Development and commercialization of geothermal resources with the aim of financing the design and construction of a grid-connected 120 MW geothermal plant;
 - Development of solar energy that includes training for solar energy conversions and related technologies, incentives for conversions of solar heating in homes and public buildings, feed-in tariffs for solar producers, design and construction of pilot grid-connected solar power facilities, and soft financing for communities and small-scale private solar power conversions;
 - Development of wind energy and hydropower that includes training on wind and hydropower technologies, development of wind and small and run-of-river hydropower resource inventories for Dominica, feed-in tariffs for wind and hydropower producers, financing of the design and construction of grid-connected wind farms and hydropower projects, and soft financing for community and small-scale private wind and hydropower power conversions;
 - Promotion of green communities including training on energy conservation, GHG auditing and low carbon technologies, financing and commissioning of energy and GHG audits of cities, public buildings and other public energy expenditures, establishment of soft financing of energy conversions and conservation to renewable energy that includes solar powered LED lights, and conversion of public building infrastructure to low carbon technologies in Portsmouth;
 - Sustainable financing for low carbon technologies and energy conservation that will include the provision of training on climate change financing for the private sector; assessment of viable options to finance low carbon technologies using market based instruments (e.g. carbon levies); design of the Climate Change Trust Fund (CCTF) architecture to finance conversions to low carbon technologies; and the legal establishment of the CCTF; and
 - Development of low carbon management services and technologies including training programs on energy and GHG auditing, establishment of standards and certification programs for low energy applications and equipment, energy metering and auditing, and promoting the professional certification of low carbon management services and technology providers.

11. Another key baseline activity for this Project is the National Energy Policy (NEP) for Dominica, 2014 and the supporting National Sustainable Energy Plan (NSEP). The Policy objective is to promote utilization of indigenous sources of energy to produce and supply electricity at the lowest possible cost. The Policy provides, amongst other issues, conditions to facilitate the exploitation and development of cheaper energy through using RE technologies, encouragement on the installation of solar PV technology where economically viable, on all new public sector buildings, commercial buildings, and residences, particularly for buildings that could benefit from those systems in the event of service outages, and measures to promote energy efficiency in all electricity consuming sectors, as well as in production of electricity.

12. Despite the high level of interest in low carbon development from a number of Dominican parliamentarians and Dominican-based and foreign investors, the opportunities for developing renewable energy and energy efficiency initiatives in Dominica are threatened by:

- The pre-occupation of the Government's energy experts on developing geothermal resources as a means of lowering the carbon footprint of Dominica's energy sector. One of the primary concerning issues includes the uncertainty of when geothermal power will be developed. Given the complexities of the geothermal development related to design and financing, the dates for commissioning of the geothermal power resource range from 3 to 10 years or more. As such, the Government is unwilling to provide appropriate attention to medium-term solutions to high electricity costs. Moreover, the IRC that regulates electricity tariffs in Dominica cannot guarantee that geothermal power will reduce electricity costs to Dominican customers⁵, as they do not have the capacity to evaluate such plans;

⁵ While a fuel surcharge on tariffs may be reduced, the cost of upgrading transmission lines from geothermal plants to customers to cater to voltage drops and fluctuations, especially the upgrading of an 11 kV line to Portsmouth area to the north to 33 kV, will be costly and be reflected on new tariffs.

- DOMLEC's indications of the limits of intermittent renewable energy (IRE) into the Dominican grid which have been presented in their March 2015 Integrated Resource Plan (IRP) as 10% of peak annual demand⁶. This assumes that the current grid can only take another 2.5 MW of new RE power into the grid without further investments into grid stability measures that would allow for a higher rate of IRE. With DOMLEC's IRP already proposing a 1.5 MW utility-scale solar PV plant in 2017 and 2018, and more than 400 kW of IRE capacity already installed, there is less than 600 kW of IRE available under DOMLEC's IRE ceiling⁷. As such, there is no incentive for DOMLEC to encourage additional RE installations in Dominica.

13. These threats have been somewhat scaled-back due to the loss of most of the country's hydropower generation by capacity from Tropical Storm Erica in August 2015. This has led to DOMLEC announcing the need for large electricity consumers to "self-generate" that will make up for the loss of approximately 6.2 MW.

14. Notwithstanding this recent development, there are barriers to low carbon development including:

Barrier type	Barrier Descriptions
<u>Regulatory Policy / Legal</u>	No detailed action plans for the development of RE sources and EE appliances, lack of standards for the importation of RE and EE equipment and its installation using best practices; a utility-driven cap on RE development (2.5 MW) that does not address potential for higher intermittent renewable energy (IRE) penetration to the national grid; and no policy on feed-in tariff to safeguard cost recovery of IPPs feeding into the national grid.
<u>Institutional / Technical</u>	No "energy champions" solely dedicated to the promotion of low carbon development in Dominica. Key institutions include the Ministry of Trade, Energy and Employment (MoTEE) whose energy-related personnel are being driven primarily by geothermal development, and Ministry of Health and Environment (MoHE) under which it's Environmental Coordination Unit is driving a broad but important climate resilience agenda that includes energy-related climate change actions, which is not considered a core discipline within this ministry. This lack of government capacity to provide focused development of low carbon for relief from high energy costs for commercial and residential sectors, are being led by the privately-owned DOMLEC.
<u>Awareness/ Knowledge</u>	This ranges from politicians and policymakers with insufficient exposure to these issues, to the financial sector, energy designers and architects in Dominica, technicians with the vocational skills to install RE and retrofitting equipment for EE benefits, and general public who are aware of the high cost of electricity but not aware of the means of reducing these costs.
<u>Market / Financial</u>	Barriers that restrain the public sector from making investments in RE and EE include investments in RE or EE not being factored into public sector capital expenditure or operating budgets; high upfront cost of RE and EE investments that do not have immediate or highly visible benefits; RE and EE being outside of the core expertise area of most public sector entities; and the lack of testing of alternate public sector financing vehicles for RE and EE, such as Energy Performance Contracting and Third Party Ownership models.

