

**TERMS OF REFERENCE**  
**Database Administrator**  
**Short Term Consultant**  
**Sindh Social Protection Authority**

**Background**

Government of Sindh (GoS), through the Sindh Social Protection Authority (SSPA), is implementing the “Strengthening Social Protection Delivery (SSPDS) System in Sindh” project with the assistance of the World Bank to strengthen social protection service delivery system and enhance accessibility and utilization of mother and child health services in selected districts in Sindh.

The project will support three components, financed through an Investment Project Financing (IPF) instrument, with US\$200 million from the International Development Association (IDA) and US\$30 million from counterpart funding. The Project components are: (a) Strengthen Sindh Social Protection Service Delivery Systems to support the modernization of systems and processes to fully operationalize the newly established Sindh SP Authority and improve its institutional capacity by strengthening the administrative, operational, policy, and planning functions and capabilities, including the development of energy efficient/climate-smart information technology (IT) systems and capacity building through the provision of technical assistance; (b) Mother and Child Support Program (MCSP) focusing on birth and first 1,000 days where risks and needs are high but programmatic responses are weak; the main objective of this component is to create demand for Maternal and Newborn Child-Health (MNCH) services and promote behavioural change to increase uptake of the MNCH services focusing on the first 1,000 days of life through the provision of CCTs in selected districts; and (c) Contingent Emergency Response with zero allocation, providing the Borrower to gain quick access to Bank financing to respond to a crisis or emergency. As part of a comprehensive disaster risk management strategy, the Contingent Emergence Response Component typically provides support for immediate rehabilitation and reconstruction needs.

**Objectives of the Assignment**

Strengthening Social Protection Delivery System in Sindh (SSPDS), intends to hire the services of a “**Database Administrator**” to provide for SSPA databases.

**Responsibilities and work scope:**

- I. Plan, design and implement standard procedures to ensure the regular and ongoing operation and use of SSPA databases under the operational database platform selected by SSPA
- II. Apply the required operational procedures to ensure an effective and efficient continued operation of SSPA database environment, which includes all database ancillary processes as well as the hardware systems on which the database runs.
- III. Design and implement the necessary processes to ensure high availability, high performance and high security, as baseline quality requirements;
- IV. Provide the necessary database support to SSPA users, as needed for the design and implementation of SSPA application Systems, databases and other data files. This support may include the use of data dictionaries, database and table design, database modelling and development of technical procedures to support the application implementation process
- V. Design and produce database operation reports and statistics to monitor the operation and performance of the database activity to ensure quality, data reliability, security and

- maintenance of data content, including the use of periodic data backup and data restore procedures, as part of the standard data operation
- VI. Ensures that storage, archiving, backup and recovery procedures are functioning correctly
  - VII. Cross-check or integrates databases of SSPA programs for beneficiary eligibility
  - VIII. Communicate regularly with technical, applications and operational staff to ensure database integrity and security
  - IX. Documenting processes, as well as backing up and archiving data
  - X. Developing data retrieval and recovery procedures
  - XI. Monitor and administrate security and privacy of database as specified in the programme rules and regulation guidelines.
  - XII. Develop and provide a weekly project status report describing the development of the above activities and any issues that may emerge, with conclusions and recommendations in regards to the SSPA database operation
  - XIII. Perform any other function, as assigned by the management, related to the assignment

## **SUPERVISION**

The individual consultant will work with MIS department to perform the assigned tasks and will report to the MIS Specialist.

## **QUALIFICATIONS AND EXPERIENCE**

Following are qualification/skill requirements for the position:

- At least a Bachelor's degree (16 years) in Software Engineering, Computer Science, Information Technology or a related field.
- At least four (04) years' experience of working as Database Administrator in an organization with large software infrastructure
- Knowledge and experience of using the MySQL database platform
- Proven database programming experience with PL SQL (1+ year), SQL / Optimization, Oracle / MySQL (large scale Systems)
- Replication, Materialized Views, design and implementation of large database systems
- Knowledge and experience on software development environments and languages, relational databases
- Experience in applications software analysis, design, and development
- Should have strong background in systems design and implementation, including knowledge and experience with system life-cycle development methodologies
- Good analytical and communication skills

## **Selection Process**

The selection will be made using open competitive selection in accordance with the "World Bank Procurement Regulations for Investment Project Financing Goods, Works, Non-Consulting and Consulting Services" revised in November 2020.