

REPUBLIC OF KENYA

NATIONAL TREASURY & ECONOMIC PLANNING

SUPPORTING ACCESS TO FINANCE AND ENTERPRISE RECOVERY (SAFER)

PROJECT IMPLEMENTATION UNIT

COMPONENT 3: TECHNICAL ASSISTANCE AND PROJECT MANAGEMENT

BENEFICIARY – MICRO AND SMALL ENTERPRISES AUTHORITY (MSEA)

TERMS OF REFERENCE

CONSULTANCY TO DEVELOP ICT REGISTRATION SYSTEM FOR MSMEs AND BACK-OFFICE AUTOMATION FOR MSEA

February 2025

1. INTRODUCTION

1.1. Project

Supporting Access to Finance and Enterprise Recovery (SAFER) project development objective is to increase access to financial services and support COVID-19 recovery of Micro, Small, and Medium Enterprises (MSMEs) in Kenya.

SAFER is a five-year \$100 million IDA Credit that became effective in May 2022 that seeks to address market failures in access to finance by MSMEs that have been exacerbated by the negative impact of the COVID-19 pandemic.

1.2. Project Components

The SAFER Project comprises 3 components (with sub-components) as listed below:

- a) Component 1 Innovation and Liquidity support to MSMEs
 - 1. Sub-Component 1.1: Liquidity support to microenterprises through digital channels
 - 2. Sub-Component 1.2: Liquidity support to MSMEs through SACCOs and Micro Finance Banks (MFBs)
- b) Component 2 De-risking lending to MSMEs
 - 1. Sub-Component 2.1: De-risking through support to the Partial Credit Guarantee Scheme (CGS) and company (CGC)
- c) Component 3 Technical Assistance and Project Management
 - 1. Sub-Component 3.1: TA to the National Treasury to set up the Credit Guarantee Company (CGC)
 - 2. Sub-Component 3.2: TA to Participating Financial Institutions (PFIs)
 - 3. Sub-Component 3.3: TA to financial sector regulators
 - 4. Sub-Component 3.4: Project Management

Component 3 of the SAFER focuses on providing technical assistance to build the resilient capacity of the MSME finance ecosystem beyond the lifecycle of SAFER.

These Terms of Reference are for a competent ICT firm to conduct:

- 1. Designing and overseeing the development, testing and deployment of the ICT system for MSME registration and related integrations. The system shall be a user-friendly, efficient, real-time, and secure ICT solution to streamline the MSME registration process, contributing to improved business formalization and data management.
- 2. Scoping study for the development and implementation of an Information and Communication Technology (ICT) system for Micro, Small, and Medium Enterprises (MSME) registration; Back-office support system attendant to the MSME registration platform (internal functions like Finance, Procurement, Human Resource, and other general support); ICT infrastructure assessment; ICT security assessment; and review of existing systems and integrations.

3. Overseeing deployment of a modern back-office solution at MSEA necessary for improved internal operations and related integrations, necessary for efficient/effective operation of the Registration system.

1.3. Overview

MSEA is established through an ACT of Parliament, with a mandate for oversight of MSMEs in the country, tasked with developing the sector by providing a suitable and growing environment for the enterprises. One of the ways it aids MSMEs is by registering them through the Office of the Registrar to enable them to gain access to opportunities and finance in a formalized manner.

Currently, the registration process is lengthy and involves a lot of manpower to complete registration resulting in low registration rates thus MSMEs have limited access to formal markets and financial services. To address these challenges, there is a need for an innovative ICT system that simplifies the registration process, enhances data accuracy, and facilitates better data-driven policymaking.

2. SERVICES TO BE RENDERED

2.1 Objectives

The main objectives of the consultancy are to:

- i. Scope for requirements and oversee implementation of an MSME ICT registration system with georeferencing capabilities and attendant components including a mobile phone application or USSD touchpoint to enable registration as a minimum. This will also include ICT infrastructure assessment; ICT security assessment; and review of existing systems and integration.
- ii. Scope upgrade requirements and oversee implementation of a web-based back office integrated system for MSEA with workflow integrated into the MSME registration system for improved internal operations and related integrations to facilitate the efficient/effective operation of the Registration system.

