



ORGANISATION OF EASTERN CARIBBEAN STATES

INVITATION FOR EXPRESSIONS OF INTEREST

**DEVELOPMENT OF DESIGN GUIDELINES FOR DISASTER-RESILIENT SCHOOLS
IN THE ORGANISATION OF EASTERN CARIBBEAN STATES (OECS)**

The Organisation of Eastern Caribbean States (OECS) Commission invites interested eligible Consulting Firms to submit Expressions of Interest for the provision of consultancy services for the ***Development of Design Guidelines for Disaster-Resilient Schools in the Organisation of Eastern Caribbean States (OECS)***.

The Terms of Reference and Guidelines for the Submission of Expressions of Interest for this consultancy are provided below.



Organization of Eastern Caribbean States

TERMS OF REFERENCE

DEVELOPMENT OF DESIGN GUIDELINES FOR DISASTER-RESILIENT SCHOOLS IN THE ORGANISATION OF EASTERN CARIBBEAN STATES (OECS)

1.0 Background:

Over the last few years, a number of Member States of the Organisation of Eastern Caribbean States (OECS) have been severely impacted by tropical cyclones and heavy rainfall events. In September 2017, alone, Anguilla, Antigua & Barbuda, the British Virgin Islands and the Commonwealth of Dominica all suffered loss of life and extensive damage and loss of both property and infrastructure with the passage of Hurricanes Irma and Maria.

In many instances, these extreme weather events have resulted in severe damage to schools. Further, even where schools have not experienced actual damage, they have been rendered inoperable for considerable periods due to, among others: temporary inaccessibility resulting from flooding, landslide or damage to roads and bridges; the deposition of sediment associated with flooding and delays in the restoration of interrupted power or water supply and use as emergency shelters, sometimes for long periods following the natural disaster.

Schools perform a number of critical roles in society. Aside from providing educational services, they serve as a safe haven for students who would otherwise have to be kept at home. They also serve as an avenue for positive dissipation and recreation for the youth through sports and other extra-curricular activities.

In the aftermath of a disaster, one of the key indicators of a return to normalcy and a critical avenue for reducing post-traumatic stress at a societal scale is the reopening of schools. Many of the schools in the respective Member States also serve as emergency shelters. For these reasons, it is important that, to the greatest extent possible, schools in the OECS are designed, sited and constructed to withstand hurricanes and other hazards and to be able to maintain or resume their critical functions in quick turnaround time during and after a hazard event.

In recognition of the increasing intensity of cyclones and other weather events, as a result of climate change, and bearing in mind the impact of recent storms on schools in the sub-region, one adaptation and resilience-building measure considered critical is the strengthening of existing and future schools to withstand Category 3 and higher hurricanes. In addition, it is considered necessary to increase the resilience, and limit the exposure of schools to hurricanes and tsunamis.

In that regard, the OECS Commission is seeking a highly qualified consultancy firm to undertake the development of guidelines for the construction of disaster resilient schools in the OECS. The firm is also expected to present the results of this work and to provide training for selected policy and technical staff in OECS Member States.

Objectives

The overall objective of this project is to develop best practice guidelines for planning, design, construction, retrofitting and business continuity of hazard-resilient schools in the OECS with particular focus on hurricanes (winds and floods), earthquakes and Tsunamis.

Specifically:

- Train and guide decision makers to improve the resilience of education facilities;
- Improve capacity of national authorities to support education authorities develop and/or revise school disaster management plan;
- Support the development of action plans for the development of resilient schools

2.1. Specific Tasks:

At a minimum, the consultancy firm will carry out the following tasks:

Task 1 – Engineering Design and Construction

a. Assess existing school structures including early childhood centers

Identify and assess existing data, information and guidelines in state-of-the-art Codes and Standards (including the OECS Building Code), relevant up-to-date technical studies, assessments and publications for the region, on wind speed and earthquake parameters and design information, and develop notes, recommendations and guidelines for best practice design, construction and retrofitting of schools.

The firm will take into consideration estimates of the corresponding increase in the gust wind speeds for given annual exceedance probabilities used in building codes and other up-to-date, reliable references, associated with the change in the future hurricane climate using information and climate-conditioned statistics on the estimated increase in future hurricane intensity and frequency.

b. Lessons learnt from 2017 Hurricanes

The firm shall also conduct an assessment of the schools in the region that have withstood the passage of the 2017 Hurricanes Irma and Maria (with particular focus on the Commonwealth of Dominica) with a view to identifying lessons learnt and best practices for the design and construction of hazard-resilient schools in the region. Design should consider the role of schools as hurricane shelters and community spaces.

Task 2 – Spatial Planning and Business Continuity

a. Spatial Planning Practices

The firm will develop guidelines and best practice recommendations for the locating and layout of schools to minimize risk associated with all potential hazards such as hurricanes (winds and floods), earthquakes, storm surge and tsunamis.

