Terms of Reference (TOR)

"Pilot Projects Technical Expert (PPTE) for the Project: Policy Reforms and Market Transformation of the Energy Efficient Buildings Sector of the I.R. Iran Project"

Interested applicants should directly send their CV and Cover letter to email address: eeeb.ceee@isti.ir or info@eeeb@ir

Date of Advertisement: 12 July 2021 until 22 July 2021
Closing Date: 22 July 2021
Please make sure you will mention the applied position in the subject line of your email.

Short-listed candidates will be invited for Interview.

Position:	Pilot Projects Technical Expert (PPTE)
Location:	Project Office - Tehran
Post Level:	Expert
Type of Contract:	Individual Contract
Languages Required:	Farsi, English
Duration of Initial Contract:	6 months (after a three-month Probation period) with possibility of extension

Background

The objective of this project is to transform the energy efficiency of heating systems in buildings in Iran, resulting in an invigorated sector in which skilled and well trained engineers fit / retrofit efficient and low carbon heating systems in residences and other buildings, as required by demanding, well enforced building codes - thereby reducing heating bills for residents and national GHG emissions. It is envisaged that this will be achieved by (i) reviewing the legislative, policy and regulatory frameworks that impact building efficiency in Iran; revisiting the building code and products standards and labels and developing a supportive cross-sectoral energy efficiency strategy; enhancing professional infrastructure of energy service business through contributing to the development of a training system and smart maintenance of energy utility in buildings (ii) developing demonstration and pilot smart energy efficiency and environment building based on energy efficient and renewable energy measures in an existing demonstration building; implementing pilot project of hybrid energy efficiency system (hybrid of fossil and renewable energy sources) in specific and selected buildings, piloting of energy service business in the framework of market transformation, and (iii) transforming the market by: introducing mechanisms of competitive energy efficiency and environment market, utilization of sectoral and

temporal energy price differentials, facilitating trade of white certificates (energy efficiency and environment), developing policy framework for promoting energy service and energy efficiency business, identifying and formulating mechanisms for promoting development and diffusion of energy efficient technologies, preparing procedures for developing infrastructures for training energy service professionals and issuing professional certificates, developing a system of quality assurance of energy efficiency and environmental quality services in the building sector, developing a stakeholder awareness-raising campaign and developing proposals for financing mechanisms for households.

The project will operate through three main components:

- **Component 1:** Key laws, policies, strategies, regulatory documents, frameworks and studies are approved and in place to provide overall national direction for the cost-effective CO2 mitigation/building EE measures and facilitation of cross-sectoral coordination and coherence for improved enforcement.
- **Component 2:** Improved heating systems and integration of SWH systems in privately owned residential buildings and government-owned buildings.
- **Component 3:** MEEE promoting ESCOs to nationwide transformation of construction techniques for a thermally insulated building shell and reduced heating loads as well as improved behaviour and attitude of building owners and administrators towards energy use in buildings.

The component 1 will provide conducive legal framework and set minimum technical requirements for energy performance of buildings. It will also develop and establish a compliance enforcement system for buildings energy code based on building 'energy passport' or 'energy performance certificates'[1], and supported by reference laboratory for testing the materials and equipment efficiencies. It will also provide a legal and institutional framework for market for energy efficiency and environment market (MEEE) where 'white certificates'[2] will be traded. The key supportive tool for compliance enforcement and EEE market operation will be developed as well as a web based IT platform refried to as 'Energy Management Information System' (EMIS).

The component 2 will develop and test operational procedures for implementing building improvements through application of appropriate technologies, production of white certificates, operationalization of EMIS, development and implementation of monitoring and verification (M&V) procedures, and along with building capacity of all involved stakeholders and created a

[1] Building's Energy Passport (BEP) or buildings Energy Performance Certificate (EPC) are documents produced by accredited parties clearly declaring whether or not a building complies with building energy code requirements

[2] White certificates are tradeable documents which are based on confirmed and certified energy savings achieved at certain energy users and then sold on the Iran energy exchange to interested buyers

training program for rolling out the capacity building required for MEEE operation and EE market transformation.

The component 3 will among the outer outcomes develop and run a multi –year multi-channel public media promotion and awareness campaign aiming at changing attitude towards energy use and creating motivation for improving energy efficiency by the public at large at their homes and places of work. Component 3 will build on the results of the components 1 and 2 in order to integrate all of the results and trust for the overall market transformation strategy implementation. In addition to that, component 3 will specifically develop and implement a multi-year public awareness, promotion and information campaign with an ultimate aim to create demand for EE improvement services for buildings.

Main Purpose

Under overall supervision of the National Project Director (NPD) the Pilot Projects Technical Expert (PPTE) will report to the National Project Manager (NPM) and Deputy of National Project Manager (DNPM), and works in close collaboration with the Energy Efficiency and Environment Building Codes (EEEBC) Expert and other EEEB project team. Pilot Projects Technical Expert will be responsible for day to day implementation of pilot projects for energy efficiency and renewable energy in buildings through site visits and project progress and control in close cooperation with contractors and building owners. The work will be supervised and supported by the National Project Manager (NPM) and Deputy of National Project Manager (DNPM).

Detailed responsibilities:

1. Overall coordination of activities under Component 2 including implementation of the pilot for the existing building stock;
2. Identification of suitable residential and non-residential buildings for implementation of the energy efficiency and renewable energy pilot demonstration projects;
3. Coordinate the implementation of energy audits and associated activities for the selected buildings;
4. Identify cost-effective energy saving measures to be implemented based on the audit results;
5. Coordinate the implementation of energy efficiency and renewable energy measures in the selected buildings;
6. Evaluate the results from demonstrations and provide input for the development of guidelines and training materials for retrofitting systems based on experience and results achieved from pilots;
7. Conduct pilot projects meetings, prepare minutes of the meetings and draft letters;

8. Conduct meetings with pilot projects stakeholders and document and follow up the negotiations;
9. Prepare required technical documents for conducting tenders and technical services;
10. Draft contractual document for the contractors of the pilot projects;
11. Review the contractors requests and evaluate their contract progress and prepare the payment notes based on the project progress;
12. Monitor and evaluate the progress of each pilot project contract and report it to NPM and DNPM;
13. Review the pilot project contractors weekly and monthly reports and prepare feedback reports to NPM and DNPM;
14. Prepare weekly reports and present them to the DNPM;
15. Prepare analytical and technical reports on the main achievements, measurement and verification (M&V) of energy saving, project challenges and recommendations;
16. Develop analytical monthly and quarterly reports on the progress of the pilot projects;
17. Identify and document lessons learned from the capacity building activities;
18. Support any other related activities requested by NPM.

Qualifications

- At least master degree in energy system engineering, mechanical engineering or other relevant engineering fields;
- At least 5 years' working experience in the field of energy efficiency;
- Excellent interpersonal and team working skills, including the ability to engage with and motivate stakeholders from different backgrounds;
- Good analytical and critical thinking skills with the confidence to be innovative in the solution of problems and challenges;
- Proficient computer-based skills, including Microsoft Office and databases, Word, Excel and PowerPoint, email and internet applications;
- Knowledge and experience in measurement and verification of energy performance will be considered as an asset;
- Fluency in Persian and English (reading, writing, speaking).