The two assignments (i) and (ii) shall be undertaken concurrently.

2.1 Scope of Work & Deliverables

2.1.1 Task 1 - MSME ICT Registration System

I. Scope of Work

- 1. Review existing documentation, laws, and regulations related to MSME registration.
- 2. Conduct a comprehensive assessment of the existing MSME registration process, identifying bottlenecks and inefficiencies.
- 3. Engage with relevant government authorities and stakeholders to understand their requirements and expectations for the ICT system.
- 4. Conducting interviews and consultations with relevant officers to understand their needs and challenges.

- 5. Analysing the current registration process, including the roles of different stakeholders, data collection methods, and information flow.
- 6. Identifying opportunities for process optimization, automation, and integration within the enhanced ICT Registration system.
- 7. Scope user needs to prepare requirements for the MSME registration system and undertake a validation exercise with stakeholders. The scope should cover the following as a minimum:
 - i. Web-based, real-time registration system with georeferencing capabilities to automate and integrate core MSE Registration processes.
 - ii. Data validation mechanism to ensure the accuracy and integrity of the information collected during registration.
 - iii. Detailed implementation plan, including timelines, resource requirements, and a phased approach for the deployment of the ICT system.
 - iv. User-friendly mobile application with USSD functionality to support the registration process that supports both registrations by an MSEA officer or self-initiated registration by an MSME.
 - v. Centralize implementation to enforce necessary controls and facilitate integrated endto-end solutions, accurate and timely reporting.
 - vi. Dashboard capabilities to facilitate online status reporting and informed strategic management decisions.
 - vii. Integration with E-citizen and the Central Government's payment service for payment of any registration fees.
 - viii. Integration with other systems e.g., Financial Inclusion Fund and any other system that shall be found necessary for the Registrar's operations.
 - ix. Integrate and allow for future scalability and adoption of emerging technologies e.g., Business analytics, e-document management systems, e-board systems, big data, and analytics
- 8. Conduct a comprehensive assessment of the existing hardware, infrastructure, and security needs.
- 9. Scope the hardware, security, and infrastructural requirements in accordance with the Registration System and back-office current and future needs.
- 10. Define specifications to be used to Supply, configure, and set up the hardware, set up the security infrastructure and make other infrastructural changes at MSEA to support the ICT agenda.
- 11. Support in the selection of an appropriate vendor to develop, configure, customise, test and commission the MSME registration system.
- 12. Offer project management and change management services during the upgrade Oversee the upgrade of the current system to a robust, user-friendly, and real-time ICT system that ensures secure data collection, storage, and retrieval for MSME registration.
- 13. Provide guidelines on warranty and support services for the procured hardware, security equipment. and the various systems post-go-live.

II. Tasks to be Performed

The consultant(s) will be responsible for the following tasks:

- 1. Review existing documentation, laws, and regulations related to MSME registration.
- 2. Conducting interviews and consultations with relevant officers to understand their needs and challenges.
- 3. Analysing the current registration process, including the roles of different stakeholders, data collection methods, and information flow.
- 4. Identifying opportunities for process optimization, automation, and integration within the enhanced ICT Registration system.
- 5. Developing a detailed functional specification for the system, outlining key features, user interfaces, and data management protocols.
- 6. Proposing appropriate data security measures and ensuring compliance with relevant data protection laws.
- 7. Outlining the technical requirements, including hardware, software, and network infrastructure needed for the implementation of the ICT system.
- 8. Conducting a cost-benefit analysis to assess the financial feasibility and potential return on investment of the proposed ICT system.
- 9. Preparing a comprehensive report presenting the findings, recommendations, and the proposed ICT system design.
- 10. Presenting the findings and recommendations to relevant stakeholders for feedback and validation.
- 11. Scope user needs and prepare requirements for the following as a minimum.
 - i. An upgraded registration system with a web interface, USSD integration, database, and functional modules (front end and back end)
 - ii. User-friendly mobile application that supports registration initiated by an MSEA officer as well as self-initiated registration.
 - iii. Data validation, data analysis, data extraction, system backup and procedures
 - iv. ICT security measures for the System ensuring compliance with relevant data protection laws.
 - v. Appropriate software kits and licenses. Integration with existing systems and use of big data and data mining tools to get data from the various systems to validate and give insights.
 - vi. Integration with E-citizen and the central Government payment services.
 - vii. Integration with the Financial Inclusion Fund Database for MSME groups/associations including the *254# USSD.
 - viii. Migration of relevant data from existing systems.