The firm will take into consideration (inter alia) state-of-the art physical development and spatial planning standards, existing hazard maps and other relevant information. Considerations must include issues of and recommendations for adequacy and resilience of access infrastructure (roads and bridges), the use of schools as emergency shelters and by the community for community development activities.

b. Business Continuity Considerations

The firm will develop guidelines and best practice recommendations for spatial planning, design, construction and retrofitting of school to support post-disaster business continuity, with particular consideration for water and energy availability, including through the use of water and solar harvesting and storage. The firm will also seek to develop a plan for the maintenance of the school stock.

Task 3 - Stakeholder Consultations

The Consultant shall engage key institutional, professional, academic, research and public stakeholders and interests with a view to collecting and reviewing considerations and recommendations. This will include a regional validation workshop with selected, representative participants.

Task 4 – Training and Pilot Assessments

The consultancy firm will conduct a two-day regional technical workshop in the Commonwealth of Dominica to present the results and provide a short training programme for regional engineers, architects and planners. The firm will be responsible for ensuring that the relevant technical expert(s) that developed the best practices and guidelines are available to present at the workshop.

The training will be so designed and executed to include pilot assessments of selected existing and proposed schools in Dominica with actual recommendations for retrofitting and amendments.

Task 5 – DRR Forum- Presentation of best practices and guidelines:

The deliverables will be a content / reports outlining:

1. The technical approach/methodology;

2. The various codes, standards, technical publications/studies, case studies, site visits, structural assessments and other references used in the analysis, including rationale/justification for selection of final parameters and recommendations;
3. The recommended guidelines and best practices for planning, design, construction, retrofitting and business continuity of hazard-resilient schools;
4. Associated drawings/schematics/illustrations for ease of (but technically sound) understanding, dissemination, training and application;
5. Recommendations for implementation, capacity building and compliance.
6. A report on the training workshop and results of pilot assessments.

Draft deliverables/reports will be reviewed by the OECS Commission and key stakeholders, and comments will be provided to the consultancy firm towards finalization. The guidelines are expected to serve as harmonized guidelines for the OECS.

3.0 Work Approach

The assignment will involve but not restricted to the conduct of interviews, focus group discussions, field visits and document analysis.

4.0 The Consultant

- (a) The Consultant shall take all the necessary steps to ensure that the entrusted task is executed properly and on schedule in accordance with the established terms of reference; and
- (b) Undertake to perform the task in accordance with the terms of reference and according to internationally accepted standards.

5.2 Executing Arrangements

- (a) The consultant will work under the direction of the Head of the Education Development Management Unit (EDMU), of the OECS Commission, who will be responsible for ensuring timely and quality delivery.
- (b) Technical Assistance will be led through the Disaster and Climate Management Unit with support from the EDMU, national focal points from the various Ministries of Education in participating territories.

6.0 REPORTING DELIVERABLES and DURATION

The Assignment is expected to be undertaken in 60 working days within the period March – August 2018. **The Consultant shall submit progress reports during project implementation at key points as agreed with the team from the Commission (EDMU and Disaster and Climate Change Units).** The consultant will be required to submit hard and digital copies, in English, of all reports and key deliverables outlined in the schedule of deliverables at 7.0 below:

7.0 SCHEDULE and DELIVERABLES

DELIVERABLES		DESCRIPTION	TIMEFRAME
I.	Report One : Work Schedule and methodology	Detailed methodology and work plan schedule	Apr. 2018
II.	Report Two: Report outlining lessons learnt	Assessment of Schools conducted to capture lessons learnt ,good practice and recommendations for consideration	May 2018
III.	Report Three : Guidelines for the locating and design of schools	Development of Engineering Guidelines standards for the design of schools	June 2018
IV.	Report Four : Regional Consultation Report	Consultation with key stakeholders for review and feedback on the considerations and recommendations.	June 2018
V.	Report Five : Training and Pilot Assessments	Two-day regional technical workshop to present the results and provide a short training programme	July 2018
VI.	Report : DRR Forum	Validation of Final reports, including the refined Guidelines and Standards	August 2018

8.0 QUALIFICATIONS AND EXPERIENCE:

The proposed activities shall be undertaken by a Consulting Firm with the following key experts and their corresponding qualifications. At least **one** of the experts must demonstrate specific expertise and experience in disaster risk management/planning considerations.

Team leader

The Lead Consultant will be the Team Leader and shall undertake the overall coordination of the team. It will be his/her responsibility to compile and present the various report(s) required under the contract. Minimum qualification required is:

- University Degree in Architecture or Engineering with at least ten years working experience in the profession.
- Proven experience of at least seven (7) years in project management.
- Experience in implementation of Institutional infrastructure projects would be an advantage.

Key Experts:

I. Civil Engineer

Education:

- Advanced degree in Civil Engineering with specialization in Structural/Civil Engineering
- Registered by the relevant professional registering body

Skills and knowledge: The consultant should demonstrate skill and knowledge of:

- Civil/structural engineering techniques.
- Planning and independently carrying out work requiring judgment in the evaluation, selection, application and adaptation of engineering techniques and procedures.

