**Enterprise Service Bus (ACE)**

**Enterprise Service Bus (ACE)**

**Project Scope Statement**

**For**

Steward Bank Pvt Ltd

By

Kenac Computer Systems

In Partnership with

IBM Lab Services

&

Ingram Micro Training Services

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### A. Executive Summary

Steward Bank is a Registered Commercial Bank headquartered in Harare, Zimbabwe. The Bank has since positioned itself as a mass-bank, focused on providing banking solutions with innovative technological solutions. Steward Bank is seeking an intelligent monitoring, automation and scheduling solution for Core Banking System. The solution should support IT operations to ensure the high availability of core banking services and interfaces, full business continuity and the achievement of service-level objectives through real-time monitoring of business operations based on T24.

The products and services the bank currently offers are as follows:

1. **Square Banking** which includes- mobile banking, online banking, telephone banking, USSD banking, social media banking (Facebook, WhatsApp, Twitter), Batsi (AI Virtual Assistant)
2. **Personal Banking**, which includes the following accounts-iSave (Savings account), iAccount (Current account), Savvy Teens and Savvy Kids.
3. **Cards** which are- MasterCard, Visa Card, Local debit card, credit card and personalized card.
4. **EcoCash** - EcoCash Banking Services, EcoCash save, EcoCash loans

The channels currently being used are:

1. Mobile (android and iOS)
2. POS
3. Web
4. iBots

### B. Business Objectives

Steward Bank seeks to implement an Enterprise Service Bus (IBM App Connect) to act as the integration layer of the technology stack. It will be the integration point for all digital channels to the Core Banking System and the implementation must satisfy the following business objectives /requirements:

1. To eliminate balance mismatch
2. Remove duplicate transaction
3. To comply with regulatory requirements of business continuity and disaster recovery
4. To eliminate failed transaction caused by capacity constraints on ESB.
5. Reduced cost of maintenance
6. Reduced turnaround time to launch new channels

Other Requirements

* The vendor must include licensing, training and implementation.
* Licence and implement the latest version of IBM App Connect.
* The implemented solution will integrate to the Temenos T24 R19 Core Banking Systems.

**The digital channels include**:

|  |  |
| --- | --- |
| 1. Social Media 2. Mobile App and USSD 3. ATM 4. POS 5. Internet Banking 6. Banking Services(Ecocash, Sasai) 7. ZEPS (Paynet) 8. \*236# 9. ZSS Notifications 10. VISA/MC 11. HomeSend 12. Branch (Teller Txn) 13. Agent POS 14. Merchant POS 15. Branch POS 16. Ecocash Cash In (Loans, Branch) 17. Postilion 18. Mobiquity 19. B-Portal 20. Instant Card Issuance 21. Swipe to Ecocash 22. Zimswitch POS notifications 23. Nano Loans 24. MBA 25. Tutuka (Ecocash card) 26. Visa Notifications 27. MasterCard notifications | 1. Ecosale 2. VBatch 3. PEX 4. World Remit 5. MoneyGram 6. Hello Paisa 7. Western Union 8. Mama Money 9. Cassava Remit 10. Zinara 11. FCB/CRB 12. RTGS ZETSS 13. ZIPIT 14. SWIFT 15. CEBAS 16. CEPECS 17. Agent Web Portal 18. Reuters Price Feed 19. Reuters dealing/trading 20. IFRS 9 system – OFSAA |

* This traffic will constitute 99% of all bank transactions with an expected success rate of 99.99%.
* This solution should have redundancy and high availability i.e. should be load balanced over multiple instances and geographic locations.
* The expected throughput is a minimum over 1500TPS.
* The delivered solution should be configurable to support both synchronous and asynchronous transactions.
* The system should support robust security and encryption standards as some of the services will be exposed to third parties.
* The preferred architecture is SOA and this must be reflected in the proposal submitted. Please attach recommended physical and logical architecture.
* The system must have a monitoring dashboard/console to monitor system performance and errors.
* System logs should be available for second level monitoring.
* The system should be able to generate reports on both transactions and performance.

1. **Product Description (Solution)**

IBM® App Connect Enterprise V11 combines the existing, industry-trusted IBM Integration Bus (IIB) technology with new cloud native technologies of IBM App Connect Professional. App Connect Enterprise delivers a platform that supports a breadth of integration needs across a modern digital enterprise. It is ideal for businesses that need to take advantage of API-driven architectures, connect cloud-based applications, or quickly **utilize artificial intelligence (AI)** technologies to extend the value and investment in their existing data and systems.

Available as managed or unmanaged cloud or as an on-premises offering, App Connect Enterprise delivers a range of capabilities to optimize the creation and deployment of integrations that support API-driven digital and hybrid cloud architectures.