15. The GoCD are planning re-structuring of institutional arrangements to implement the LCCRS. While the Environmental Coordination Unit (ECU) is the current government agency tasked with oversight of Dominica's LCCRS, the alternative institutional arrangement being developed under the country's *Third National Communications (TNC)*, a document that will also contain action plans to implement the LCCRS with the intention of reverting Dominica back to becoming a net carbon sink. In an effort to maximize the country's potential to develop low carbon energy sources, a "Department of Climate Change, Environment, and Natural Resources Management" (DoCCENRM) is being proposed to develop a "Low Carbon Climate Resilient Policy and Action Plan". Passage of CCTF through Parliament is expected in 2015. With technical assistance from UNEP, the TNC will be addressing:

- how funds can be used for catalyzing the setup of pilot RE and EE projects;

⁶ Available on http://www.ircdominica.org/files/downloads/2015/03/DOMLEC_IRP-Investment_Plan-v2.pdf. It is surmised that geothermal power is not counted against the IRE ceiling of 10%.

⁷ The development of a utility-scale solar PV plant will likely not result in a reduction of electricity costs to electricity consumers due to the need to cover DOMLEC overhead costs

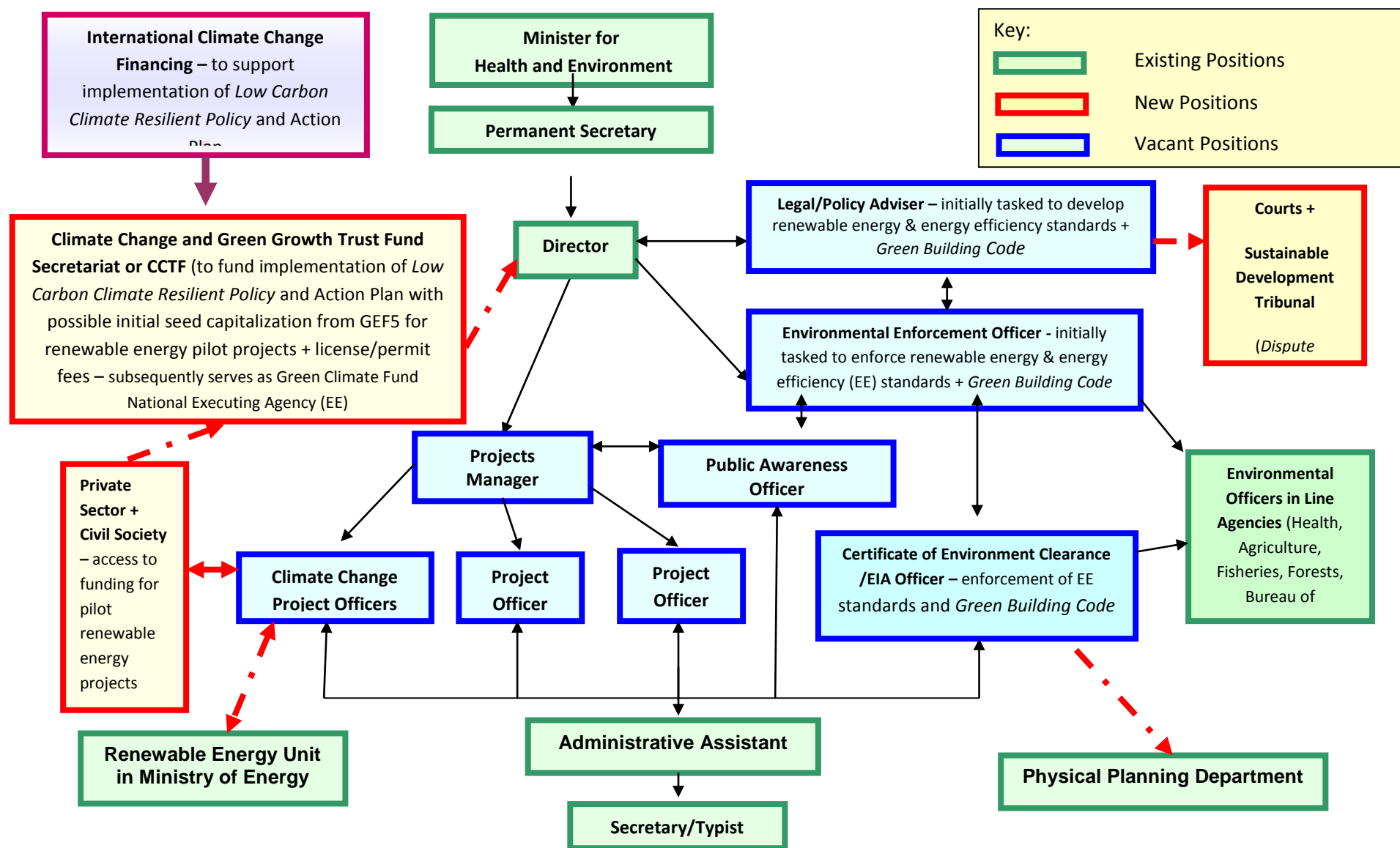
- the architecture of a Climate Change Trust Fund (CCTF) that is being designed with a few select Parliamentarians with support from the Prime Minister; and
- Possible sources of CCTF capitalization including fuel surcharges, license fees, fines and donors.

