## Terms of Reference (ToR)

# **Technology Needs Assessment: Jamaica**

# **Assistant TNA Coordinator Consultant**

## 1 Background

Technology transfer has been under focus since the Rio Summit in 1992, where issues related to technology transfer were included in Agenda 21 as well as in Articles 4.3, 4.5 and 4.7 of the UNFCCC Convention. These were subsequently discussed in COP 1 in Berlin and COP 4 in Buenos Aires with Decision 2/ CP4 requiring GEF to provide funding to developing country Parties to enable them identify and submit to the COP, their prioritised technology needs, especially as concerns key technologies needed in particular sectors of their national economies conducive to addressing climate change and minimising its adverse effects. Following this, GEF provided funding to 92 countries between 2000 and 2004 for the first round of Technology Needs Assessments (TNAs). Based on a COP 13 request, the GEF proposed the Poznan Strategic Program on Technology Transfer, which was endorsed by COP 14. It consists of three funding windows; (i) technology needs assessments (TNAs); (ii) piloting priority technology projects; and (iii) dissemination of successfully demonstrated technologies.

In 2009, TNAs commenced in 36 developing countries and was successfully concluded in April 2013. In 2014, another 25 countries joined the TNA project to carry out new or improved TNAs within the framework of the UNFCCC. In April 2018, the GEF approved another round of TNAs including 23 countries, mainly being Least Developed Countries and Small Island Developing States.

The TNAs involve amongst others in-depth analysis and prioritisation of technologies, analysis of potential barriers hindering the transfer of prioritised technologies as well as issues related to potential market opportunities at the national level. National Technology Action Plans (TAPs) agreed by all stakeholders at the country level were also prepared consistently with both domestic and global objectives. Each TAP, which outlines essential elements of an enabling framework for technology transfer consisting of market development measures, institutional, regulatory and financial measures, and human and institutional capacity development requirements, will also include a detailed plan of action to implement the proposed policy measures and estimate the need for external assistance to cover additional implementation costs. Thus, the detailed plan of action will serve as the base for the subsequent preparation of fundable project ideas.

Targeted training and supporting materials related to methodology for prioritisation of technologies, market assessment, access and links to data on technologies will be provided to all participating countries. Experiences gained during the project implementation will be shared amongst participating countries to enhance cross-country learning. The main objectives of the project are:

- 1. To identify and prioritize through country-driven participatory processes, technologies that can contribute to mitigation and adaptation goals of the participant countries, while meeting their national sustainable development goals and priorities (TNA).
- 2. To identify barriers hindering the acquisition, deployment, and diffusion of prioritized technologies.
- 3. To develop Technology Action Plans (TAP) specifying activities and enabling frameworks to overcome the barriers and facilitate the transfer, adoption, and diffusion of selected technologies in the participant countries.

An Assistant TNA Coordinator Consultant (ATCC) is being recruited for the duration of the project to execute and also supervise the implementation of activities under the TNA project. He/She will be required to coordinate and facilitate the implementation of the project, reporting to the Climate Change Division of the Ministry of Economic Growth and Job Creation (MEGJC).

There is a TNA explanatory note on the institutional arrangements. These arrangements are generally and adapted to the specific country conditions and context, resulting in an appropriate national TNA institutional structure. The essential elements of the institutional arrangement within the country include a National TNA Committee, Sectoral / Technology workgroups, National Consultants /Experts and a TNA Coordinator.

A TNA Steering Committee may be set up to provide guidance for acceptance and final recommendations for consideration/approval at Ministry and Governmental level to the TNA process/outcome. The Steering Committee should be made up of high-level representatives from the institutions responsible for policy making related to the selected technologies with regard to both adaptation and mitigation.

The general and key tasks of the ATCC are described below.

## 2 General Tasks

The ATCC will work in close collaboration with the MEGJC, and the national TNA team. His/Her overall task is to support the entire TNA process – ranging from engaging with the stakeholders,

identification of technology needs, its prioritisation and assessment, to the development of national TAPs. In line with domestic and global objectives, the consultant will be responsible for providing the national TNA teams with the process-related and methodological/technical advisory services needed for conducting TNAs, preparing Barrier Analysis and Enabling Framework (BAEF) report and developing Technology Action Plans (TAPs) at the country level. The TAP will outline essential elements of an enabling framework for technology transfer consisting of market development measures, institutional, regulatory and financial measures, and human and institutional capacity development requirements. It will also include a detailed plan of actions in order to implement the proposed policy measures and estimate the need for external assistance to cover additional implementation costs.

