



Caribbean Centre for Renewable Energy and Energy Efficiency (CCREEE)

Call for Expressions of Interest for a Pool of Consultants

Date: January 2022

Table of Contents

1.0 Purpose of the Call for Expressions of Interest	3
1.1 Invitation to Respondents.....	3
1.2 Objective of the Call for EOI	3
1.3 CARICOM’s Energy Context	3
1.4 About CCREEE	4
2.0 Terms of Reference (TOR).....	5
2.1 Objective	5
2.2 Scope of Works.....	6
Group A: Project Development.....	7
Group B: Power System Expansion Planning	7
Group C: Capacity Building	7
2.3 Engagement Process	8
2.4 Timeframe	8
3.0 EOI Requirements.....	9
3.1 Qualifications and Experience	9
3.2 Criteria for Assessment	10
3.3 Application Documents and Format	10
4.0 Instructions for Responding	11
4.1 EOI Contact.....	11
4.2 Submission Delivery Requirement.....	11
4.3 EOI Timeline	11
5.0 Other Terms and Conditions	11

1.0 Purpose of the Call for Expressions of Interest

1.1 Invitation to Respondents

This call for expressions of interest (EOI) is a solicitation by the Caribbean Centre for Renewable Energy and Energy Efficiency (CCREEE) for qualified individuals or firms to submit applications for the Centre's pool of consultants.

1.2 Objective of the Call for EOI

The primary objective of this call for EOI is to establish a pool of regional consultants to provide quality on-demand, short-term technical interventions under the CCREEE's technical assistance programmes for project development and energy systems planning across the Caribbean Community (CARICOM) and the wider Caribbean region. Expert consultants will support the CCREEE mission and ensure the Centre can deliver timely technical services to its Member States et al, as required, to support their objectives.

1.3 CARICOM's Energy Context

The 15 Member States of the CARICOM are mostly Small Island Developing States (SIDS): Antigua and Barbuda, Bahamas, Barbados, Belize, Dominica, Grenada, Guyana, Haiti, Jamaica, Montserrat, St. Kitts and Nevis, St. Lucia, St. Vincent and the Grenadines, Suriname, and Trinidad and Tobago. The countries collectively exhibit unique characteristics, including varying topographies, limited or absent natural resources, relatively small populations, and fragmented energy markets with limited diversification in their supply. Consequently, CARICOM Member States share many common energy challenges, inter alia:

1. With the exception of Trinidad and Tobago, high dependence on imported fossil fuels to meet their energy demand
2. High vulnerability to the effects of climate change
3. Increasing electricity consumption and a widening demand-supply gap, especially in many urban areas
4. Limited access to modern, reliable and affordable energy services in some countries, such as the rural areas in Haiti, and hinterland regions of Guyana, Suriname, and Belize
5. Despite the abundance of options for solar, wind, hydro and geothermal power, low penetration of renewable energy into their energy systems
6. High unexploited energy efficiency potential with low energy efficiency in power generation, transmission, distribution, and end use
7. Power market structures that are under-regulated and lacking diversity on account of single vertically integrated utilities with monopoly control over generation, transmission, and distribution of electricity in a majority of the countries
8. Market failures for clean energy (renewable energy and energy efficiency) technologies within the region, owing to distortions within the markets that have not supported the enabling of an environment that is capable of supporting country level strategies on sustainable energy
9. Lack of a quality infrastructure (codes, standards, and regulations) for small renewable energy technologies (such as solar PV and solar water heating) and energy consuming devices (such as appliances and industrial equipment) in many countries
10. Relatively high electricity prices that represent a burden for the economy on the whole, as well as eroding the competitiveness of the productive sectors and limiting the availability of disposable income for the domestic and public sectors in the region

Based on the aforementioned, it becomes apparent that increasing sustainable energy production, delivery, and use, through renewable energy applications and energy efficiency measures, can provide powerful opportunities for CARICOM Member States to reduce their fuel consumption and thus improve energy security, lessen dependence on imported fuels, reduce electricity prices, promote clean economic growth, and improve the quality of life for citizens. Critically too, it allows the region to take action toward the mitigation of greenhouse gas emissions and can provide a basis for improving the resilience of key sectors to the effects of climate change.

1.4 About CCREEE

The CCREEE is an institution of CARICOM tasked as the implementation hub for sustainable energy. The Centre was operationalized in 2018 as part of the Global Network for Regional Sustainable Energy Centers (GN-SEC) in response to the needs of energy stakeholders in CARICOM Member States. A stakeholder analysis led by the SIDS Sustainable Energy and Climate Resilience (SIDS DOCK), the United Nations Industrial Development Organization (UNIDO), and the CARICOM Energy Unit revealed that CARICOM Member States need assistance implementing their policy commitments and capitalizing on the growing sustainable energy market.

