Annex A:

TERMS OF REFERENCE

TERMS OF REFERENCE FOR THE DESIGN, PREPARATION OF THE TENDER DOCUMENTS PLUS SUPERVISION OF THE WORKS FOR THE PROPOSED EDGE-CERTIFIED PROJECT OFFICE BUILDING AT KOTU

1. INTRODUCTION

The Government of the Gambia (GOTG) has received financing from the World Bank (IDA Grant D4080), towards the implementation of the ECOWAS Regional Electricity Access Project (ECOWAS-REAP) and intends to use part of the fund to recruit a firm for the design, preparation of bidding documents and supervision of the works for the proposed Project office building at Kotu.

In order to realize its targets, NAWEC wishes to come up with an environmentally sound, conducive, cost effective and user-friendly Project office complex that can avail an effective means to accommodate a highly motivated work force capable of delivering the outcomes for meeting its target in providing access to reliable electricity supply in The Gambia.

2. OBJECTIVE

The purpose of this TOR is to spell out the terms and conditions for the hire of a consulting firm to carry out a fitting design that can cater for all the present and anticipated future requirement needs of NAWEC's Project Implementation Unit, on a proposed area at Bertil Harding Highway, Kotu for the construction of a new stand-alone multi-story complex office building and car park area plus the supervision of the works. The design shall be in accordance with the EDGE ("Excellence in Design for Greater Efficiencies") requirements and the building shall be EDGE-certified upon construction completion.

3. DUTIES AND RESPONSIBILITIES OF THE CONSULTANT

The Consultant will be reporting to PIU/NAWEC, (the client) represented by the Project Coordinator; or his designates, for undertaking the following:

- i. Assess the management and administrative needs of NAWEC's Project Office in consultation with the management. It anticipated that the proposed Project Office building shall accommodate up to 150 employees, and parking space shall be sufficient for at least 20 mid-size vehicles (such as Toyota Frontrunner, Mitsubishi Pajero or similar).
- ii. Analyze the physical infra-structural development needs in the short, medium and long term, and prepare detailed designs and tender documents for the proposed facilities.

- iii. Have consultative meetings with the PIU every fortnight to review progress.
- iv. Propose the type of equipment and material needs for these structures along with necessary cost estimates.
- v. Suggestion / recommendations in order to meet sustainability requirements.
- vi. Taking the above points into consideration, prepare a complete design together with the working drawings, schedules etc. plus detailed cost estimates.
- vii. Assist the PIU in the development of the bidding documents and the recruitment of the Constructor
- viii. Supervise construction of the designed facilities, including the preparation of interim certificates and overall management of the contract.

4. OUTPUTS; PRE-DESIGN PLANNING

- i. The Consultant(s) will undertake the assignment in accordance with the briefs and site information to be provided by the client and carry out all administrative duties in accordance with the contract.
- ii. Produce a detailed survey and layout plans of the site, external spaces, utility services and site boundaries, and collect information about the nature of the sub-soil, the water characteristics of the site, plus all information deemed vital for the execution of the project.
- iii. Prepare a realistic implementation programme in the form of a bar chart or network analysis diagram reflecting the following:
- (a) The start and completion dates of the schematic design by the Consultant, allowing for interim reviews by Client and necessary revision;
- (b) Review and approval of the final schematic design by the Client;
- (c) The start and completion dates of the final design by the Consultant allowing time for interim review by the Client and necessary revisions;
- (d) The start and completion dates of the construction documents by the Consultant(s) allowing time for interim reviews by the Client and necessary revisions;
- (e) Review and approval of the construction documents by the World Bank.

5. OUTPUTS: SCHEMATIC DESIGN

The Consultant(s) will visit the site to verify available data, investigate local legislation, procedures or information relating to the works and to local conditions including geotechnical survey before schematic design begins. The schematic design must be produced in close cooperation with the PIU/NAWEC. The final schematic design report reproduced in 5 copies should include the following:

- (a) The consultant's brief,
- (b) Explanation on the design approach and schematic alternative solutions of overall layout and the critical design factors considered.

- (c) Technical report on the structural design concept including the economic and technical analysis of alternative solutions investigated;
- (d) Analysis of construction area including a detailed schedule of gross and net areas of accommodation and proposed use;
- (e) Outline specifications: (a) structural design solution; (b) basic materials for roofing, walling, flooring, fenestration, etc; and (c) type of sanitary and electrical services and fixtures:
- (f) Preliminary costs: (i) building costs by area; and (ii) site development costs;
- (g) Drawings accompanying report according to scale agreed with the Client: (i) site plan layout of project complex with contours showing the proposed building, access, external site works, a system of stormwater disposal, external services (water, sewage, electricity; and (ii) design drawings (plans, elevations, sections) for each building.