- 12. Provide specifications and configure the availed appropriate hardware to host and run the system effectively and advise the Authority on the future hardware requirements for scalability.
- 13. Propose and implement a comprehensive training program for all users as agreed with the Authority. (e.g., common users, specialized ICT technical Staff, etc)
- 14. Provision of warranty after successful commissioning (go-live) of the system.
- 15. Reviewing existing hardware components, servers, network and security devices.
- 16. Conducting interviews and consultations with relevant officers to understand their needs and challenges.
- 17. Identifying opportunities for enhancement of the infrastructural setup within MSEA, with a detailed list of the devices needed.
- 18. Preparing a comprehensive report presenting the findings, recommendations, and presenting the findings and recommendations to relevant stakeholders for feedback and validation.
- 19. Providing a detailed document to inform the Delivery, Installation, configuration, test and setup of the appropriate devices and their core software, licenses and kits.
- 20. Preparation of an integration strategy document of the new infrastructure with the existing setup.
- 21. Selection of appropriate technology for the MSME registration system, hardware and security equipment.
- 22. Implementation of the MSME registration system, hardware and security equipment.
- 23. Provision guideline report of warranty after successful commissioning (go-live) of the hardware.

III. Deliverables

- 1. Inception Report: Detailed work plan, methodologies, and tools for the scoping study.
- 2. Consultation Report: Summary of key insights and feedback obtained from stakeholders during the consultations.
- 3. Functional Specification: Detailed documentation of the proposed features and functionalities of the ICT system.
- 4. Implementation Plan: A comprehensive plan outlining the steps, timelines, and resource requirements for the ICT system deployment.
- 5. Cost-Benefit Analysis: Report evaluating the financial viability and potential benefits of the proposed ICT system.
- 6. Final Scoping Study Report: A comprehensive report encompassing all findings, recommendations, and the finalized ICT system design.
- 7. Technical Specifications for required hardware document.
- 8. Selection report for appropriate technology vendors for MSME registration system, related hardware and security equipment.

- 9. Certificate of Acceptance and Sign-Off for testing reports and end-to-end functional testing report: Subject to Fully tested and Integrated System with USSD access.
- 10. Certificate of Acceptance and Sign Off for training documents and training evaluation report: Subject to training of the relevant staff.
- 11. Certificate of Acceptance and Sign Off for handover and maintenance documents: Subject to the system being live.

2.2 <u>Task 2 - Back-Office Support System to the MSME Registration Platform</u> (Automation of Internal Processes)

I. Scope of Work

- 1. Review the existing implementation of the ERP system, identify bottlenecks and inefficiencies.
- 2. Provide an upgrade path, taking into consideration the above considerations.
- 3. Provide a detailed implementation plan, including timelines, resource requirements, and a phased approach for the deployment of the ERP system.
- 4. Oversee the requirements scoping, selection and implementation of an upgrade of the current system to a robust, user-friendly, and real-time integrated web-based Enterprise Resource Planning System (ERP) system that ensures secure data collection, storage, and retrieval of data for MSEA. The web-based ERP should ensure centralized e-implementation to enforce necessary controls and facilitate integrated end-to-end solutions, accurate and timely reporting. The web-based EPR should be integrated with other systems at MSEA and in other collaborating agencies including the Registration System, Inclusion Fund System, and be future-ready for integration with Business Analytics, e-document management systems, e-board systems, and big data among others.
- 5. Provide an ERP license renewal and an annual maintenance plan for a period of five (5) years after commissioning.