**Full Product Features Available in this Proposal (Contracted Capabilities)**:

1. Extended connectivity across Cloud Services, Software as a Service (SaaS), cloud platforms, and on-premises applications.
2. Lightweight integration runtimes for cloud native and container-based deployment.
3. Deployment options that can enable clients to achieve a balance between control, management overhead, and budget.
4. The ability to build and expose APIs through a no-code approach 1 that can be easily managed through IBM API Connect™.
5. New, simple tooling for all styles of user that works together to expose and integrate enterprise systems.
6. Detection of business situations that require user engagement, with insightful and actionable notifications 1
7. App Connect Enterprise V11 is the official successor product for IIB clients. For more information regarding migration of workloads from IIB to App Connect Enterprise, see the Statement of Direction section.
8. Reports for Performance monitoring and trouble shooting.

App Connect Enterprise builds upon the robust and proven IIB runtime that is trusted by thousands of clients over the past 18 years or more to run their mission-critical, application integration projects. During this period, the offering continually grew to allow clients to embrace new technologies, such as Kafka and Loopback Bridge across cloud and on-premises architectures with a hybrid runtime, and adopt open standards through the delivery of OpenAPI features.

The connectivity and tooling options extend the wide variety of data formats and application that are supported and include standards-based formats, such as :

1. extensible Markup Language (XML)
2. Data Format Description Language (DFDL)
3. JavaScript™ Object Notation (JSON)
4. Industry formats and standards, such as:
   1. Health Level 7 (HL7)
   2. The Society for Worldwide Interbank Financial Telecommunication (SWIFT)
   3. ISO8583
   4. Custom formats, OVF