5.1. OUTPUTS: PERFORMANCE STANDARDS.

The design and construction of the building shall conform to the EDGE requirements, and, without limitation, to the following standards:

- Energy Efficiency. Requires the adoption of efficient practices, designs, methods and technologies that reduce energy consumption resulting in cost savings. Use of the solar system in case of electricity shortcut.
- Water Efficiency. Requires the adoption of efficient practices, plan, design, materials, fixtures, equipment, and methods that reduce water consumption resulting in cost savings e.g. use of borehole.
- Material Sustainability. Material Sustainability governs all matters related to resource efficiency and material selection and use with the least impact on the environment.
- Solid Waste Management. Efficient waste management requires the adoption of efficient waste management practices and the use of eco-friendly materials.
- Site Sustainability. Requires the adoption of planning, design, construction, and operation practices that minimize the adverse impact of buildings on ecosystems and water resources.
- Indoor Environmental Quality. Requires the adoption of efficient design and operation
 practices that take into consideration the building environment to improve occupant health,
 productivity, and safety.
- Climate change consideration by taking into account energy efficiency in the civil design.

6. ASSISTANCE TO PROCUREMENT AND WORK SUPERVISION

The consultant shall assist the Client with the bidding documents, assist in the recruitment of the Constructor and supervise all works from start to finish in accordance with the detailed designs and specifications contained in the contract documents. In addition, he/she shall undertake the following:

- 1. Assist in the selection and appointment of the successful contractor
- 2. Prepare interim and final certificates for payments to the contractor
- 3. Be the liaison between the contractor and client

- 4. Approve the choice of alternative material(s) or workmanship for the contract
- 5. Assist in the preparation of specifications of materials and equipment.
- 6. Any other duties under the contract.

7. STAFFING REQUIREMENTS

- 7.1 In order to be able to provide the consultancy services under this contract, the Consultants shall assemble an experienced team of sufficient size and capacity, covering all professional disciplines and support staff required for the successful execution of the consultancy contract.
- 7.2 It is expected that the team will include the following key staff (one person for each position). It is possible that one person may perform more than one role if sufficient qualification is possessed by an individual and the work plan demonstrates the feasibility of such an approach:
- a. **Team Leader** MSc or equivalent in Civil or Structural Engineering and minimum 10 years of experience in design and supervision and knowledge in preparation of tender documents. The Team Leader should have experience in leading design/engineering teams on at least 3 similar projects within the last 5 years (similar means design and supervision of construction of office buildings of at least 1,000 sq. m.)
- b. **Architect** Diploma or equivalent in Architectural Engineering, BSc in Architectural Engineering is preferred. Experience in a similar role on at least 3 similar projects within the last 5 years.
- c. **Quantity Surveyor** BSc in Surveying. Experience in a similar role on at least 3 similar projects within the last 5 years.
- d. **Structural Engineer** BSc Structural Engineering. Experience in a similar role on at least 3 similar projects. within the last 5 years.
- e. **CAD Technician** Architectural/civil draughtsman/ Diploma in Architectural Engineering. Experience in a similar role on at least 3 similar projects within the last 5 years.
- f. **Clerk of Works** Technician in Architectural/Civil/Structural Engineering. Experience in a similar role on at least 3 similar projects within the last 5 years
- g. EDGE Expert (the list of EDGE experts can be found at https://edgebuildings.com/edge-experts-around-the-world/). Alternatively, one of other team members can be an EDGE Expert.

8. CONSULTING FIRM REQUIREMNENTS

In order to ensure quality and timely delivery of works, the consulting firm must meet the following requirement:

a. Have implemented at least 2 similar contracts in the last 6 years in the Sub-Saharan Africa. Work completion reports are required to be part of the submissions. The works must include design, bid preparation and supervision during implementation for it to be considered as a similar assignment. Proper description of the projects in the last 10 years is desired. The value of each works performed in last

ten years must also be mentioned and names and contact numbers should also be provided.

b. Must have design, prepare biding documents and supervise buildings of at least 1,500 sq. m.)

9. DURATION AND SUPERVISION OF DELIVERABLES

8.1 The total duration of the consultancy contract is estimated to be 15 calendar months, including 1 month for Design, 5 months for Assistance to procurement (on an intermittent basis), and 9 months for Works supervision. The anticipated level of effort of key staff is at least 6 months.

10. MISCELLANEOUS INFORMATION

- 10.1 The contract will be signed on a lump-sum basis and shall include all consultants' remuneration and expenditures, such as, without limitation, remuneration of all professional and support staff, materials, equipment, supplies, consumables, rentals, travel, transportation, per diems, temporary accommodation, levies, postal and courier charges, cost of communication, etc.
- 10.2 The Consultant shall be responsible for the execution of the services as detailed in this TOR and his brief. In the conduct of the work, the Consultant will fully liaise with the Client, the Client-user, and their representatives. Where necessary and possible, the Client will assist the Consultant to obtain the documentation and approvals, which are required to carry out the duties expeditiously.
- 10.3 During all stages of the assignment, the Consultant shall report directly to PIU/NAWEC, the Client's appointed representative.

11. Facilities to be provided by the PIU

The following facilities will be provided by the Client to the consultant free of charge.

- I. Access to standard office facilities: printing, photocopying, etc.
- II. Documents: All the relevant documents and available data and information concerning the Project.
- III. Internet facilities within the office.
- IV. Any site visits that may be required will be arranged by the Client.