# TERMS OF REFERENCE

# **FOR**

# ASST. PROJECT ENGINEER, Electrical (National Consultant) (ADB SKILLS TRAINING & EDUCATION PATHWAYS UPGRADATION PROJECT)

## A. BACKGROUND

- 1. The Asian Development Bank (ADB) approved the Skills Training and Education Pathways Upgradation Project (STEP-UP) on August 30, 2018. The \$15 million grant agreement was signed on 29<sup>th</sup> November 2018, and declared effective on 11<sup>th</sup> January 2019. The project aims at increasing skilled human capital for equitable socioeconomic development.
- 2. There are two executing agencies responsible for the implementation of the STEP-Ministry of Labour and Human Resources (MOLHR) and the Ministry of Education (MOE). However, following the recent reorganization of the ministries, the new executing agency for STEPUP is the Ministry of Education and Skills Development (MoESD). The primary objective of this project is to improve the employability of technical and vocational education and training (TVET) graduates and secondary school graduates. To achieve this goal, there are four outputs that the project aims to deliver: (i) increase in access to skills development; (ii) enhancing the quality and relevance of skills development; (iii) improving vocational orientation of secondary school students; and improving governance and institutional capacity for skills development.
- 3. Part of the grant proceeds is supporting the Design and Detailed Engineering Drawings for TTI Chumey, TTI Rangjung, TTI Samthang and the Rural Development Training Centre (RDTC), Zhemgang as readiness activities for the new ADB project. MOESD is seeking the services of an Electrical Engineer (Consultant) to support the Project Engineer at the PMU for the review of electrical drawing, designs and cost estimates submitted by the design firm besides other engineering work.

#### В. **SCOPE OF WORK**

- To review electrical drawing, designs and cost estimates for detailed engineering drawings for Institutes (TTI Chumey, TTI Samthang, TTI Rangjung and RDTC) submitted by Design Consultants
- To assist Project Engineer in the review and monitoring of electrical works in the ongoing constructions

#### C. **DETAILED TASKS**

The Engineer will report and directly work under the supervision of the Project Engineer, ADB STEPUP project, and shall carry out the following responsibilities:

i. Support ADB STEPUP PMU, Ministry of Education & Skills Development in implementation of the specified scope of work outlined above.

- ii. Review detailed engineering drawings and designs for the Institutes submitted by the Design consultants;
- iii. Review cost estimates (BOQ) and material specifications to ensure quantity deviations and missing items in the BoQ(during execution) are minimized to the extent possible;
- iv. Assist PMU in preparation of tender documents for construction works
- v. Assist Project Engineer to ensure that overall construction works component is completed on time and to the required quality.
- vi. Inspect materials and work to ensure compliance to specifications.
- vii. Assist Project Engineer in verifying Running Account Bills for completed works and facilitate release of payment in consultation with the PMU.
- viii. Conduct monitoring visits to project sites at regular intervals and submit progress updates to the PMU.
- ix. Responsible and accountable for record keeping of all project related documents and auditing related to electrical works.
- x. Carry out any other responsibilities within his/her technical field of competence as assigned by the Project Engineer.

# D. REPORTING REQUIREMENTS

- Prepare and submit report on the review of the electrical design and cost estimates as required for necessary correction and incorporation.

# E. QUALIFICATION, WORK EXPERIENCE AND SKILLS

- Degree in Electrical Engineering
- Minimum of five years' experience in building construction and site management, including proven experience in review of designs and drawings, review of cost estimates, billing of completed works, analysis of rates

## F. INPUTS

- Time based contract for a duration of Three (3) months on intermittent basis and may be extended based on requirement and performance.