16. Key features to the architecture of the DCCENR include additional positions to the existing organizational structure of the MoHE (as shown on Figure 1). Under a Permanent Secretary of MoHE and Director of the DoCCENRM (that would replace the ECU), additional positions would include:

- A Legal Policy Advisor (LPA) reporting to the Director of the DCCENRM to affect policy, lead formulation of a “Green Building Code” and setup a system for permits for energy efficiency and renewable energy;
- An Environmental Enforcement Officer (EEO) also reporting to the Director of the DCCENRM would provide “low carbon” policy guidance and enforcement instruments to Environmental Officers of other line agencies;
- A EIA/CEC Officer reporting to the EEO and tasked with issuance of Certificate of Environmental Clearance for low carbon projects;
- Lead Administrator for the CCTF;
- A CCTF Projects Manager reporting to both the Lead Administrator and the Director who is tasked with oversight of CC projects approved for funding under the CCTF;
- A Public Awareness Officer;
- Project Officers who screen and provide recommendations to the CCTF Projects Manager for approvals.

17. MoHE will be funding new positions within the new DoCCENRM including the LPA, the EEO and the EIA/CEC Officer. This proposed GEF-supported Project seeks to catalyse low carbon development through the removal of the aforementioned policy, institutional, awareness and knowledge, financial and market barriers to energy-efficient applications and solar PV technologies in Dominica’s streets, outdoor areas and public buildings nationwide. The Project will target up to 5 communities including Dubic, Boetica, Roseau, Portsmouth, for further scale up.

Figure 1: Proposed Organizational Structure: Department of Climate Change, Environment and Natural Resources Management (DoCCENRM)



A.5 Incremental /Additional cost reasoning:

18. By building on the updated baseline assessment carried out during PPG work, some complementary activities to and some rewording of the previous activities presented in the PIF have been added into the Project design:

Component	BAU/Baseline scenario	GEF Alternative
<i>1. Institutional and technical knowledge, awareness and capacity for EE applications and RETs</i>	<p>The GoCD are recipients of grants for various RE technologies including:</p> <ul style="list-style-type: none"> The supply and installation of 2,500 solar PV street lighting standards from the Government of China; Support from SIDS-DOCK on EE lighting for public buildings; <p>Further demonstrations of low carbon technologies in public buildings are limited by lack of knowledge of government personnel to access low carbon technologies, the pre-occupation of their energy-related personnel with the development of geothermal energy, and the lack of encouragement to add RE to the grid (based on the DOMLEC-driven limit to IRE inputs into the national grid at 10% of peak annual demand or equivalent to 2.5 MW of installed RE capacity). GoCD and DOMLEC have requested technical assistance from the World Bank to study the impacts of increasing IRE into the grid, preparing plans for grid upgrades, and the updating of the grid code.</p>	<p>On the basis that there can be a sizeable increase of IRE into the national grid above 10%, support includes:</p> <ul style="list-style-type: none"> Detailed studies of RE technologies that can be successfully demonstrated in Dominica; Demonstration of solar PV and EE technology installations for a number of public buildings and public areas to be selected by the GoCD up to a capacity of 210 kW for a number of GoCD building sites, to be implemented under a pilot EPC arrangement; Use of these pilots as a means of raising awareness and knowledge of RETs and EE equipment for a wide range of stakeholders including parliamentarians to RE technical persons and the general public; Setup and implementation of an MRV system to monitor energy savings and GHG reductions from RE and EE installations; Vocational training on best international practices for installations and maintenance of RE equipment.
USD 1,966,000	<i>USD 1,300,000</i>	<i>USD 666,000</i>
<i>2. Policy measures and enforcement of EE applications and RE technologies</i>	<p>Recent strategies, plans and policies such as the LCCRS, NSEP and the NEP have been adopted. This has not led to a significant rise in the uptake on RE and EE applications. Current enforcement measures are weak with insufficient incentives and government support to implement low carbon development. In addition, there are a lack of regulations and standards for the import, sale and installation of quality RE and EE equipment.</p>	<p>The Project will support:</p> <ul style="list-style-type: none"> Capacity building of a new department within MoHE to support climate change and low carbon development in Dominica that responds to the action plans required to implement the LCCRS; Assistance to implement low carbon action plans including identification resources required for low carbon development; Setting of minimum energy performance standards (MEPS) for standards and labelling (S&L) of RE and EE equipment import, sale and installation; Setup and implementing of enforcement regime for MEPS.
USD 690,000	<i>USD 540,000</i>	<i>USD 190,000</i>
<i>3. Financing options and mechanisms for EE applications and RET diffusion</i>	<p>Government agencies, municipalities and community groups are all interested in RE (particularly in solar PV) as a means of reducing high electricity costs. Only two private sector companies have managed to attain IPP status with 515 kW of RE installations, and DOMLEC has a 10% ceiling (2.5 MW) of IRE inputs into the national grid, thereby stifling any further low carbon development in Dominica.</p> <p>The GoCD have waived VAT on a number of selected EE appliances. This has not resulted in significant uptake in EE appliances in Dominica.</p>	<p>The Project will support:</p> <ul style="list-style-type: none"> Plans for scaled-up investments in EE products and RETs for specific communities and using the lessons learned from the pilot installations from Component 1; Technical assistance to establish a “Climate Change Trust Fund” (CCTF) as specified under the LCCRS to assist proponents in implementing RE and EE installations; Seed financing for CCTF to catalyze development of RE and EE projects; Technical assistance to promote and administer CCTF for scale-up of low carbon development.
USD 7,970,484	<i>USD 7,100,000 (incl. PMC)</i>	<i>USD 870,484 (incl. PMC)</i>
USD 10,626,484	USD 8,940,000 (incl. PMC)	USD 1,726,484 (incl. PMC)