**Technical Capabilities Offered In This Project and Solution.**

| **Capability** | **Description** |
| --- | --- |
| Transaction Speed | 100,000 Transactions Per Second >> for <https://developer.ibm.com/integration/docs/ibm-integration-bus/performance/message-throughput/aix-performance-report-results/> |
| Vertical scaling | Unlimited integration servers can be used |
| Web Standards connectivity | The following nodes are provided:   1. HTTPAsyncRequest node 2. HTTPAsyncResponse node 3. HTTPHeader node 4. HTTPInput node 5. HTTPReply node 6. HTTPRequest node 7. SOAPAsyncRequest node 8. SOAPAsyncResponse node 9. SOAPEnvelope node 10. SOAPExtract node 11. SOAPInput node 12. SOAPReply node 13. SOAPRequest node 14. JSONXML 15. REST Service-oriented 16. RESTful 17. Event-oriented 18. Data-driven 19. File-based (batch or real-time 20. SOAP 21. REST 22. OFS : Integrations 23. XML 24. ISO 8583 25. ISO 20022 26. Swift 27. FTP |
| Supported Standards | 1. ISO 8583 2. ISO 20022 3. SOAP 4. SWIFT |
| REST connectivity | The following nodes are provided:   1. RESTRequest node 2. RESTAsyncRequest node 3. RESTAsyncResponse node |
| Kafka connectivity | The following nodes are provided:   1. [KafkaConsumer node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bz91010_.htm?view=kc) 2. [KafkaProducer node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bz91020_.htm?view=kc) |
| Cloud connectivity | A SalesforceRequest node is provided. |
| An AppConnectRESTRequest node is provided. |
| LoopBack® connectivity | A LoopBackRequest node is provided. |
| ODBC connectivity | A Database node is provided. To connect to the following databases ORACLE , MYSQL , Microsoft SQL Server and REDIS |
| Java™ connectivity and JDBC | The following nodes are provided:   1. DatabaseRetrieve node 2. DatabaseRoute node 3. JavaCompute node 4. JMSHeader node 5. JMSInput node 6. JMSMQTransform node 7. JMSOutput node 8. JMSReceive node 9. JMSReply node 10. MQJMSTransform node   For JMSMQTransform and MQJMSTransform nodes, IBM MQ (Client or Server) must be installed on the same machine as the integration server |
| MQ connectivity | The following nodes are provided:   1. MQGet node 2. MQHeader node 3. MQInput node 4. MQOutput node 5. MQReply node 6. Publication node   Support is also provided for content-based filtering.  IBM MQ (Client or Server) must be installed on the same machine as the integration server. |
| Graphical mapping and XSL | The following nodes are provided:   1. Mapping node 2. XSLTransform node |
| Flow control | The following nodes are provided:   1. Input node 2. RouteToLabel node 3. Output node 4. Throw node 5. TimeoutControl node 6. TimeoutNotification node 7. Trace node 8. TryCatch node 9. FlowOrder node 10. Passthrough node 11. ResetContentDescriptor node 12. Validate node 13. Check node 14. Label node   Support is also provided for subflows.  For timeout nodes, IBM MQ Server must be installed on the same machine as the integration server, and the integration server must not share a queue manager with another integration server. |
| Callable flows | The following nodes are provided:   1. CallableFlowAsyncInvoke node 2. CallableFlowAsyncResponse node 3. CallableFlowInvoke node 4. CallableInput node 5. CallableReply node |
| Routing | A Route node is provided. |
| Email, File, and (S)FTP connectivity | The following nodes are provided:   1. EmailInput node 2. EmailOutput node 3. FileInput node 4. FileOutput node |
| User-defined logic | Support is provided for user-defined nodes, parsers, and exits. |
| Microsoft .NET | The following nodes are provided:   1. [.NETInput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bc16290_.htm?view=kc) 2. [.NETCompute node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bc16270_.htm?view=kc) |
| Patterns technology | Support is provided for built-in and user-defined patterns technology. |
| Administration interfaces | The following administration interfaces are provided:   * [Web user interface](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bb28499_.htm?view=kc) * [Command line](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/an07060_.htm?view=kc) |
| Mobile integration | Mobile integration patterns are provided. |
| TCP/IP | The following nodes are provided:   1. [TCPIPClientInput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67300_.htm?view=kc) 2. [TCPIPClientOutput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67310_.htm?view=kc) 3. [TCPIPClientReceive node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67320_.htm?view=kc) 4. [TCPIPServerInput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67330_.htm?view=kc) 5. [TCPIPServerOutput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67340_.htm?view=kc) 6. [TCPIPServerReceive node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac67350_.htm?view=kc) |
| SQL | The following nodes are provided:   1. [Compute node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac04660_.htm?view=kc) 2. [DatabaseInput node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/bc34041_.htm?view=kc) 3. [Filter node](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ac04780_.htm?view=kc)   Support is also provided for ODBC database and ESQL deployment. |
| Aggregation | Group nodes and aggregation nodes provide alternative ways to collate related requests and responses:   1. AggregateControl node 2. AggregateReply node 3. AggregateRequest node 4. GroupComplete node 5. GroupGather node 6. GroupScatter node   To use aggregation nodes, IBM MQ Server must be installed on the same machine as the integration server, and the integration server must not share a queue manager with another integration server. For more information, see [Installing IBM MQ](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ah09088_.htm?view=kc). |
| Advanced data processing | The following nodes are provided:   * Collector node * Resequence node * Sequence node   For Collector, Sequence, and Resequence nodes, IBM MQ Server must be installed on the same machine as IBM App Connect Enterprise. For more information, see [Installing IBM MQ](https://www.ibm.com/support/knowledgecenter/SSTTDS_11.0.0/com.ibm.etools.mft.doc/ah09088_.htm?view=kc). |
| Advanced Policy Enforcement Point (PEP) processing | A SecurityPEP node is provided. |
| Built-in application adapters | The following nodes are provided:   1. JDEdwardsInput node 2. JDEdwardsRequest node 3. PeopleSoftInput node 4. PeopleSoftRequest node 5. SAPInput node 6. SAPReply node 7. SAPRequest node 8. SiebelInput node 9. SiebelRequest node   For transactional support with SAP nodes, IBM MQ Server must be installed on the same machine as IBM App Connect Enterprise. |
| Managed file support | The following nodes are provided:   1. CDInput node 2. CDOutput node 3. FileRead node 4. FTEInput node 5. FTEOutput node   For CD and FTE nodes, IBM MQ Server must be installed on the same machine as IBM App Connect Enterprise. |
| CICS®, IMS, CORBA | The following nodes are provided:   1. CICSRequest node 2. CORBARequest node 3. IMSRequest node |
| MQ Telemetry Transport (MQTT) | The following nodes are provided:   1. MQTTPublish node 2. MQTTSubscribe node |

1. **Deliverables**

Activity 1 (Project Initiation and Planning)

1. Signed Contract
2. Non-Disclosure Document signoff.
3. Prepayment Receipts or proof of payment
4. Project Documents (PID , Schedule, Project Team, Stakeholder register, RACI)
5. Project scope baseline and signoff.

Activity 2 (Execution): (ACE virtual Machines and Environment Deployment)

1. Configuration summary document for development environment.
2. Configuration summary document for UAT Environment.
3. Configuration summary document for production Environment.
4. Configuration summary document for QA Environment.
5. Configuration summary document for DR? Environment.

Activity 3 (ESB Developer 1 Training)

1. Attendance register.
2. Training Evaluation report: “Survey.”
3. Training Content.
4. Mock Exam
5. Online Exam.

Activity 4 (Requirements Gathering), to be conducted through interviews and focused groups

1. Interface specification document.
2. Low-level design document.
   1. Requirements traceability matrix
3. High level design document.

Activity 5 (Solution Design)

1. Solution architecture & design.
2. Physical operational model architecture. Current Snap / Proposed Snapshots).
3. Migration Plan Document.
4. Acceptance Document (Matrix)
5. Testing Plan indicating expected results.

