

Green, Agri-Food Transformation and Economic Recovery – GATE

TERMS OF REFERENCE

Civil Engineer – Infrastructure # 2 – Green Plan

(Proc. Ref.: G-GP-CS-INDV8)

I. Project Background

The Republic of Lebanon (the Borrower) represented by the Council for Development and Reconstruction (CDR) has received a loan from the International Bank for Reconstruction and Development (IBRD) in the amount of US\$ 200 million toward the cost of the Green, Agri-food Transformation for Economic Recovery Project (Gate).

(GATE) Project aims to improve the resilience of farmers and Small and Medium Enterprises (SMEs) in the Lebanese agri-food sector. The project is designed to facilitate access to finance, support climate-smart investments, and restore critical infrastructure services to sustain and enhance the agricultural value chain. Through targeted interventions, it seeks to increase agricultural productivity, strengthen food security, and promote sustainable economic growth. The project is structured into key components focusing on value chain investments, infrastructure development, enabling regulatory improvements, and knowledge management.

The Project is structured into five main components, each designed to strengthen the resilience of Lebanon's agri-food sector and support farmers and SMEs:

- Component 1: Climate Smart Investments in Agri-food Value Chains.
- Component 2: Climate-Smart Infrastructure and Services for Agri-Food Sector Development.
- Component 3: Improving the Enabling Environment and Restoring Support Services for Agri-food Sector Development.
- Component 4: Project and Knowledge Management.
- Component 5: Contingency Emergency Response Component.

The Green Plan has been delegated by the CDR to implement and manage the Subcomponent 2.1. This sub-component – *Improving rural community infrastructure for agriculture (US\$28 million)* – involves investments in climate-smart infrastructure and services. It will work closely with municipalities and stakeholders to develop and prioritize projects such as hill lakes, road rehabilitation, and irrigation improvements. The Green Plan will establish a dedicated Project Management Unit (PMU) to oversee implementation and ensure proper coordination.

II. Objectives of the Assignment

The objective of the assignment is to provide technical assessment on hill lakes designs and day to day construction supervision for the implementation of hill lakes and irrigation networks and rehabilitation of roads, ensuring that all works are executed in accordance with approved designs, contractual requirements, applicable national regulations and World Bank requirements.

To achieve this, Green Plan requires the services of a **Civil Engineer – Infrastructure # 2**

III. Tasks and Responsibilities

The *Civil Engineer – Infrastructure 2* will perform the following tasks:

1. Technical Assessment and Planning

- Conduct field visits to assess the condition of proposed hill lake sites, their catchment areas, and existing agricultural roads.
- Review topography, access conditions, safety aspects, and construction constraints.
- Review and approve hill lakes designs prepared by consultants or firms.
- Identify technical requirements and appropriate technical and engineering solutions.
- Assess climate-related risks, including flooding, erosion, drought, and slope instability, and ensure that these risks are systematically considered in site selection and design.
- Ensure that the design of agricultural roads and hill lakes incorporates climate-resilient and sustainable engineering practices, adapted to local conditions.
- Provide practical and context-specific recommendations to strengthen the resilience, durability, and long-term sustainability of infrastructure investments.
- Provide technical recommendations and conclusions regarding the suitability and readiness of each proposed site.
- Prepare the BOQ for the road rehabilitation

2. Technical Supervision and Implementation Support

- Conduct regular site inspections to monitor progress, workmanship, and quality for all agricultural roads and hill lakes construction activities, including but not limited to:
 - Road works: earthworks, subgrade preparation, base and pavement layers, drainage structures, culverts, safety measures, and other works rehabilitation needs.
 - Hill lakes: site preparation, embankment construction and compaction, geomembrane liner installation, spillways, irrigation networks, pumping systems, fences, access roads, and related infrastructure and safety measures.
- Ensure all construction activities are executed in full compliance with approved designs, shop drawings, technical specifications, Bills of Quantities (BoQs) and applicable national and international standards.
- Review, verify, and approve shop drawings, contractors' submissions (including As-Built drawings), engineering designs, proposed design modifications and provide technical assessment of any variation order.
- Supervise materials testing, inspection, and quality verification to ensure conformity with approved specifications.
- Oversee commissioning and functional verification of all systems, including but not limited to pumps and transmission lines, before provisional and final handover.
- Monitor and verify contractors' and consultants' works and executed quantities for interim and final payments, ensuring adherence to approved contract values, in coordination with the PMU Finance Unit.
- Oversee commissioning and functional verification before provisional and final handover.

