TERMS OF REFERENCE
GOVERNMENT ENTERPRISE ARCHITECTURE (CONSULTING FIRM)

The Ministry of Communication Technology
Federal Government of Somalia

I. Background

The Government of Federal Government of Somalia is determined to fundamentally change the way public services are provided in Somalia through a variety of interventions for modernization of service delivery, which combat corruption, foster a customer care culture, enhance access, as well as increases efficiency in Somali public administration.

The Ministry of Communications and Technology (MoCT)1 is the lead Federal Government body mandated to formulate national policies, laws, and regulations related to telecommunications, and information and communications technology (ICT). Its mandate also includes:

- Overseeing sector standards;
- Promoting the development and growth of telecommunication infrastructure and ICT;
- Protecting the interests of consumers;
- Fostering a knowledge-based economy and information society in Somalia;

In performing its duties, the MoCT is guided by the Constitution of the Federal Republic of Somalia (FGS) and other relevant laws. In 2019, the MoCT spearheaded the development of Somalia's first National ICT Policy and Strategy for the period 2019- 2023, which aims to address existing ICT infrastructure and ecosystem gaps. The policy inter alia focuses on accelerating development in the following key areas:

- Policy, legal, and regulatory framework;
- Universal access strategy promoting the use of ICT by women, youth, the disabled, marginalized groups, and underserved areas;
- Consumer protection, privacy, and child protection;
- Digital services and content;
- E-commerce, e-health, e-education, and e-governance.

The MoCT is charged with overseeing the implementation of the National ICT Policy and Strategy (2019-2024), as well as convenes and chairs a National Coordination Committee (NCC) intended to facilitate this. The NCC also consists of representatives from the Ministries of Planning; Finance; Interior and Federal Affairs; Information; Central Bank; NCA; and the Office of Prime Minister. It was established to assist in the successful implementation of the Policy, advancing the use of technology for social and economic development.

The MoCT is currently also a key beneficiary of a World Bank-financed program, the Somalia Capacity Advancement, Livelihoods and Entrepreneurship through Digital Uplift Project (SCALED-UP). The program seeks to strengthen policy development and effective regulation of the ICT sector, leveraging digital technology to accelerate social and economic development in Somalia. In relation to supporting institutional capacity strengthening, key program objectives include supporting the development of a targeted policy, which builds upon the National ICT Policy and Strategy, with a focus on digital inclusion for women, youth, and disabled; but also explores the lingering urban-rural digital divide.

[1] See: https://www.moct.gov.so/eng/

The Federal Government of Somalia aim to modernize its civil service and to achieve improvements in access, efficiency and quality of delivery of selected administrative services through the following strategies:

- **Administrative Service Modernization:** This will focus on re-engineering a group of government to citizen and government to business administrative services, piloting of one-stop-shops for public service delivery and explore the possibility of rolling out at national level; increased awareness of citizens on public services and availability of e-services.

- **Digital Platform and Services:** The government aims to digitize select government services; complete and strengthen a common infrastructure and mechanisms for rapid deployment of ICT-enabled public services; introduce government wide IT Management and Cyber Security standards and procedures. The government will finance the acquisition of additional shared computing infrastructure elements, digitization of services needed to deliver Government services electronically and development of IT Management and Cyber Security standards and procedures as well as learning management system to mainstream them within the government.

- **Service Delivery Model Implementation:** The objective is to ensure that the institutional capabilities of key government agencies are aligned with and support the new model of public services delivery.

Examples of shared components of the e-government infrastructure are listed below:

- MCloud – private government cloud computing platform
- MConnect – data exchange platform
- MPass – government electronic identity service
- MSign – government digital signature service
- MPay – government payment service
- MNotify – government notification service
- MPower – government authorization service
- MLog – government journaling service
- Public Service Portal – government portal for public services for citizens and business.

II. Objectives

The Government seeks to engage the services of an experienced Consulting Firm to develop the GEA blueprint for the Government of Somalia and accompanying implementation plan and technical specifications. The objective of this consultancy is six-fold:

(i) Define a guidelines for the development of user interface and user experience; and
(ii) Prepare technical specifications for the deployment of the GEA.

III. Scope of Work

During the proposed period of performance, the GEA Consulting Firm will work closely with the MoCT core team in order to:
the consultant service should aim to provide a standardized approach to the development and delivery of government services, provide a common language and set of standards for all government agencies to use in the delivery of cross-agency services, enhance collaboration between government agencies, provide a basis for the objective review of investment by government, and enable the more efficient and timely delivery of e-services to citizens. The resulting GEA Framework should support the delivery of

more consistent and cohesive services to citizens and support efficient delivery of digital services by the government.