Activity 6 (Development and Unit Testing)

1. Solution design unit testing
2. Unit Testing
3. End to End Testing clearly indicate Time lines.

Activity 7 (ESB Developer 2 Training)

1. Attendance register.
2. Training Evaluation report: “Survey.”
3. Training Content.
4. Mock Exam
5. Final Exam

Activity 8 (Support and Integration Test)

1. RAID
2. Changes Register

Activity 9 (Support for UAT)

Activity 10 (Support for Cut-Over to Production)

1. Post Cut over Tests for Production.

Activity 11 (Post Deployment Support)

1. Operation and Maintenance Manual
2. Product Descriptions
3. User Manuals

Activity 12 (Project Closure)

1. Project Closure Minutes
2. Contract Closure
3. Final Acceptance Certificate (FAC)
4. A Minimum of 80% for each Unit Testing

### C. Project Description

Steward Bank seeks to implement an Enterprise Service Bus (IBM App Connect) to act as the integration layer of the technology stack. It will be the integration point for all digital channels to the Core Banking System and the implementation must satisfy the following requirements. Kenac along with its Vendors IBM will make use of the leading IBM® App Connect Enterprise V11 which combines the existing, industry-trusted IBM Integration Bus (IIB) technology with new cloud native technologies of IBM App Connect Professional. App Connect Enterprise delivers a platform that supports a breadth of integration needs across a modern digital enterprise. It is ideal for businesses that need to take advantage of API-driven architectures, connect cloud-based applications, or quickly utilize artificial intelligence (AI) technologies to extend the value and investment in their existing data and systems. Available as managed or unmanaged cloud or as an on-premises offering.

1. **Scope**

The Scope of the Project will include

* 1. Training of Steward Bank Team Members
  2. Deployment of Virtual Machines/ Logical Partitions to Host the IBM ACE Application Servers.
  3. Requirements gathering exercise to understand business and technical requirements.
  4. Identifications of Key Stakeholders both Technical, Functional and Business.
  5. Development of message flow for the various defined Protocols and standards defined in the RFP.
  6. Project Management from Agreed Kick Off date to Actual Completion Date.
  7. Change Management Procedures.
  8. Steward Bank 3rd part Vendor Management
  9. Supply of Hardware for the environment
  10. Backing up of ACE Environment during Project Execution
  11. Hardware procurement for Disaster Recovery (DR) site
  12. Supply of any Licenses other than ACE Packages and components (SB)
  13. Conducting Change Management Session/Program for Steward Bank (SB)

**Does Not Include:**

The Scope of the Project will not include

1. Any other channel not defined in the List of Digital Channels Ref Section B of this document.
2. **Completion Criteria**

We will clearly define product acceptance criteria in below scenarios

1. Technology Acceptance: various test cases will be performed on the IBM ACE Environment to ensure that each environment performs according to expectations.
2. The Defined Interfaces and Channels: Tests will be focused mainly on ability to route messages from various channels.
3. Check List Sheets for each digital channel.
4. Defined Standard e.g. ISO8583 will be reviewed and tested independently.
5. Training Objectives.
6. **Risk Assessment**
7. Visa Lead-time to mobilize delivery resource on site for IBM Team (3 Weeks’ Notice Period after Payment Confirmation). Take Note during festive seasons Period might be longer Formally Start 12th January 2020.
8. Software Download to be timely through Passport Advantage, Portal will only be active after payment has been placed with IBM. : Ensure licenses readiness Payments to be done as per Invoice Due Date
9. Turnaround times: Responses should not take more than 8hrs form date of issues especially during the time of requirements gathering.
10. Training to be done and completed as per defined time slots.
11. Availability of Steward Bank Project resources in a timely manner : Availability of client Key stakeholders and their leaves planning are to be shared
12. Remote access to be open in a timely manner : Make sure appropriate access is given and tested Prior
13. **Constraints**

Time: 80 Days

Budget: Fixed Term Contract

1. **Dependency Linkages**

*The below are some of the known dependences*

1. 100 % Prepayment for Services to start unless or otherwise agreed in Purchase Agreement.
2. Availability of computing resources from Steward Bank.
3. Software Download to be timely through Passport Advantage, Portal will only be active after payment has been placed with IBM. : Ensure licenses readiness Payments to be done as per Invoice Due Date
4. Turnaround times: Responses should not take more than 8hrs form date of issues especially during the time of requirements gathering.
5. Training to be done and completed as per defined time slots.
6. Availability of Steward Bank Project resources in a timely manner : Availability of client Key stakeholders and their leaves planning are to be shared
7. Remote access to be open in a timely manner : Make sure appropriate access is given and tested Prior
8. Office Space with below requirements
   1. Desks, Chairs and Tables for 6 People
   2. A Local Phone to reach out to local resources within the same office Premise
   3. Internet Connectivity
   4. LAN Access to Computing Resources/
   5. Projectors, White Board and Markers
9. **Impacts**