II. Tasks to be Performed

The consultant(s) will be responsible for the following tasks:

- 1. Develop a Functional Requirements Document after conducting interviews with relevant officers to understand their needs and challenges, outlining the as-is and to-be processes.
- 2. Develop a Software Design Document/ ERP customization document indicating the level of customization required.
- 3. Outlining the technical requirements, including hardware, software, and network infrastructure needed for the implementation of the ICT system.
- 4. Presenting the findings and recommendations to relevant stakeholders for feedback and validation.
- 5. Develop user requirements specification and tender documents for supply, configure, install, test and commission the upgraded ERP system with a web interface, database, and functional modules (front end and back end).

- 6. Develop requirements for integration with other systems both within MSEA and with collaborating institutions.
- 7. Provide specifications and oversee configuration of the availed appropriate hardware to host and run the system effectively and advise the Authority on the future hardware requirements for scalability.

Oversee implementation of the web-based ERP including guidance in conducting User Acceptance Tests (UATs).

- 8. Setup necessary ICT security measures for the System
- 9. Oversee the installation, configuration, test and setup of the appropriate software, licenses and kits in the final production environment.
- 10. Oversee migration of relevant data from the existing ERP to the upgraded/new ERP.
- 11. Propose and oversee the implementation of a comprehensive training program for all users as agreed with the Authority. (e.g., common users, specialized ICT technical Staff, etc)
- 12. Propose and help prepare SLA for provision of warranty after successful commissioning (golive) of the system.

III. Deliverables

- 1. Inception Report: Detailed work plan, methodologies, and tools for the scoping study.
- 2. Functional Specification: Detailed documentation of the proposed features and functionalities of the ERP system.
- 3. Upgrade/Software Design Document: With comprehensive detail on required customizations to make the ERP work for MSEA.
- 4. Implementation Plan: A comprehensive plan outlining the steps, timelines, and resource requirements for the ERP system deployment.
- 5. Certificate of Acceptance and Sign-Off for testing reports and end-to-end functional testing report: Subject to Fully tested and Integrated System.
- 6. Certificate of Acceptance and Sign Off for training documents and training evaluation report: Subject to training of the relevant staff.
- 7. Final Implementation Report: A comprehensive report encompassing all findings, recommendations, and the finalized ERP system.
- 8. Certificate of Acceptance and Sign Off for handover and maintenance documents: Subject to the system being live.

2.3 Estimation of Effort

Tasks 1 and 2 shall be implemented concurrently and shall be conducted over a cumulative period of twelve (12) months, including oversight for system procurement and implementation.

The table below gives a summary of the type of reports to be prepared by the consultant and the duration at which each report is expected to be submitted after the commencement of the assignment:

		Area of Assignment and duration in weeks	
		the report is to	be submitted after
	True of Depart	commencement	
	Type of Report	ICT MSME	Back-Office Support
		Registration System	System -Task 2
		-Task 1	
1.1	Inception Report: Detailed work plan,	Week 4	Week 4
&	methodologies, and tools for the scoping		
1.2	study		
2.1	Consultation Report: Summary of key insights	Week 6	
	and feedback obtained from stakeholders		
	during the consultations		
3.1	Functional Specification: Detailed	Week 8	
	documentation of the proposed features and		
	functionalities of the ICT system		
3.2	Functional Specification: Detailed		Week 6
	documentation of the proposed features and		
	functionalities of the ERP system		
4.2	Upgrade / Software Design Document: With		Week 8
	a comprehensive detail on required		
	customizations to make the ERP work for		
	MSEA		
5.1	Implementation Plan: A comprehensive plan	Week 10	
	outlining the steps, timelines, and resource		
	requirements for the ICT system deployment		
5.2	Implementation Plan: A comprehensive plan		Week 12
	outlining the steps, timelines, and resource		
	requirements for the ERP system deployment		
6.1	Cost-Benefit Analysis: Report evaluating the	Week 12	
	financial viability and potential benefits of the		
	proposed ICT system		
7.1	Final Scoping Study Report: A comprehensive	Week 13	
	report encompassing all findings,		
	recommendations, and the finalized ICT		
	system design		
8.1	Certificate of Acceptance and Sign Off for	Week 32	
	testing reports and end to end functional		
	testing report: Subject to Fully tested and		
	Integrated System with USSD access		
8.2	Certificate of Acceptance and Sign Off for		Week 32
	testing reports and end-to-end functional		
	testing report: Subject to Fully tested and		
	Integrated System.		W/ 1.24
9.1	Certificate of Acceptance and Sign Off for	Week 36	Week 36
	training documents and training evaluation		
9.2	report: Subject to training of the relevant staff		1177 1 4 0
10.2	Final Implementation Report: A		Week 40