19. The main changes from the PIF are as follows:

- The addition of activities in Component 2 to strengthen the “Department of Climate Change, Environment and Natural Resources Management” (DoCCENRM), a new agency within MoHE that will serve as the focal point for low carbon development within the GoCD;
- The addition of activities into Component 2 to develop action plans for low carbon development that involves determination of the level of intermittent renewable energy (IRE) into the national grid. Without this activity, the level of IRE is in the order of 2.5 MW of which only less than 0.5 MW are available as additional IRE with new project proponents, essentially stifling any further low carbon growth. The work to determine feasible IRE grid penetration and the required upgrades of the existing grid for absorbing higher percentages of IRE will be undertaken with support from the World Bank-supported ECRA Project;
- The definition of financial and institutional mechanisms that will support scaled-up levels of RE and EE installations in Component 3. This will involve the public sector initially, followed by private sector project proponents once higher levels of IRE are permitted by the IRC and DOMLEC; and
- Assistance to provide seed finance for a proposed Climate Change Trust Fund (CCTF) in Component 3. This will also include technical assistance to CCTF administrators on disbursement of these funds for the purposes of catalysing and initiating RE and EE projects for government agencies, commercial and industrial establishments and private households.

20. Overall, the Project will still keep to its initial objectives of promoting renewable energy and energy efficiency as a means of scaling-up low carbon development in Dominica. The result of this GEF-funded project is an estimated direct and total direct post-project GHG emission reductions of 100,899 tonnes CO_{2eq} cumulative for an estimated project lifetime of 10 years.

21. Indirect Emission Reductions:

These are estimated using the GEF Manual for guidance on top-down and bottom-up factors and detailed calculations can be found in an attached spreadsheet:

The bottom up indirect emission reductions have not been estimated for this project due to the fact that solar PV installations are regulated by DOMLEC and IRC.

The top down indirect emission reductions have been estimated with the formula $CO_2 \text{ INDIRECTTD} = P10 * CF$, with P10 being the technical and economic potential of this application in the 10 years following the end of the project (130,270 tonnes) and a Causality Factor (CF) of 40% (“modest and substantial”).

$$CO_2 \text{ INDIRECTTD} = 130,270 * 0.4 = 52,108 \text{ tonnes}$$

A.6 Risks, including climate change, potential social and environmental risks that might prevent the project objectives from being achieved, and measures that address these risks:

22. An additional risk was identified during the project preparation. It relates to the impact that lower oil prices may have in reducing the government’s urgency on embracing RE and EE: The Project is assisting GoCD in preparing action plans for the LCCRS and in implementing RE and EE installations in Dominica. This will provide the GoCD with required resources, targets and timelines to implement low carbon development, and thereby reducing the risk that the GoCD reduces its urgency of low carbon or RE and EE development in Dominica.

A.7. Coordination with other relevant GEF financed initiatives:

There are no changes in the proposed coordination from when the PIF was approved.

B. ADDITIONAL INFORMATION NOT ADDRESSED AT PIF STAGE:

B.1 Stakeholder engagement in project implementation.

23. The Project Steering Committee (PSC) will have oversight of the Project Management Unit (PMU). The PSC will consist of a Chairperson (from the Office of the Prime Minister), with PSC members from DoET, one representative from ECRE, BL&P, MoEWRD, MoH, MoSCCED and UNDP Barbados and the OECS. The primary functions of the PSC will be to provide the necessary direction allowing the Project to function and achieve policy and technical objectives, and to approve annual Project plans and M&E reports. Other stakeholders to be engaged in project implementation are as follows:

EE Institutional Frameworks at National and Local Levels	
Public authorities	Responsibilities – Roles and Purpose
Environmental Coordination Unit (ECU) under the Ministry of Health and Environment (MoHE)	Responsible for all environmental and sustainable development management programmes, projects and activities in the country. Its key functions include: (1) advising government on the development of coherent environmental policies; (2) promoting interest and encouraging public participation in environmental matters through public awareness activities; (3) serving as the focal point for regional and international agreements on environmental issues (including Climate Change agreements). The ECU is tasked with implementation of the LCCRS and will serve as the Executing Entity of the LCDP Project. The MoHE will serve as the Implementing Entity of the LCDP Project.
Ministry of Trade Energy and Employment (MoTEE)	Provides oversight to the development of energy generation projects in Dominica, amongst other issues such as trade and employment. The Energy Unit within MoTEE has oversight of the geothermal energy project that dominates the energy-related activities of the GoCD. Since energy development and costs are closely related to Dominica's economic performance, MoTEE also provides oversight to the country's Bureau of Standards (BoS) that has relevance to the standardization of imported equipment related to RE and EE.
Independent Regulatory Commission (IRC)	Regulator for generation, transmission, distribution, supply and sales of electricity, was established under the Electricity Act, Act 10 of 2006, which was passed into Law on October 2006. The IRC was established as an independent regulator with the primary responsibilities and functions contained in the Act. The IRC has the sole and exclusive authority to regulate all electricity entities subject to the Act and has full power to regulate all licensees (e.g. economic and technical aspects, such as tariffs or electricity charges).
EE Private Sector Institutional Framework	
Dominica Electric Power Company (DOMLEC)	Main utility for the generation, transmission, distribution and sale of electricity to more than 35,000 customers and is operated as a vertically integrated company. DOMLEC is primarily and privately owned by the Canadian firm EMERA Caribbean Renewables with a 51% share. DOMLEC have been operating under two licenses granted by the IRC, the first being a non-exclusive generation license, and the second as an exclusive transmission, distribution and supply entity for electricity within Dominica. Lack of adequate government oversight and ineffective management result in continuing poor performance of the utility and within recent times, power generation has become increasingly expensive, resulting in excessive costs to consumers (e.g. T&D losses are close to 10%).
EMS Limited	Dominican-based energy service company (ESCO) that offers designs, advice and RE and EE installations to property owners, architects/civil engineers and consumers. EMS has been one of the successful RE proponents in Dominica with installation of several solar PV panels that supplement electricity supplies to a number of businesses including one of the largest grocery stores in Roseau, and an automobile dealership at Canefield airport.

B.2 Socioeconomic benefits gender dimensions, and global environment benefits:

24. The social impacts of improving solar energy access to disaster response and relief centres in Dominica include:

- Reliable backup power sources from renewable energy at community and resources centers in the event of an extreme weather event that knocks out grid power;
- Reliable uninterrupted power supplies for polyclinics which serve as relief centers that require uninterrupted power to store medicines and other vital goods;
- Investments in these Solar PV and LED projects will have an employment impact of approximately 20 temporary installation jobs and 60 ongoing operations & maintenance and service jobs during and after project implementation⁸.
- Raised awareness of the benefits of solar energy and the possible entrance of those interested into further vocational training disaggregated by gender that will translate into jobs for women and men in a scaled-up solar-PV industry in Dominica;
- Increased understanding of willingness of women vis-à-vis men to invest in solar PV panels to better address gender-related barriers to the uptake of renewable energy technology;
- Promoted use of renewable energy by women at the community level in order to strengthen the resilience of households and buildings in Dominica to extreme weather events and adapt to climate change.
- Benefits are also expected to reach the Kalinago indigenous population of Dominica through these communities' direct participation in this program. In an effort to support applications for self-generation of power, the installation of solar PV panels on various public buildings including those public schools and community centers identified for emergency shelter, has been incorporated into the project plan.

B.3. Cost-effectiveness in project design:

25. The cost-effectiveness is reflected in the Project design that addresses a key technical barrier of how much IRE can be absorbed by the existing grid and with an upgraded grid. This barrier removal activity will allow the Government to strategize, plan and implement phased approaches to increasing RE in Dominica. The Project will also provide technical assistance to streamline approvals for the new licensing regime and to the process of installing solar PV panels to ensure quality installations to maximize generation of electricity. Lastly, the Project will strengthen the country's disaster risk response programmes through the provision of clean backup solar power to community and resources centres and polyclinics. The cost of emission reductions resulting from this Project USD \$17.1 per tonne of CO₂ reduced⁹

26. This Project also seeks to produce knowledge of regional and global value on transforming renewable energy markets that can be applied in small island states in the region, not participating in the Project and even for countries in other regions of the world. The value of these early lessons will make the GEF resources applied, more cost-effective in the medium term.

⁸ Approximately 30 jobs/MW – EPIA 2004. Figure includes consulting, maintenance, operation, retail and other services. Approximately 20 jobs/MW – EPIA 2004. Assumptions based on manufacturing and installation during project period. Due to the fact that there is no assumed PV manufacturing in Dominica, a reasonable judgment of 10 jobs/MW is applied to capture installation job additions during the life of the project.

⁹ The calculations and assumptions are shown and shared in a separate spreadsheet. The total GEF contribution / direct+ total direct post project = \$(1,726,484)/(889 direct+ 100,010 total direct post project tCO₂eq)

C. M & E PLAN:

27. Project monitoring and evaluation will be conducted in accordance with the established standard UNDP and GEF procedures – see below table summary. For further details, please see M&E Section of the UNDP-GEF project document:

Type of M&E activity	Responsible Parties	Budget US\$ <i>Excluding project team staff time</i>	Time Frame
Inception Workshop and Report	<ul style="list-style-type: none"> Project Manager UNDP CO, UNDP GEF 	Indicative cost: 5,000	Within first four months of project start up
Measurement of Means of Verification of project results.	<ul style="list-style-type: none"> UNDP GEF RTA/Project Manager will oversee the hiring of specific studies and institutions, and delegate responsibilities to relevant team members. 	To be finalized in Inception Phase and Workshop.	Start, mid and end of project (during evaluation cycle) and annually when required.
Measurement of Means of Verification for Project Progress on <i>output and implementation</i>	<ul style="list-style-type: none"> Oversight by CTA with support from the Project Manager Project team 	To be determined as part of the Annual Work Plan's preparation.	Annually prior to ARR/PIR and to the definition of annual work plans
ARR/PIR	<ul style="list-style-type: none"> Project manager and team UNDP CO UNDP RTA UNDP EEG 	Included with periodic status and progress reports	Annually by July
Project Board meetings	Project Manager	To be determined as part of the Annual Work Plan's preparation. Indicative cost: 6,000 (1,500 x 4 years)	Following Inception Workshop and annually thereafter.
Periodic status/ progress reports	<ul style="list-style-type: none"> Project manager and team 	Monthly progress reports to be undertaken by National Project Manager with support from CTA Indicative cost: 44,000	Monthly
Final Evaluation	<ol style="list-style-type: none"> Project manager and team, UNDP CO UNDP RCU External Consultants (i.e. evaluation team) 	Indicative cost: 50,000	At least three months before the end of project implementation
Project Terminal Report	<ul style="list-style-type: none"> Project manager and team UNDP CO 	Indicative cost: 10,000	At least three months before the end of the project
Audit	<ol style="list-style-type: none"> UNDP CO Project manager and team 	Indicative cost: 12,000 (3,000 x 4 years)	Yearly
Visits to field sites	<ul style="list-style-type: none"> UNDP CO UNDP RCU (as appropriate) Government representatives 	For GEF supported projects, paid from IA fees and operational budget	Yearly
Dissemination of lessons learnt	<ul style="list-style-type: none"> Project Manager and team Local consultant 	Indicative cost: 5,000	At least three months before the end of the project
TOTAL indicative COST Excluding project team staff time and UNDP staff and travel expenses		Total: 132,000 approx. (mostly GEF funded, not including co-financing resources)	


PART III: APPROVAL/ENDORSEMENT BY GEF OPERATIONAL FOCAL POINT AND GEF AGENCY

RECORD OF ENDORSEMENT OF GEF OPERATIONAL FOCAL POINT(S) ON BEHALF OF THE GOVERNMENT:

NAME	POSITION	MINISTRY	DATE (MM/dd/yyyy)
Mr. Rickardo WARD	GEF Operational Focal Point	MINISTRY OF ENVIRONMENT, WATER RESOURCES AND DRAINAGE	07/12/2013

B. GEF AGENCY CERTIFICATION

This request has been prepared in accordance with GEF/LDCF/SCCF/NPIF policies and procedures and meets the GEF/LDCF/SCCF/NPIF criteria for CEO endorsement/approval of project.

Agency Coordinator, Agency Name	Signature	Date (Month, day, year)	Project Contact Person	Telephone	Email Address
Adriana Dinu UNDP – GEF Executive Coordinator		March 10, 2016	Oliver Page Regional Technical Advisor, EITT	+5073024751	oliver.page@undp.org

ANNEX A: PROJECT RESULTS FRAMEWORK

Primary applicable Key Environment and Sustainable Development Key Result Area (same as that on the cover page, circle one): 1. Mainstreaming environment and energy OR 2. Catalyzing environmental finance OR 3. Promote climate change adaptation OR 4. Expanding access to environmental and energy services for the poor.					
Applicable GEF Strategic Objective and Program: GEF-5 CC4 Strategic Program SP3: Increased production of renewable energy in electricity grids					
Applicable GEF Expected Outcomes: Total avoided GHG emissions from on-grid RE electricity generation					
Applicable GEF Outcome Indicators: Market penetration of on-grid renewable energy (% from renewables); GHG emissions from electricity generation (tons CO _{2eq} /kWh); and \$/ tons CO _{2eq}					
	Indicator	Baseline	Targets End of Project	Source of verification	Assumptions
Project Objective: ¹⁰ The removal of the policy, technical and financial barriers to energy-efficient applications and solar photovoltaic technologies in Dominica's streets, outdoor areas and public buildings nationwide, initially targeting up to 5 communities including Dubuc, Boetica, Roseau, Portsmouth, for further scale up	<ul style="list-style-type: none"> Cumulative direct and total post project direct CO₂ emission reductions resulting from the Project support for outdoor EE lighting and solar PV pilot installations and investments in tonnes CO₂. 	<ul style="list-style-type: none"> 0 	<ul style="list-style-type: none"> 889 100,010¹¹ 	<ul style="list-style-type: none"> Project final report as well as annual surveys of energy consumption & reductions for each project where RE and EE measures have been undertaken Government electricity bills for specific buildings where RE and EE measures undertaken 	<ul style="list-style-type: none"> Government capacity is available to support more diversified EE and RE development and utilization beyond geothermal development
	<ul style="list-style-type: none"> Total MWh of renewable energy generated by EOP 	<ul style="list-style-type: none"> 0 	<ul style="list-style-type: none"> RE- 683 MWh 		
	<ul style="list-style-type: none"> Total MWh of energy saved from installation of LED lights 	<ul style="list-style-type: none"> 0 	<ul style="list-style-type: none"> EE – 14.3 MWh 		
	<ul style="list-style-type: none"> % reduction in electricity costs in public buildings from RE and EE measures by EOP 	<ul style="list-style-type: none"> 0 	<ul style="list-style-type: none"> 10 		
	<ul style="list-style-type: none"> % of households and commercial establishments experiencing lower electricity costs from EE and RE installations by EOP 	<ul style="list-style-type: none"> 0 	<ul style="list-style-type: none"> 1 		