*Organizational change management, retraining, increases/decreases in operating budgets are example impacts.*

1. **Measures of Project Success**

*The measures of Project Success will be determined by the below*

1. All messages and interfaces developed should be transmitted within these metrics defined >> <https://developer.ibm.com/integration/docs/ibm-integration-bus/performance/message-throughput/aix-performance-report-results/>



1. High Availability of Services for Production Environment at any given time
2. Other Measures that will be used to Measure Project Success are as below
   1. Scope: An assessment of the objectives will be done at Project completion.
   2. Time: This will be determined if project was completed within define period.
   3. Budget Analysis: A budget analysis will be done to ensure that Project was completed in line with allocated financial input.
   4. Customer Satisfaction: Surveys will be conducted to evaluate the project success these will be grouped into two i.e. Technical Surveys and Business Surveys.
3. **Assumptions**

The below assumptions have been put in place

1. Purchase Agreement Contract have been agreed upon and signed.
2. All 3rd party Vendors of Steward Bank have been notified about this project and appropriate measure taken.
3. During Project Execution Steward Bank has to ensure that they perform Full Systems Backups for the environment at Logical Partition Level.
4. All System Change requests have been applied for and approved prior to the project start.
5. An agreed upon Project Management Approach have been defined and agreed.
6. All Payments for Services have been processed in full and Licenses available to Steward Bank by Kenac.
7. The Software Medias have been download as on the Proof of Entitlement from the IBM Passport Advantages (Take Note Access can only be granted after Payment has been made to IBM the Vendor by Kenac Computer Systems)
8. House Keeping: Kenac Engineers will be provided with office space at site during the project estimated at 5 Project resources.
   1. Connection to Environments as per need.
   2. Internet connection
   3. Desks, Tables to be availed
9. Project Scope Baseline have been signed upon and agreed and all deliverables and expectations clearly defined.
10. Project teams have been setup and clear line of communication set up.
11. House Keeping: Kenac Engineers will be provided with office space at site during the project estimated at 5 Project resources.
    1. Connection to Environments as per need.
    2. Internet connection
    3. Desks, Tables to be availed
12. Environment Provisioned as per below Table

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| **Environment** | **Description** | **HDD** | **CPUs** | **Operating System** | **RAM** |
| **Production (PROD)** | APP Connect 1 (Pockets) | 1.2 Tb | 12 | Aix 7.2 or later | 32Gb |
| App Connect 2 (Pockets) | 1.2 Tb | 12 | Aix 7.2 or later | 32Gb |
| APP Connect 1 – (W-Vale\_ | 1.2 Tb | 12 | Aix 7.2 or later | 32Gb |
| App Connect 2 (W-Vale) - | 1.2 Tb | 12 | Aix 7.2 or later | 32Gb |
| **DEV** | APP Connect 1 (Pockets) | 1Tb | 8 | Aix 7.2 or later | 16Gb |
|  | App Connect 2 (Pockets) | 1Tb | 8 | Aix 7.2 or later | 16Gb |
| **QAS** | APP Connect 1 (Pockets) | 1Tb | 8 | Aix 7.2 or later | 16Gb |
|  | App Connect 2 (Pockets) | 1.Tb | 8 | Aix 7.2 or later | 16Gb |
| **UAT** | APP Connect 1 (Pockets) | 1.5Tb | 12 | Aix 7.2 or later | 32Gb |
|  | App Connect 2 (Pockets) | 1.5Tb | 12 | Aix 7.2 or later | 32Gb |
| **DR** | APP Connect 1 (Pockets) | 1Tb | 8 | Aix 7.2 or later | 16Gb |
|  | App Connect 2 (Pockets) |  | 8 | Aix 7.2 or later |  |

1. **Critical Success Factors**

We will clearly define product acceptance criteria in below scenarios

1. Technology Acceptance: various test cases will be performed on the IBM ACE Environment to ensure that each environment performs according to expectations.
2. The Defined Interfaces and Channels: Tests will be focused mainly on ability to route messages from various channels.
3. Check List Sheets will be defined for each Digital Channel that has been defined.
4. Defined Standard e.g. ISO8583 will be reviewed and tested independently.

Nb: Other Custom tests can be done on the system as per Steward Bank Expectation.