Work Experience:

- Minimum of 7 years of professional experience in the relevant field of civil engineering, especially in preparation of construction technical documentation, experience in the design, project management, or construction of modern structures.
- Experience in working in complex environments and large infrastructure and/or civil works, particularly in the field of construction technical project documentation development as well as construction supervision;
- Experience undertaking structural assessments

II. Architect

Education:

- Advanced Degree in Architecture and registered by the relevant professional bodies.

Skills and knowledge: The consultant should demonstrate skill and knowledge of:

- Civil/structural design techniques.

Work Experience:

- At least 7 years' experience in the design, project management, or construction of modern structures.
- Experience in technical design of high-rise structure would be an asset.
- Familiarity with the Caribbean

III. Physical Planner

Education:

- Advanced degree in Physical Planning or Physical Development with at least 5 years' experience in the urban development, project management, or construction of modern structures.

Skills and knowledge: The consultant should demonstrate skill and knowledge of:

- Physical Planning/development techniques.
- Planning and independently carrying out work requiring judgment in the evaluation, selection and location of public structures, techniques and procedures.

Work Experience:

- Minimum of five years of professional experience in the relevant field of physical planning, especially in preparation of construction technical documentation;
- Experience in working in complex environments and large infrastructure and/or civil works, particularly in the field of construction technical project documentation development as well as construction supervision;
- Experience undertaking structural assessments

Other Experts

IV. Education Professional (Education Planner)

Will work at the design stage to ensure that the design of infrastructure is optimally utilized and as per the educational requirements.

Education:

- Minimum master's degree in education/social science with at least 7 years of professional experience in the area of education.

The Firm in general should have:

- Not less than 7 years overall consulting experience, with expertise in at least 3 areas: Structural Engineering/Assessment, Civil Engineering, Spatial Planning, Physical Planning/Physical Development, Architecture, and Disaster Risk Management in tropical climate.
- Successfully completed at least one similar assignment
- An advantage will be given for experience in the following areas:
 - execution of socio-economic assessments,
 - environmental impact assessments
 - facilitation of stakeholder consultations
 - the use of participatory approaches.
 - knowledge of OECS Building Code

GUIDELINES FOR SUBMISSION OF EXPRESSIONS OF INTEREST

Consultancy for Development of Design Guidelines for Disaster-Resilient Schools in the Organisation of Eastern Caribbean States (OECS)

The Organization of Eastern Caribbean States (OECS) Commission through its Education Development Management Unit (EDMU) is seeking Expressions of Interest from Consultancy Firms for undertaking the *Development of Design Guidelines for Disaster-Resilient Schools in the Organisation of Eastern Caribbean States (OECS)*. The details of the services required are available in the Terms of Reference which is available on the official website: www.oecs.org.

It is expected that the services will commence in March, 2018 and be completed no later than July, 2015.

Firms wishing to signify their interest in undertaking the prescribed services are to submit an Expression of Interest providing information demonstrating that they have the required qualifications and relevant experience to perform the services. The information submitted should follow the layout indicated below:

1. Background Information including Articles of Incorporation
2. Information on the Firm's qualifications, experience and competence relevant to the assignment (description of similar assignments undertaken including dates undertaken and reference information of clients, availability of appropriate skills among proposed personnel/staff, etc.),
3. A concept note on the planned framework for undertaking the assignment and a breakdown of the number of days required for each task.

Expressions of Interests submitted should not exceed 30 pages.

Consultants may associate to enhance their qualifications.

Firms shall bear all costs associated with the preparation and submission of their Expressions of Interest. The OECS is not bound to accept any Expression of Interest, and reserves the right to annul the selection process at any time prior to contract award, without thereby incurring any liability to the Consulting Firms.

For more information or to submit Expressions of Interest, please contact:

Calus Monchery

Procurement Officer

Email: procurement@oecs.int

copied to sisera.simon@oecs.int.

A Firm will be selected in accordance with the Quality and Cost-Based Selection (QCBS) method as detailed in the procedures set out in the Procurement Manual of the OECS dated November 2013, revised June 2016.

The criteria to evaluate the Expressions of Interest received in relation to this assignment may include:

- Specific experience of the Consultant Firm in the areas of expertise relevant to the assignment;
- Technical Competence in undertaking the assignment;
- Experience in similar assignments;
- Experience in tropical climates

A shortlist of consulting firms will be selected and requested to submit proposals.

An electronic copy of the Expressions of Interest are to reach the OECS Commission by January 5, 2018, addressed to:

Mr. Calus Monchery, Procurement Officer

At the following email address:

procurement@oecs.int

The email submissions should include the name and address of the Consulting Firm and shall be clearly marked in the subject line as **“Expression of Interest – Consultancy for Development of Design Guidelines for Disaster-Resilient Schools in the Organisation of Eastern Caribbean States (OECS)”**