The ATCC will support the MEGJC in applying a participatory approach to the TNA process, involving a wide range of stakeholders while ensuring a multi-sector and multi-disciplinary scope. Moreover, the consult will be tasked with communicating on behalf of the MEGJC with the national TNA team members, outreach to stakeholders, and formation of networks, information acquisition, and coordination and communication of work products. In addition, his/her role will consist in assisting in the coordination and implementation of the project, in assuring the quality of products delivered by the adaptation and mitigation experts and in drafting and editing planned reports in the framework of the project.

In collaboration with the national TNA team, the MEGJC and the TNA Mitigation and Adaptation Expert Consultants, the ATCC will be responsible for the timely provision of inputs and delivery related to the Key Tasks listed in section 3, assuming that tasks 1 and 2 have already been completed.

The ATCC will be required to follow best practices, guidelines, methodologies and technical guidance available through the UDP and other approved sources.

Section 3, below, provides an overview of the Key Tasks to be conducted by the ATCC.

# 3 Key Tasks

	Tasks	Deliverables	Timeframe	Additional Remarks
1.	Support identification of priority technologies for mitigation and adaptation in the prioritised sectors Review of the existent national documents (e.g. NDC, NAP, National Communications, Energy plans, previous TNA, NES, NEP, NEAP, etc.).	Portfolio of technologies for mitigation and adaptation	As per work plan	completed
	<ul> <li>In close collaboration with the TNA team, the Assistant TNA Coordinator consultant will support the mitigation and adaptation expert consultants in the following:</li> <li>based on the sectors selected, the constitution of working groups consisting of technical experts and practitioners within each of these sectors.</li> <li>through a participatory process, the identification of relevant mitigation and adaptation technologies.</li> <li>based on a multi-criteria analysis, the prioritization of the selected technologies.</li> </ul>			
2.	Validation of the reports on priority technologies (TNA reports) The mitigation and adaptation expert consultants will prepare TNA reports on priority technologies and submit these to the Assistant TNA Coordinator. The Assistant TNA Coordinator consultant should ensure that the TNA reports will be validated by the Climate Change Division and the TNA team through workshop, as well as the TNA Steering Committee.	TNA report, containing a prioritized list of technologies for mitigation and adaptation and describing the process followed, based on format agreed for the project	As per work plan	completed
3.	Support development of Barrier Analysis and Enabling Framework report (BAEF) Supervise and support the works of adaptation and mitigation experts in the evaluation of the market, the analysis of barriers	BAEF report for the deployment and diffusion of priority technologies, based	As per work plan	Outline for TNA report shared by UDP at the TNA 2nd regional capacity building workshop.

	Tasks	Deliverables	Timeframe	Additional Remarks
	<ul> <li>and the identification of enabling frameworks for the</li> <li>development, deployment and diffusion of priority technologies.</li> <li>Support and overview the work of the adaptation and mitigation experts in the analysis of the evaluation of the barriers to development, deployment and diffusion of priority technologies and of advantageous frameworks to overcome obstacles identified for identified technologies.</li> <li>Assure that products delivered by the mitigation and adaptation experts are homogeneous and correspondent to requests of the TAPs.</li> <li>Assure the quality of products delivered by the mitigation and adaptation experts.</li> </ul>	on format agreed for the project.		The Assistant TNA Coordinator consultant and experts will be required to participate in a capacity-building workshop in the field of market barriers analysis and of the development of an advantageous framework.
4.	Support development of Technology Action Plans (TAPs)Based on the work previously delivered by the adaptation and mitigation experts, the consultant, with the assistance of the TNA committee, will support consultants in developing TAPs for deployment and diffusion of prioritised technologies in the country.The TAP will be validated in a workshop and approved at the level of the TNA Steering Committee, following its finalisation with relevant inputs of stakeholders incorporated.	TAPs for each prioritised technology based on format agreed for the project	As per work plan	Template for the TAP will be shared by UDP with the Assistant TNA Coordinator consultant and the mitigation and adaptation experts at the regional capacity-building workshop.

	Tasks	Deliverables	Timeframe	Additional Remarks
5.	Support development of sector advocacy and policy briefs (one per sector) and organise dissemination event	One policy brief per sector.	As per work plan	
	Based on the work previously delivered in the TNA project, the Assistant TNA Coordinator consultant will	Dissemination event report.		
	<ul> <li>support the adaptation and mitigation experts in preparing targeted briefs and facilitate their dissemination</li> <li>disseminate the briefs to the relevant stakeholders</li> <li>in collaboration with the MEGJC, organise one national TNA dissemination and donor engagement event</li> </ul>			

## 4 Basic Documents

- Step-by-step guide for countries conducting a Technology Needs Assessment (UDP, 2015)
- Hands-on guidance to multi criteria analysis (MCA) and the identification and assessment of related criteria. Available for adaptation and mitigation respectively (UDP, 2015)
- Barrier and enabling frameworks guidebook (UDP, 2015)
- Enhanced implementation of Technology Action Plans (TAPs) guidance (UNFCCC and UDP, 2017)
- Good practices for the evaluation of technological needs (report of UNFCCC workshop, 2007)
- NDC, National Communications, Energy plans, NAP, etc.