10. Roles and Project Stakeholders

Roles

The following role definitions are being applied to the resources assigned to this project:

|  |  |
| --- | --- |
| **Project Sponsor** | Provides executive team approval and sponsorship for the project. Has budget ownership for the project and is the major stakeholder and recipient for the project deliverables. |
| **Project Owner** | Provides policy definition to the Project team. Resolves all policy issues with the appropriate policy owners in order to provide a clear, decisive definition. Makes final decisions and resolves conflicts or issues regarding project expectations across organizational and functional areas. The project owner and the project manager have a direct link for all communication. The project manager will work directly with the project owner on all policy clarification. |
| **Project Manager** | Provides overall management to the project. Accountable for establishing a Project Charter, developing and managing the work plan, securing appropriate resources and delegating the work and insuring successful completion of the project. All project team members report to the project manager. Handles all project administrative duties, interfaces to project sponsors and owners and has overall accountability for the project. |
| **Steering Committee** | Provide assistance in resolving issues that arise beyond the project manager’s jurisdiction. Monitor project progress and provide necessary tools and support when milestones are in jeopardy. |
| **Stakeholder** | Key provider of requirements and recipient of project deliverable and associated benefits. Deliverable will directly enhance the stakeholders’ business processes and environment. Majority of stakeholders for this project will be agency heads, CIO’s and project management representatives. |
| **Team Member** | Working project team member who analyzes, designs and ultimately improves or replaces the business processes. This includes collaborating with teams to develop high level process designs and models, understanding best practices for business processes and partnering with team members to identify appropriate opportunities, challenging the old rules of the business and stimulating creating thinking, and identifying organizational impact areas. |

**RACI MATRIX**

|  |  |  |  |
| --- | --- | --- | --- |
| **Project Deliverable (or Activity)** | **Steward Bank** | **Kenac** | **IBM** |
| - Letter of Award | **R** |  |  |
| - Contract Signatures and Sign Off | **R** | **R** |  |
| - Project Statement of Work | **A** | **R** | **I** |
| - Project Kick Off Meeting | **R** | **R** | **I** |
| - Stake Holder Register | **A** | **R** | **I** |
| - Project Initiation Documents | **A** | **R** | **I** |
| - BRS Document Review | **R** | **R** | **I** |
| - Project Plan | **I** | **A** | **I** |
| **Planning Phase Activities** |  |  |  |
| - Business Requirements Gathering | **I** | **I** | **C** |
| - Technical Requirements Gathering | **I** | **I** | **I** |
| - Solution Description Document | **I** | **I** | **I** |
| - Business Change Management | **I** | **I** | **A** |
| - Environment Acceptance Criteria Documents | **I** | **I** | **I** |
| - RFP Specifications Acceptance Criteria Documents | **C** | **A** | **I** |
| - Training Plans and Registers | **I** | **I** | **I** |
| - Project Scope Baseline Sign Off | **R** | **R** | **I** |
| - Migration Plan |  | **R** | **C** |
| - Testing Plan | **A** | **R** | **C** |
| - Systems Specifications Document | **I** | **R** | **I** |
| - RACI Matrix | **R** | **R** | **I** |
| - Data Gathering Sheets |  | **R** | **I** |
| **Execute Phase Activities** |  |  |  |
| - Virtual environment server setup | **R** | **I** |  |
| - Design Message Flows | **I** | **R** | **I** |
| - Design Interfaces and Secure Platforms | **I** | **R** | **I** |
| - Training Registers | **R** | **I** | **I** |
| - Training Assessment Surveys | **R** | **I** | **I** |
| - Migration to Production implementation | **C** | **R** | **I** |
| - Business Change Management | **R** | **C** | **A** |
| - Handover to Owners | **C** | **R** | **A** |
| **Control Phase Activities** |  |  |  |
| - Review Project Scope Baseline | **R** | **I** | **I** |
| - Review Project Plan | **R** | **I** | **I** |
| - Review and Approve Deliverables | **R/A** | **I** | **I** |
| - Change Management | **R** | **R** | **I** |
| - RISK Management Plan | **R** | **R** | **I** |
| - Reporting Channels | **C** | **R** | **I** |
| **Close Phase Activities** |  |  |  |
| - Issue Acceptance test certificate | **R** | **C** | **I** |
| - Close vendor contracts | **R** | **C** | **I** |
| - Handover Document | **C** | **R** | **I** |
| - Closure Report | **C** | **R** | **I** |
|  |  |  |  |

**Stakeholders**

*Identify key stakeholders by role.*

|  |  |
| --- | --- |
| **Name** | **Role** |
| Kennedy Ntini | Project Sponsor |
| Nyasha G Kwenda | Project Owner |
| Fadzai Mutakwa | Project Manager |
| Anjana Ananth | Team Member IBM |
| Peter Giath | Team Member IBM |
| Abhishek Tiwari | Team Member IBM |
| Ertugrul Koksal | Team Member IBM |
| OliFrank Nyambuya | Team Member Kenac |
| Nyasha Nyawo | Team Member Kenac |
| Simon Magumo Mahla | Team Member Kenac |
| Leeroy Pike | Team Member Kenac |
| Phineas Mautsa | SB Project Manager |
| Takudzwa Muzvidzwa | SB Project Owner |
|  |  |
|  |  |
|  |  |
|  |  |

### D. Project Approach

#### Planned Approach

This section describes the processes that will be used to prepare the project Scope Statement, create the Work Breakdown Structure (WBS), validate completion of project deliverables, and control requirement change requests to the project scope.