On this basis, the CCREEE endeavors to address the many challenges the Caribbean energy sector faces by promoting renewable energy and energy efficiency investments, markets, and industries in the region. Through its seven strategic programmes, the CCREEE seeks to fulfill its vision of “Transforming the energy landscape into a climate resilient, sustainable and affordable sector; focused on improving the lives of our people”.



At times technical assistance services are required to support the Centre’s initiatives within each of its strategic programmes. The required services range from renewable energy and energy efficiency project development, utility systems expansion planning, and capacity building within these areas. The needed

technical assistance will particularly serve the CCREEE's strategic programmes which are embedded in the three strategic pillars, namely: the Project Preparation Facility (PPF), the Integrated Resource and Resilience Planning (IRRP), and the CARICOM Energy Knowledge Hub (CEKH).

Project Preparation Facility (PPF)

The PPF was established in November 2020 to provide a solution to the region's challenges with project development and financing. The CCREEE conducted a Project Preparation Needs Assessment which demonstrated that CARICOM's project deployment rates have struggled due to the need of appropriate financing mechanisms to match renewable energy and energy efficiency projects, expertise to prepare project development documentation, technical human capacity, mobilization of the private sector, and development of pilot projects among other things. The PPF aims to meet these needs by providing project development support in the form of technical assistance, advisory services, and by matching projects with the most appropriate investor and/or finance mechanism. Through these actions, the Facility endeavors to foster a robust pipeline of private and public sector sustainable energy projects in CARICOM.

Integrated Resource and Resilience Planning (IRRP)

The IRRP Programme, commenced in 2020, develops long-term, resilient, and least-regret resource expansion plans for regional electricity sectors that drive data collection, deliver insights on challenges and opportunities, aid decision-making, generate short-term action plans, and are vehicles for capacity-building. The IRRP methodology employs several models to analyse electricity demand and the power system through engagement with national ministries, utilities, regulators, and other key stakeholders. Further, weather, climate and vulnerability models and maps are incorporated to enhance understanding of the risks to the system and how these may evolve over the study horizon.

CARICOM Energy Knowledge Hub (CEKH)

The CEKH which was officially launched in April 2021 makes hundreds of resources available to energy practitioners in one convenient location. The CEKH consists of five main applications:

- A community of practice of sustainable energy practitioners – this allows our stakeholders to benefit from the collective knowledge of the community via a discussion forum
- A document repository to ensure that energy practitioners have access to the best available information and knowledge to inform their decisions
- A learning management system which provides courses and webinars to enhance the capacity of practitioners within the energy space
- A GIS map viewer to provide visual representation of regional energy sector data
- Pathfinding to websites, publications, and databases of relevance to the regional energy sector

2.0 Terms of Reference (TOR)

2.1 Objective

The overall objective of the pool of experts is to provide professional, on-demand, technical consulting services in renewable energy and energy efficiency project development, energy planning, power sector

planning, and related areas for project developers, project beneficiaries, policymakers, regulators, utilities, energy providers or other relevant groups within the Caribbean. These services will be provided through the CCREEE.

The specific objectives of the consulting pool are:

1. To deliver technical assistance to selected public and private sector entities in CARICOM Member States in need of sustainable energy project development support
2. To support electric utility system expansion planning processes including, inter alia, grid modelling exercises
3. To support capacity building to selected public and statutory national energy institutions with responsibility for energy policy, energy planning and energy sector regulation as well as key private sector groups through knowledge transfer via the provision of technical trainings and workshops

2.2 Scope of Works

The pool of experts will provide a source of quality expertise in several areas, which will largely depend on the identified needs and will be provided based on demand. The technical support will be provided in an array of technical areas. Consultants in each of the areas, shown below, are needed.

- **Renewable Energy:**
 - Biomass
 - Geothermal
 - Ocean
 - Biogas
 - Biofuels
 - Waste to energy
 - Solar PV
 - Solar thermal
 - Wind
 - Hydropower
- **Energy Efficiency**
- **Nexus Applications**
 - Water
 - Health
 - Agriculture
 - Food processing
 - Sustainable buildings
 - E-mobility
 - Heating and Cooling

The services which the pool of consultants provide in these technical areas will reside in the following groups:

- Group A: Project Development
- Group B: Power Systems Expansion Planning
- Group C: Capacity Building

Based on the aforementioned areas, the pool of experts may be expected to conduct the following typical tasks and activities depending on the demands. The list of tasks and activities is not exhaustive. For each

project, specific objectives, tasks, and deliverables will be outlined in a dedicated TOR and will be agreed upon prior to commencement of the activities. The duration of activities will be determined in each TOR for the specific project.