¹⁰ Objective (Atlas output) monitored quarterly ERBM and annually in APR/PIR

¹¹ Include the impact of GoCD co-financing that is added to CCTF at EOP (\$5.84 MW is expected to be installed in additional capacity in the 10 years following the EOP through the CCTF). See attached GEF spreadsheet for detailed calculations

<p>Outcome 1:¹² Improved knowledge, awareness and institutional capacity on EE applications and solar PV through demonstrations of their deployment in Dominica</p>	<ul style="list-style-type: none"> • Number of studies for selected EE applications and RETs to be piloted through an EPC arrangement. • Number of pilot installation of EE applications and RE technologies with and without battery storage carried out. • Combined installed capacity of “scaled up investment” through CCTF in RE and EE applications 	<ul style="list-style-type: none"> • 0 • 0 • 0 	<ul style="list-style-type: none"> • 1 • 23 Solar PV installations w/battery 60 Solar PV installations w/o battery 18 units of outdoor LED street lights 700 units of public lighting in buildings • 365 kW of RE installations (PV and hydropower) and EE installations (mostly EE lighting) 	<ul style="list-style-type: none"> • Desk study on cost effectiveness of EE measures and RE technologies for Dominica. • Training evaluation feedback from parliamentarians, policymakers, architects, technicians • Reports on pilot EE and RE installations and their energy consumption and GHG emissions in comparison with baseline technologies • Draft of green building codes • Awareness raising survey 	<ul style="list-style-type: none"> • Government budgets for technical training for RE are replenished on an annual basis
---	--	---	--	---	---

¹² All outcomes monitored annually in the APR/PIR.

¹³ Break down of sub elements and individual projects/installations between RET not provided however, these projects are additive to above RET installations

Outcome 2: Uptake of EE applications and solar PV technology is promoted through adoption of new institutional arrangements, and policy and enforcement measures	<ul style="list-style-type: none"> Number of draft strategic plans and institutional arrangements developed Number of RE and EE technologies with mandatory MEPS by Year 2 Number of MoHE officers involved with the enforcement of MEPS and green building codes by EOP 	<ul style="list-style-type: none"> 0 0 	<ul style="list-style-type: none"> 1 3¹⁴ 6 	<ul style="list-style-type: none"> Drafts of institutional arrangements and strategic plan for EE and RE growth MEPS documentation Training evaluations by participants on MEPS and quality standards workshops 	<ul style="list-style-type: none"> Continued government support for legislative and regulatory reform to promote and accelerate RE development Capacity of government does not substantially delay approval of RE policies and RE projects
Outcome 3: Scaled-up EE applications and RET investments through implementation of newly proposed financial and institutional mechanisms	<ul style="list-style-type: none"> Cumulative number of commercial establishments and households accessing financial assistance from the CCTF by EOP Annual MWh of EE and RE measures planned or installed by EOP (based on combined total of 591 kW installed capacity during project period) Number of technicians who are employed in the installation and maintenance of EE and RE equipment by EOP 	<ul style="list-style-type: none"> 0 0 0 0 	<ul style="list-style-type: none"> 10 1778¹⁵ 20 – Installation jobs 60 – O&M jobs 	<ul style="list-style-type: none"> CCTF fund charter and fund design documentation Bankable documents with business plans for RE scaled-up projects along with applications for CCTF financing assistance EPC documents for local ESCO for the installation of EE and/or RE equipment Work inspection reports Plans for rooftop solar PV and/or mini hydropower installations Surveys of electricity consumption after completion of RE and EE installations 	<ul style="list-style-type: none"> Sufficient annual replenishment of RE development funds Capacity of government does not substantially delay approval of RE policies and RE projects
Outcome 4: Low carbon development is sustained through effective monitoring and evaluation	<ul style="list-style-type: none"> Number of monthly reports submitted by EOP Number of completed final evaluations completed by EOP 	<ul style="list-style-type: none"> 0 0 0 	<ul style="list-style-type: none"> 45 1 1 	<ul style="list-style-type: none"> Submission of monthly and quarterly reports as well as PIRs Completed final evaluation report 	<ul style="list-style-type: none"> Continued government support for low carbon development throughout the duration of the Project.

¹⁴ Solar PV, hydropower installations and LED lighting

¹⁵ Based on MWh generated of RE and EE (1748 MWh) and LED lighting (30 MWh) by 2019

ANNEX B: RESPONSES TO PROJECT REVIEWS (from GEF Secretariat and GEF Agencies, and Responses to Comments from Council at work program inclusion and the Convention Secretariat and STAP at PIF).