This Scope Management Plan addresses the following processes:

* Scope Definition
* Project Plan
* Mile Stone Definition
* Scope Validation
* Scope Control

These processes interact with each other and with the processes in the other management plans defined in the Project Management Plan. When implemented properly, the scope management processes will help effectively manage the Triple Constraint elements of Time, Schedule, and Cost to support a high quality project.

This document packages the baseline, target, for the IBM ACE Deployment, Acceptance and Change Management for Steward Bank. It also represents an as is architectural design. This document will need to be signed by the key stake holders involved in this project.

#### Project Delivery SLAs

Describe the timelines for issue resolution expected at every stage e.g.

* Review and update of Inputs into project documents will be done within 48Hrs.
* Defects resolution during testing will be done within 24hrs or 48hrs (You can classify the challenges but with a maximum turnaround time of 72hrs allowed)

### E. Project Estimates

**1. Estimated Schedule**

Key Project milestones relative to project start are as follows:

|  |  |
| --- | --- |
| **Project Milestones** | **Target Date** |
| ESB Project | MM/DD/YY |
| Activity 1 : Project Initiation and Planning | 28/11/2019 |
| Activity 2 : ACE Virtual Machines and Environment Deployment | 18/12/2019 |
| Activity 3 : ESB Developer 1 Training | 06/01/2020 |
| Activity 4 : Requirements Gathering | 13/01/2020 |
| Activity 5 : Solution Design | 27/01/2020 |
| Activity 6 : Interfaces Development and Unit Testing | 03/02/2020 |
| Activity 7 : ESB Developer 2 Training | 20/02/2020 |
| Activity 8 : Support and Integration Test | 24/02/2020 |
| Activity 9 : Support for UAT | 02/03/2020 |
| Activity 10 : Support for cut-over to Production | 09/03/2020 |
| Activity 11 : Post Deployment Support | 15/03/2020 |
| Activity 11 : Project Completion | 30/03/2020 |
|  |  |

The Above dates do not factor in UAT Testing Phase as per steward Bank Policy as well as turnaround times for 3rd Party Vendors including any scope of work that needs to be done for change management.

**2. Resource Requirements – Team and Support Resources**

*Not all resources required are known at the scope statement development stage of a project. Team and support resources may be estimated, however, based on what is known about the deliverables and the approach. Resource assumptions are stated here as well.*

The following personnel resources are required to complete this project:

|  |  |
| --- | --- |
| **Personnel Resource Types** | **Quantity** |
| Project Manager | 2 |
| Software Développer | 6 |
| Software Architect | 2 |
| Business Analystes and Auditor | 2 |
| **Total Personnel Resources** | 10 |

**3. Estimated Cost**

**Refer to Financial Proposal Fixed Term Contract**

**4. Checkpoint/ Funding Schedule**

*It is recommended that the project identify project checkpoints or phase review hold points based on specific project events.*

*5 Quality GATE Checks:*

1. **Preliminary design review**
2. **Detailed Design Review**
3. **Low Level Design review (before Build/Implementation Stage)**
4. **Operational Readiness/ Pre launch review**
5. **Closure review**

### F. Project Controls

Typical project controls are Steering Committee Meetings, Monthly Status Reports, Risk Management assessment and mitigation planning and monitoring, Issue Management, Change Management, and Communication Management.

1. **Steering Committee Meetings**

Every Month

**2. Monthly Status Reports**

Every Month

**3. Risk Management**

Example:

Ensure the project risks and associated mitigation actions are monitored and controlled in accordance with the Risk Management Plan

**4. Issue Management**

Example:

Project-related issues will be tracked, prioritized, assigned, resolved, and communicated in accordance with the Project Management Procedures:

Issue descriptions, owners, resolution and status will be maintained on an issues database in a standard format.

Issues will be addressed with the Project Owner and communicated in the project status report.