Group A: Project Development

It is envisioned that project development support within Group A will largely be provided for the CCREEE PPF projects. The PPF serves a range of renewable energy and energy efficiency projects at various stages (from pre-feasibility to financial close). The Facility therefore offers a broad cross section of services:

- Business plan refinement
- Financial modelling and documentation
- Feasibility studies
- Resource assessments/studies
- Environmental and social impact assessments
- Gender assessments
- Finance structuring
- Due diligence facilitation
- Deal flow management
- Energy audits
- Energy management
- Demand-side reduction programme development

The Facility serves both public sector and private sector applicants ranging from small and medium sized enterprises to large corporations. The PPF also supports projects from NGOs and mixed capital entities (private and public). Consultants with experience in the services outlined within these entities are therefore required.

Group B: Power System Expansion Planning

Power system expansion planning services will be primarily provided to utilities, but also to project developers. Services in Group B link directly with the CCREEE's IRRP programme and will be delivered in close collaboration with the work being done.

- Grid-integration and interconnection requirements/processes for renewable energy technologies and other technologies; design and development of interconnection agreements
- Grid modelling services/ grid infusion studies for energy planning and to inform the revision of national energy targets and the development of a grid code
- Assessments of electric mobility and electric vehicle charging infrastructure and associated costs for increased deployment
- Assessment of smart grid infrastructure required to maximise potential of demand-side management, vehicle to grid and other grid services

Group C: Capacity Building

Supporting and strengthening the capacity of local project developers, financial institutions, regulators, policy makers, utility personnel and other energy institutions through workshops, training, seminars and any other established means for capacity development is imperative. Such action decreases knowledge

gaps, facilitates knowledge and skills transfer, and enhances the capacity of national institutions to carry out their functions. Capacity building will be integrated in Groups A and B through the CEKH and will include:

Group A: Project Development

- Workshop, training, or seminars for project developers and beneficiaries to build renewable energy and energy efficiency project development skills for various technologies.
- Workshop, training, or seminars for financial institutions to build renewable energy and energy efficiency project assessment skills for various technologies.

Group B: Power System Expansion Planning

- Workshop, training or seminar for utility personnel on grid and energy system modelling for grid expansion plans; effective PPA negotiations and agreements.

2.3 Engagement Process

Technical assistance in the thematic areas outlined will be provided through a consultancy framework agreement between a consultant and the CCREEE. The TOR outlined above fundamentally refers to the type of technical assistance to be provided through framework agreements to selected CARICOM Member States. In response to an identified need, opportunity, or request, experts from the pool of consultants will be requested. Experts will be engaged based on the specific demand for technical assistance that best matches their demonstrated expertise.

TORs for each assignment will be developed or conveyed to potential consultants, as appropriate. The TOR will describe in detail the expertise required for execution of the assignment, the nature of the technical assistance request, the expected/anticipated timelines for commencement and completion, duration of the assignment, location, expected outputs and deliverables, reporting, logistical support if necessary and the proposed budget.

In response to the TOR and relevant project details, the consultant will be expected to confirm his/her desire to undertake the assignment. Following this they will be required to submit a schedule of availability, provide a work breakdown schedule, and confirm proposed rates. It is expected that the consultant/s will respond to the TOR calls/offers within two business days.

The CCREEE will select the appropriate consultants to undertake the assignment based on a review of availability and cost estimates and proceed via established protocol.

Upon identification and approval of the candidate(s) for the assignment, the consultant must be deployed and/or the assignment must kick-off no later than 14 business days after official notification is received or on the dates specified in the relevant TOR.

2.4 Timeframe

Selected consultants from the respondents to this request for EOI will be placed in a prequalified technical consultant pool for a period of three years: 01/01/2022 – 31/12/2024 . Within these three years the CCREEE will procure consultants based on the availability of project requests. The consultant/s will be subjected to periodic review over the valid period. In light of the foregoing, the pool of consultants will be updated periodically.

3.0 EOI Requirements

3.1 Qualifications and Experience

This call for EOIs is open to nationals of CARICOM Member States. However, non-CARICOM Member states Caribbean experts are welcome to apply but should demonstrate an affiliation with a CARICOM Member state expert. The call is open to both individuals and firms. Further, all consultants must have an excellent command of the English language (reading, writing, and speaking). Knowledge of French, Dutch, or/and Spanish would be considered an asset.

There are three consultant tiers applicants may apply to. Each level is associated with qualification and experience requirements. The table below depicts the consultant tiers and requirement descriptions.