	comprehensive report encompassing all findings, recommendations, and the finalized ERP system		
11.1 & 11.2	Certificate of Acceptance and Sign Off for handover and maintenance documents: Subject to the system being live	Week 44	Week 44
12.1	Technical Specifications for required hardware document	Week 12	

2.4 Payment Schedule

The Consultant shall prepare two separate reports for each of the tasks: (a) ICT MSME Registration System; and (b) Back-Office Support System to the MSME Registration Platform for MSEA.

Based on the timelines above, the payment schedule is as follows:

	Deliverables	Task 1	Task 2
1.1 &	Inception Report: Detailed work plan,	20%	20%
1.2	methodologies, and tools for the scoping study		
2.1	Consultation Report: Summary of key insights	10%	
	and feedback obtained from stakeholders during		
	the consultations		
3.1	Functional Specification: Detailed	10%	
	documentation of the proposed features and		
	functionalities of the ICT system		
3.2	Functional Specification: Detailed		10%
	documentation of the proposed features and		
	functionalities of the ERP system		
4.2	Upgrade / Software Design Document: With a		10%
	comprehensive detail on required customizations		
	to make the ERP work for MSEA		
5.1	Implementation Plan: A comprehensive plan	5%	
	outlining the steps, timelines, and resource		
	requirements for the ICT system deployment		
5.2	Implementation Plan: A comprehensive plan		5%
	outlining the steps, timelines, and resource		
	requirements for the ERP system deployment		
6.1	Cost-Benefit Analysis: Report evaluating the	5%	
	financial viability and potential benefits of the		
	proposed ICT system		
7.1	Final Scoping Study Report: A comprehensive	10%	
	report encompassing all findings,		
	recommendations, and the finalized ICT system		
	design		
8.1	Certificate of Acceptance and Sign Off for	20%	

	testing reports and end-to-end functional testing report: Subject to Fully tested and Integrated		
	System with USSD access		
8.2	Certificate of Acceptance and Sign Off for		20%
	testing reports and end-to-end functional testing		
	report: Subject to Fully tested and Integrated		
	System.		
9.1 &	Certificate of Acceptance and Sign Off for	10%	10%
9.2	training documents and training evaluation		
	report: Subject to training of the relevant staff		
10.2	Final Implementation Report: A comprehensive		20%
	report encompassing all findings,		
	recommendations, and the finalized ERP system		
11.1	Certificate of Acceptance and Sign Off for	5%	5%
&	handover and maintenance documents: Subject		
11.2	to system being live		
12.1	Technical Specifications for required hardware	5%	
	document		

2.5 Conduct of the Assignment

The consulting firm will report directly to the Chief Executive Officer (MSEA), or a designated member of senior management and work closely with the PIU/NT.