1. **Change Management**

The following process will be followed if a change to this SOW is required:



1. Kenac and Steward Bank may determine that it is necessary to exceed the number of estimated days for the Services as stated in the “Charges” section. In such event, you may authorize additional days and funding by the written request. The request must reference the SOW number. Through the end of the calendar year (i.e., December 31) during which this SOW is originally executed, additional days, funding, and End Date extension may be requested in writing, at the originally contracted daily rate, specified in the “Charges” section. If accepted or initiated by Kenac, such letter or e-mail will act as a change authorization to this SOW. All other requested changes will require execution of a Project Change Request as discussed below.
2. A Project Change Request (PCR) will be the vehicle for communicating change. The PCR must describe the change, the rationale for the change and the effect the change will have on the project.
3. The designated Project Manager of the requesting party will review the proposed change and determine whether to submit the request to the other party.
4. Both Project Managers will review the proposed change and agree to implement it, recommend it for further investigation, or reject it.
5. A PCR must be signed by authorized representatives from both parties to authorize investigation of the recommended changes. Kenac will invoice you for any such charges that may have not been clearly defined within scope. These Changes include new additions, new requirements and new expectations outside of the terms of this SOW and the Agreement. The investigation will determine the effect that the implementation of the PCR will have on schedule and other terms and conditions of this SOW and the Agreement. If there is need for Kenac to invest in additional resources the impact of the cost of the change will be communicated to the teams and PCR signed off with the additions.
6. A PCR must be accepted by authorized representatives from both parties to authorize implementation of any agreed changes to the SOW and the Agreement. Until a change is agreed to, both parties will continue to act in accordance with the latest agreed version of the SOW.
7. A PCR that has been signed by authorized representatives from both parties constitutes a change authorization for purposes of this SOW and the Agreement.
8. **Communication Management**

The following procedure will be followed to resolve a conflict arising during the performance of this SOW.

1. When a conflict arises between Steward Bank and Kenac, the project team member(s) will first strive to work out the problem internally.
2. Level 1: If the project team cannot resolve the conflict within two working days, you’re Project Manager and the Kenac Project Manager will meet to resolve the issue.
3. Level 2: If the conflict is not resolved within three working days after being escalated to Level 1, your Executive Sponsor will meet with the Kenac Project Executive to resolve the issue.
4. If the conflict is resolved by either Level 1 or Level 2 intervention, the resolution will be addressed in accordance with the Project Change Control Procedure set forth in Appendix A-1.
5. If the conflict remains unresolved after Level 2 intervention, then either party may terminate this SOW. If the conflict is addressed by termination, you agree to pay Kenac as described in the

“Termination” section of this SOW.

1. During any conflict resolution, Kenac agrees to provide Services relating to items not in dispute, to the extent practicable pending resolution of the conflict. You agree to pay invoices per this SOW and the Agreement.

### G. Authorizations

This section sets out who has authority to approve scope statement, authorize project changes, approve and accept project deliverables.

**The Scope Statement will be approved by:**

The Project Managers

Witnesses

Technical Lead

Systems Analyst

**Project Changes will be approved by:**

The Project Manager

Change Board

**Project deliverables will be approved/accepted by:**

The Project Owner

The Project Sponsor

The key Stakeholders

Specific task responsibilities of project resources will be defined in the Project/work Plan.

### G. Authorizations

*This section sets out who has authority to approve scope statement, authorize project changes, approve and accept project deliverables.*

**The Scope Statement will be approved by:**

The Project Manager

The Project Owner

The Project Sponsor

**Project Changes will be approved by:**

The Project Owner

Change Board

**Project deliverables will be approved/accepted by:**

The Project Owner

The Project Sponsor

The key Stakeholders

Specific task responsibilities of project resources will be defined in the Project/work Plan.

### H. Scope Statement Approval Form

**Project Name: ESP Project Steward Bank**

**Project Manager:**

The purpose of this document is to provide a vehicle for documenting the initial planning efforts for the project. It is used to reach a satisfactory level of mutual agreement between the project manager and the project sponsors on the objectives and scope of the project before significant resources are committed and expenses incurred.

I have reviewed the information contained in this Scope Statement and agree.

|  |  |  |  |
| --- | --- | --- | --- |
| **Name** | **Designation** | **Signature** | **Date** |
| **Steward** **Bank** | | | |
| Takudzwa Muzvidzwa |  |  |  |
| Vitalis Gumbo |  |  |  |
| Ndaiva Chimbindi |  |  |  |
| Elvis Muguti |  |  |  |
| Washington Munhenzva |  |  |  |
| Twaibu Seremani |  |  |  |
| Ranganai Magombedze |  |  |  |
| Isaac Gwenzi |  |  |  |
| Blessing Mavhiza |  |  |  |
| Merry Chinokwetu |  |  |  |
| Malvern Kuona |  |  |  |
| Tendai Mushandu |  |  |  |
| Steven Wadi |  |  |  |
|  |  |  |  |
| **KENAC Computer Systems** | | | |
| Nyasha G Kwenda |  |  |  |
| Kennedy Ntini |  |  |  |
|  |  |  |  |
|  |  |  |  |

***The signatures of the people above relay an understanding in the purpose and content of this document by those signing it. By signing this document you agree to this as the formal Project Scope Statement.***