Consultant Tier	Requirements
Junior Specialist	<ul style="list-style-type: none">• Minimum education qualification: Bachelor's degree in engineering, environmental management, energy systems, economics, sustainable development, social sciences, or other relevant fields to the service being applied for.• Years of experience providing the service: At least 3 years• Years of experience with technology: At least 3 years• Years of experience in the Caribbean context: At least 2 years
Specialist	<ul style="list-style-type: none">• Minimum education qualification: Master's degree* in engineering, environmental management, energy systems, economics, sustainable development, social sciences, or other relevant fields to the service being applied for.• Years of experience providing the service: At least 5 years• Years of experience with technology: At least 5 years• Years of experience in the Caribbean: At least 3 years
Senior Specialist	<ul style="list-style-type: none">• Minimum education qualification: At minimum master's degree in engineering, environmental management, energy systems, economics, sustainable development, social sciences, or other relevant fields to the service being applied for.• Years of experience providing service: At least 10 years• Years of experience with technology: At least 10 years• Years of experience in the Caribbean: At least 5 years

*For Specialists, in lieu of a Master's degree, a Bachelor's degree and 2 additional years of experience will be considered.

For team submissions, identified team leads should also display a minimum of 5 years leadership/management experience.

Soft Skills

In addition to their specialist qualifications, consultants are expected to have the following soft skills:

- Team skills
- Initiative
- Communication skills
- Sociocultural competence

- Efficient, partner and client-focused working methods
- Interdisciplinary thinking

Additional Requirements

In addition to their specialist qualifications and soft skills, the following are required of consultants:

- Ability to travel on short notice to conduct in-country site visits within the CARICOM region, where needed
- Ability to work in a multi-lingual, multi-cultural and multi-disciplinary team
- Ability and capability to work remotely

3.2 Criteria for Assessment

The following evaluation matrix will be used to assess EOIs:

Criteria	Score
Minimum education qualification met	10
Relevant experience with the service(s) indicated	20
Relevant experience with the technology(ies) indicated	20
Good knowledge of the Caribbean sustainable energy context	15
Submission presentation and professionalism	5
Maximum Score	70

3.3 Application Documents and Format

Interested candidates and/or teams are asked to submit a proposal, which includes the following:

- A motivation letter (maximum 2 pages):
 - Explaining your motivation for applying
 - Clearly indicating technology expertise, service offering(s) based on the groups outlined in the scope of works (Section 2.2), and consultant tier. Given the interlinkages between the service groups please indicate all which apply
 - Outlining your relevant experience, qualifications, and skills
- Proposal (maximum 5 pages):
 - Detailing the technology(ies) and service(s) you would like to be considered for in line with the groups indicated in the scope of works (Section 2.2)
 - Describing key project undertaken in the areas identified above, particularly in the Caribbean region
- A Curriculum Vitae (CV) or Résumé outlining the details of relevant experience, qualifications, achievements, and skills. CVs must clearly indicate the position and job the proposed person held in referenced projects and for how long (maximum four pages)
- Contact details for three (3) project references for whom you have performed similar work
- Any documents deemed to support your application (maximum 5 pages)

If proposing as a team, respondents must provide a clear overview of all proposed experts and their individual qualifications. The proposal must name the positions, tasks and qualifications for each team member as well as describing the composition of and interaction between the team members necessary to ensure the overall performance of the relevant activity types.

All components of proposal packages must be legible (font size 11 or larger), clearly formulated and drawn up in English.

4.0 Instructions for Responding

4.1 EOI Contact

For all purposes of the EOI process, queries and final submissions should be made to procurement@ccreee.org. Attempts at unofficial queries through officials and other staff members of the CCREEE for the purpose of influencing the outcome of this EOI will be cause for disqualification from further consideration.

4.2 Submission Delivery Requirement

All submissions must be completed in electronic form and made via e-mail. Submissions must be sent in pdf format only no later than 17:00 GMT/UTC-4 on **Friday, February 4, 2022**. The e-mail subject line to be used is "EOI- CCREEE Pool of Consultants". The submission must be duly signed and dated.

Only complete submissions which include all the required information by the deadline will be considered.

4.3 EOI Timeline

Please send any queries to procurement@ccreee.org by **Friday, January 21, 2022**. All questions should be as clear and concise as possible. Respondents are also expected to immediately notify the EOI contact via email of any discrepancies, ambiguities, errors, omissions, or other faults in any part of the EOI document, providing full details.

Responses to enquiries or amendments will be issued in written addenda prior to the final proposal submission deadline. Should there appear to be conflict between the EOI and any addenda issued, the last addendum issued shall prevail.

Upon revision of the submitted EOI, successful applicants will be contacted by **Friday, February 11, 2022** and provided with information on the next steps.

5.0 Other Terms and Conditions

1. Calls for Expressions of Interest under this process shall not be considered a formal offer of work by the CCREEE and can be canceled at any time
2. The consultant commits to not disclose confidential information, neither before, nor during, nor after the delivering of the service. Signing of a confidentiality agreement may be required
3. All results must be provided to the CCREEE in digital editable version and must follow prescribed corporate or other design standards specified by the CCREEE
4. Reasonable changes during an assignment will be agreed in writing in advance between the consultant and the responsible person within the CCREEE