1. **Develop the GEA bluepint based on international best practices through:**
   a) Take stock of reforms necessary to create the enabling environment for the provision of digital administrative, financial, and public services (i.e., e-authentication, e-signatures, e-transactions, etc.);
   b) Undertake a feasibility study for the development of a Government Enterprise Architecture (GEA) including an interoperability framework and data exchange layer;
   c) Document international best practices that may be relevant to the Somali context;
   d) Develop a prioritized and sequenced list of key databases and services (both for government and citizen-facing) that need to be interoperable;

2. **Develop Digitalization Methodology and Implementation through:**
   a) Document and maintain relevant architecture documentation for Agency's products.
   b) Develop digitization methodology and implementation timeline.
   c) Develop Terms of Reference (TOR) for implementing the GEA framework (after Government adoption).

3. **Develop Technical specifications for GEA implementation through:**
   a) Conduct high-level IT systems audits and validations of proposed technical specifications for new developments in public services digitization.
   b) Assess and elaborate the necessary ICT infrastructure (i.e., data center, equipment, software, etc.); estimated costs and human resources skills/profiles to support the implementation and management of an interoperability framework;

4. **Develop Technical training materials on platform-level services through:**
   a) Provide technical trainings on platform-level services at least once per quarter for developers of information systems in the public sector.
   b) Provide advice to MoCT management on technology advancements, standards, and technology governance.
   c) Perform other activities as requested related to meeting the MoCT GEA objectives.

IV. Outputs

The outputs of the Enterprise Architecture Consulting Firm will include the following documentation and reports:

   c) GEA Framework
   d) Digitalization Methodology and Implementation Plan to include guidelines for a minimum set of functional and non-functional requirements as part of the developed digitization methodology.
   e) Technical specifications for GEA implementation.
   f) Technical training materials on platform-level services.

V. Timing

This is a consultancy assignment for period of 10 months.

	Deliverable	**Timeline**	**Payment**
	a. Analyzing the current state of government architecture and identifying gaps and areas for improvement and conduct high-level IT systems audits and validations of	5 weeks from contract signature	15%

	proposed technical specifications for new developments in public services digitization.		
	b. Develop Government GEA framework and digitalization Methodology and Implementation Plan including digitization methodology and timeline, and Terms of Reference (TOR) for implementing the GEA framework (after Government adoption).	20 weeks from contract signature	25%
	c. Provide technical trainings on platform-level services for developers of information systems in the public sector and provide advice to MoCT management on technology advancements, standards, and technology governance.	24 weeks from contract signature	15%
	d. Conduct stakeholder consultations and validation for proposed GEA framework and digitization methodology and implementation plan.	27 weeks from contract signature	15%
	e. Delivery the final GEA Framework, digitalization Methodology and Implementation Plan include guidelines for a minimum set of functional and non-functional requirements as part of the developed digitization methodology in English.	35 weeks from contract signature	25%
	f. Delivery of any additional trainings and ad hoc support for any related queries raised	On retainer for maximum period of 2 months	5%

VI. Institutional arrangements

The Consulting Firm will work with assigned focal persons within the MoCT.

VII. Resources

MoCT will provide working space, office equipment and communication facilities, as well as any other necessary means and support for the for the Consulting Firm to carry out this assignment.

VIII. **Qualification requirements** and evaluation criteria Mandatory qualifications:

g. **A minimum of 7 years of relevant international experience in enterprise architecture**, including experience with architecture frameworks such as Zachman / TOGAF with proven track record of implementing and actively managing fundamental architectural frameworks, methodologies, and architectures;

h. **A track record of developing enterprise architecture, working with a wide variety of Clients (public and private).** Some prior experience of advising governments on enterprise architecture issues is required, preferably at a national level. The firm should have completed at least one similar assignment, which focused on the enterprise architecture.
i. **Familiarity with implementation of relevant assignment in similar environment to Somalia**, in Sub-Saharan Africa,
j. Good knowledge of Service Oriented Architecture (SOA) principles and technologies, Event-Driven Architecture, and other integration methodologies is required.
k. Good knowledge of Unified Modeling Language (UML) and Computer Aided Software Engineering (CASE) tools is required.

Core team qualifications:

1. **Project Manager:**
    - Master's degree in project management, computer science, information technology, or a related field.
    - A minimum of 7 years of industry experience in enterprise architecture.
    - Must have PMP (Project Management Professional) certification.
    - A demonstrated track record of leadership and successful project management in the field of Experience in managing large-scale IT projects, preferably in the public sector.

2. **Enterprise Architect:**

- Bachelor's or Master's degree in computer science, information technology, or a related field.
- Certification in enterprise architecture frameworks such as TOGAF (The Open Group Architecture Framework) or Zachman Framework.
- A minimum of 5 years of industry experience in enterprise architecture.
- At least one experience in designing and implementing enterprise architecture solutions, preferably in government settings.
- Proficiency in modeling tools and techniques for enterprise architecture design.

3. Application Integration Specialist:

- Bachelor's or Master's degree in computer science, information technology, or a related field.
- A minimum of 5 years of industry experience in enterprise architecture.
- Experience in designing and implementing middleware solutions for seamless data exchange between applications.
- Expertise in enterprise application integration (EAI) techniques and technologies.
- Knowledge of service-oriented architecture (SOA), API management, and microservices architecture.
- Ability to define integration patterns and standards for heterogeneous IT environments.