(i) GEF Secretariat – June 10, 2014

Q#	Comment	Response
25	<p>Items to consider at CEO endorsement/approval.</p> <p>1. For Question (Box) No. 5, details are expected on (i) the potential share of emissions from the selected technologies and sectors, and (ii) the cost of the proposed technologies compared to the existing alternatives.</p>	<p>1. (i) the emission reduction calculations from the selected technologies are provided in Annex II of the ProDoc. Solar PV will likely be the selected technology due to the simplicity of setting up solar PV relative to other RETs such as small hydro and wind energy which have substantial land requirements; solar PV can be setup on the rooftops of buildings and houses; (ii) the cost of setting up solar PV is provided in footnote 13 on pg 18 of the ProDoc</p>
	<p>2. For Question (Box) No. 7, By CEO endorsement, the project proposal is expected to detail (i) what co-financing will be available for EE appliance activities, (ii) how the co-financing will be used to cover the entire country, (iii) what form the economic and fiscal instruments will take, (iv) what activities the project will implement to ensure that the incentives and subsidies set in place by the project can be sustained beyond project completion, (v) how the instruments developed under component 3 will be used for demonstration supported under component 1, and (vi) what mechanism the project will support to incentivize private banks in developing lending that they may consider more risky than other ventures. The full project proposal is also expected to consider ways to assess the remaining need for incentives before the end of the project and how to deal with them. It is finally expected that the project activities and their replication will not be based on overly optimistic assumptions on how demonstration examples may lead to behavior changes among stakeholders.</p>	<p>2. (i) Co-financing to be availed for EE appliances will be from the GoCD co-financing of USD 4.5 million through the CCTF, a fund designed to accelerate the scale-up of the use of RETs and EE appliances throughout Dominica. There will also be USD 0.5 million of co-financing available from EMS Limited, the local ESCO based in Dominica who will be setting up EPCs with various government agencies and private households. While EMS has a stated interest in encouraging EE appliances, the majority of co-financing will likely be allocated to the development of solar PV installations as a quick means of replacing the lost 6.2 MW of hydropower generation capacity from Tropical Storm Erika in August 2015;</p> <p>(ii) Once the initial GEF contribution to the CCTF of USD 250,000 has been used to setup pilot operations and disbursements for RET and EE developmental costs, partial loan finance and partial loan guarantees, GoCD's co-financing contribution of USD 4.5 million will be added to the CCTF. All Dominican communities and households as well as commercial and industrial enterprises will be eligible for technical assistance and financing of RET and EE equipment deployment from the CCTF;</p> <p>(iii) The CCTF will be setup as a revolving fund where funds will be used for technical assistance, partial loan finance and partial loan guarantees to setup RET and EE projects. There will be CCTF Project officers who will undertake MRV activities to monitor low carbon development's and measure reductions in electricity consumption which will serve as a basis of repayment of technical assistance and partial loan finance back into the CCTF;</p> <p>(iv) The incentives for sustaining the transformation towards low carbon technologies will be lower electricity prices and minimizing up front development and capital costs to households and commercial establishments. Stakeholder consultations revealed overwhelmingly that lower electricity prices was the top priority and that a CCTF will serve to sustain the migration to low carbon technologies;</p> <p>(v) As detailed in Outputs 1.1 and 1.2, pilot RETs and EE applications will be designed and implemented with assistance of the Project resources. The deployment of a Dominican-based ESCO will be undertaken to setup an EPC for the pilot installation of solar PV for electricity generation for government</p>

		<p>and public buildings in Dominica. The ESCO will undertake the energy audits for the basis of remuneration, which will be shared with the Government for the purposes of demonstrating the financial viability of RETs and EE applications deployed.</p> <p>(vi) The demonstration of energy savings through the pilot RETs and EE applications under Output 1.2 should provide tangible proof of the viability and risks undertaken by the ESCO. In addition, the successful operation of the CCTF under Output 3.2 and scale-up of RETs and EE applications under Output 3.3 should provide tangible information of the financial viability of RETs and EE applications to private banks and financial institutions in Dominica.</p>
	3. For Questions (Box) 13, details are expected on the costs/benefits of solar PV and EE products and the existing electricity price.	3. See Comment 1. (ii) above.
	4. For Question (Box) 16, more requests or comments for the co-financing may be provided to the GEF Sec in the CEO Endorsement Stage when costs/co-financing instruments are clear.	4. Co-financing details are provided in Table 7 on pg 60 of the ProDoc.
	5. Please add one more component: Monitoring and Evaluation in Table B Indicative Project Framework.	5. Component 4 for Monitoring and Evaluation of the Project has been added to the Project Framework.
	6. Please identify the co-financing from "others". In the PIF, \$100,000 in-kind co-financing from "others" has not been identified	6. Co-financing details are provided in Table 7 on pg 60 of the ProDoc.

(ii) Scientific and Technical Advisory Panel (STAP) comments – no comments received.

ANNEX C: STATUS OF IMPLEMENTATION OF PROJECT PREPARATION ACTIVITIES AND THE USE OF FUNDS¹⁶

A. PROVIDE DETAILED FUNDING AMOUNT OF THE PPG ACTIVITIES FINANCING STATUS IN THE TABLE BELOW:

PPG Grant Approved at PIF: USD 100,000			
<i>Project Preparation Activities Implemented</i>	<i>GEF/LDCF/SCCF/NPIF Amount (\$)</i>		
	<i>Budgeted Amount</i>	<i>Amount Spent To date</i>	<i>Amount Committed</i>
Technical review (Baseline analysis of the regulatory framework, policy, technology and market)	40,015	40,015	0
Project design and project document preparation including institutional arrangements, monitoring and evaluation	42,566	42,566	0
Financial planning and co-financing investments (Stake holder analysis and capacity needs assessment, co-financing commitment letters)	11,325	11,325	0
Stakeholders consultation and validation workshops	6,094	6,094	0
Total	100,000	100,000	0

The PPG phase of the project achieved its main outcome of developing a Medium-Size Project Proposal for submission to GEF.

ANNEX D: CALENDAR OF EXPECTED REFLOWS:

NA

¹⁶ If at CEO Endorsement, the PPG activities have not been completed and there is a balance of unspent fund, Agencies can continue undertake the activities up to one year of project start. No later than one year from start of project implementation, Agencies should report this table to the GEF Secretariat on the completion of PPG activities and the amount spent for the activities.