3. Contract and Procurement Management

- Ensure contractors' and consultants' compliance with contractual obligations, including scope of services, deliverables, timelines, and technical requirements, in accordance with approved contract terms and conditions.
- Provide technical support during the preparation and review of tender documents, including technical specifications, Terms of Reference (ToRs) and Bills of Quantities (BoQs) in compliance with World Bank procurement procedures.
- Participate in bid evaluation committees by providing technical assessments of submitted proposals.
- Review and assess variation orders and claims to ensure technical necessity, compliance, cost-effectiveness, and alignment with the approved project budget.
- Review, validate, and approve deliverables submitted by consultants in accordance with their contracts, including the agreed scope of services, timelines, and contract amounts.

4. Monitoring, Reporting, and Coordination

- Lead and document coordination meetings with project team, contractors, consultants, municipalities and other stakeholders to address technical challenges related to works and deliverables.
- Prepare periodic technical progress reports summarizing the status of works implementation, compliance with approved designs and schedules, key issues encountered, risks, and proposed corrective actions and technical recommendations.
- Maintain accurate and up-to-date technical documentation and records including approved drawings, test results, correspondence and As-Built documentation.
- Monitor and coordinate the execution of contractors' and consultants' work and contract deliverables to ensure timely and technically compliant implementation with their obligations.
- Review, consolidate and endorse final As-Built drawings and technical records prior to issuance of works completion certificates.
- Prepare technical completion reports highlighting achievements, delivered outputs and lessons learned.

5. Support to World Bank Environmental and Social Framework Implementation

- Coordinate with the project's environmental and social specialists, consultants, and contractors to support the implementation of World Bank Environmental and Social Framework (ESF).
- Timely reporting of incidents or non-compliance to the PMU in a timely manner.

IV. Qualifications and Experience

• Education:

- At least a Bachelor's degree in Civil Engineering.

• Experience:

- Minimum **seven (7) years** of professional experience in infrastructure projects.

- At least **four (4) years** of experience in planning, design, and supervision of roads and water infrastructure structures (hill lakes, reservoirs, dams, large-scale irrigation networks, or similar works with demonstrated experience in technical site assessments and field investigations, as well as the preparation of Bills of Quantities (BoQs).

- Experience in donor-funded projects, preferably with the World Bank is an asset.

- **Computer skills and Languages:**

- Proficiency in Arabic and English (written and spoken).

- Proficiency in AutoCAD, and Microsoft Office applications.

- **Professional Competencies:**

- Demonstrated ability to identify technical and site-related issues and propose or implement appropriate corrective actions in a timely manner.

- Demonstrated ability to communicate effectively with consultants, contractors and site engineers and to prepare clear, accurate, and timely reports on site progress, technical issues, and implementation challenges.

V. Reporting Line

- The *Civil Engineer – Infrastructure 2* will report to the Project Manager of the Project Management Unit (PMU) and to the Head of the Executive Committee of Green Plan and will collaborate closely with technical teams, field staff, and relevant stakeholders.

- She / He shall submit the following deliverables: (i) a monthly activity report summarizing key activities, outputs and progress; and (ii) a monthly timesheet indicating the number of days/hours worked.

VI. Duration of Assignment

The initial contract duration is one year and is renewable based on performance and project requirements.

VII. Location

The position will be based at the Green Plan Offices in Beirut. Regular field visits to rural areas are required.