3 QUALIFICATIONS AND EXPERTISE

3.1 General Requirements

The ideal consultancy firm should possess the following qualifications:

- 1. Duly registered and with a tax compliance certificate.
- 2. The consulting firm must have been in existence for at least 10 years and have a clear track record for solution delivery.
- 3. The firm must have conducted several World Bank-funded assignments in the public sector, specifically with at least three implementations with regulatory authorities. Assignments in different countries will be of added advantage.
- 4. The consultancy firm should have a strong and proven track record in undertaking similar ICT scoping studies or projects within the public sector or government context. Experience in designing and implementing ICT solutions for business registration or related processes will be highly valued.

- 5. *User-Centric Approach*: The firm should adopt a user-centric design approach, prioritizing the needs and preferences of MSMEs, government officials, and other stakeholders involved in the registration process. A focus on usability and accessibility will be integral to the successful adoption of the proposed ICT system.
- 6. *Data Privacy and Security Expertise:* The firm should have in-depth knowledge of data privacy laws and international data security standards. They must demonstrate the ability to design and implement robust data protection measures within the ICT system to safeguard sensitive information.
- 7. Resources and Infrastructure: Have access to the necessary resources, infrastructure, and tools required for conducting the scoping study and developing the proposed ICT system. Adequate technical capabilities and hardware/software resources are essential for efficient project delivery.
- 8. *Quality Assurance and Compliance:* Have a robust quality assurance framework to ensure the accuracy, completeness, and compliance of their deliverables with the project requirements and established standards.
- 9. *Educational Background*: The key personnel leading the project should possess graduate degrees in relevant fields such as Information Technology, Computer Science, Software Engineering, or a related discipline.
- 10. Have a team of highly skilled and experienced professionals with expertise in information technology, software development, systems analysis, data management, and cybersecurity.

The team should include the following as the key experts:

No	Position	Expertise, Qualification, Experience, Expectations
1	Project Team Leader and Solution Architect / System Analyst	The Team Leader will be responsible for overseeing the entire scoping study process, coordinating with team members, and ensuring the delivery of a comprehensive and well-designed ICT system for MSME registration.
		<i>Educational Background</i> : Hold a graduate degree in Information Technology, Computer Science, Software Engineering, or a related field with over 15 years of experience. A postgraduate degree will be an added advantage. At least one professional qualification in project management e.g., PMP/ Prince2
		Information Technology and Systems Experience: Have a strong background in information technology, systems analysis, and software development. They should demonstrate a proven track record in designing and implementing ICT solutions for government or public service entities, particularly in the context of MSME registration or related processes.

No	Position	Expertise, Qualification, Experience, Expectations
		Minimum of 8 Years specific work experience in ERP system
		installations and infrastructure
		Minimum of 4 relevant full life-cycle ERP implementations and
		process design
		 Project Management Skills: Have extensive experience in leading and managing complex projects, preferably in the ICT domain. They must demonstrate the ability to coordinate a multidisciplinary team, set clear objectives, establish work plans, and deliver results within agreed timelines and budgets. Scoping and Assessment Expertise: Have proficiency in conducting scoping studies, needs assessments, and analysing existing
		systems and processes. They must be capable of identifying gaps, inefficiencies, and opportunities for improvement in the current
		MSME registration process.
		Language Proficiency: Proficient in English and Kiswahili to facilitate
		communication with stakeholders.
2	Business Analyst /	Must possess at least a Bachelor's degree in IT or a business-
	MSME Expert	related field of study from a recognized university.
		At least 5 years experience with proven track record and skills in
		Business Analysis, Needs Assessment
3	Geographic Information Systems (GIS) Analyst	Must possess at least a Bachelor's degree in Computer Science, Geography, Geoscience, Surveying, Engineering, or a related field of study from a recognized university.
		At least 5 years experience with a proven track record and skills in GIS requirements analysis and documentation, GIS data processing, geodatabase editing, spatial analysis, geocoding, image georeferencing and web-based mapping system usage and testing
4	Network Infrastructure	Must possess at least a Bachelor's degree in IT field of study from
	and Security Expert	a recognized university.
		At least 5 years' experience with a proven track record and skills assessing network and security requirements and developing technical specifications.