## 5 Qualifications

The ATCC should possess the following qualifications:

- a) At least a postgraduate degree in environmental management or climate-related fields
- b) Solid work experience in environment or climate change mitigation and adaptation-related fields
- c) Strong experience with the local context of the country and well established local networks

## 6 Profile and Skills

The ATCC should have strong inter-personal and verbal communication skills, good coordination and facilitation skills, and possess proven analytical capabilities, as well as excellent writing skills. The ATCC should have good knowledge of - and experience with - climate change strategies, technologies and policies at the national level. More specifically he/she should be familiar with national development objectives and sector policies, have overall insights in climate change science, and potential climate change impacts, as well as mitigation and adaptation needs for the country.

## 7 Working Arrangement

The ATCC will be contracted directly by the UNEP DTU Partnership (UDP) on a part-time basis, and will be required to be available for the performance of the tasks and delivery of the required outputs. He /She will be required to be available for the timely delivery of milestones relevant to the specified tasks over the duration of the project, as required by UWI and the MEGJC.

#### 8 Selection Process and selection criteria

The selection will be carried out by UWI and UDP, based on criteria such as relevant qualifications, experiences, skills, contributions on climate change adaptation, national and international development objectives and sector policies, and understanding of the methodological approach to the assignment. Lastly, the consultant needs to have a good understanding of local context and well-established networks in the country.

#### 9 Language

All working papers, draft reports and Final Report should be prepared and submitted in soft copies in English.

#### **10** Intellectual Property Rights

All information, results and products, whether tangible or intangible, resulting from the project will be considered as the property of the national TNA coordinating entity, and the UNEP DTU Partnership.

#### ANNEX I: Global TNA Workplan

Act.	Activity										
no.		1				2				3	
	Project Implementation Year			T _							
	Month	June '18- Aug '18	Sept '18 - Nov '18	Dec '18 - Feb '19	Mar '19 - May '19	June '19-Aug '19	Sept '19 - Nov '19	Dec '19 - Feb '20	Mar '20 - May '20	June '20-Aug '20	Sept '20 - Nov '20
	Start date June 2018										
4.1	Appoint a TNA Coordinator	_									
	Select Sectors										
4.2	Identify roster of consultants										
	Identify working groups	-									
4.4	Inception mission, including national workshop	_									
	Develop a detailed draft work plan										
4.6	Select and contract national consultants     Hold National Inception Workshop										
4.7	Participate in Global Workshop										
	<ul><li>October 2018</li><li>August 2020</li></ul>		-							-	
	Participate in Regional Capacity Building workshops										
	January 2019				•						
	August 2019					•					
	• April 2020								•		

4.8	Prioritise technologies						
	Finalise the prioritised technologies report (TNA report)						
4.9	Identify barriers and develop an Enabling Framework for transfer, deployment and diffusion of prioritised technologies						
	(a) Finalise the BA&EF report				-		
4.10	Preparation of TAP + project ideas report						
4.11	Seek political endorsement and integration of the TAP into national energy policy/ development plans						
	Finalise TAP + project ideas report						
4.12	Develop sector policy briefs					_	
4.13	National round table event					-	
4.14	Develop project concept						
4.15	Prepare and implement launching workshop						_
4.16	Prepare and submit the Final Report						

#### Milestones

Sr. No.	Milestone	Scheduled Date			
	Award of Project by GEF	April 2018			
1.	Project start date	June 2018			
2.	Completion of Project	November 2020			
3.	Agreement with countries signed after country consultations and work plan finalisation.	July-September 2018			
4.	Capacity Building Workshops				
	Technology identification and prioritization	February-March 2019			
	Barrier analysis and identification of enabling frameworks	August 2019			
	Technology action plans and project ideas	April 2020			
5.	Global kick-off & Experience Sharing Workshops				
	Kick-off workshop	October 2018			
	Experience sharing workshops	August 2020			
6.	Release of TNA Reports	September 2019			
7.	Release of BAEF reports	March 2020			
8.	Release of TAPs	August 2020			
9.	Final Country Report submissions	November 2020			