



## PALLI KARMA-SAHAYAK FOUNDATION (PKSF)

[www.pksf.org.bd](http://www.pksf.org.bd)

Ref. No: 53.23.0000.001.03.001.26.685

Date: 27 January 2026

### **Subject: Request for Expression of Interest (REOI): Selection of Software Development Firm for the Design, Development, and Implementation of the PKSF's Integrated Systems Platform titled “Decision Support System (DSS)” as complete turnkey solutions**

Palli Karma-Sahayak Foundation (PKSF), established by the Government of Bangladesh in 1990, is the country's apex development finance and institution-building organization dedicated to fostering inclusive, sustainable, and equitable growth. Guided by its **Strategic Plan 2025–2030**, and building upon more than three decades of experience in promoting employment, enterprise, and resilience among low-income communities, PKSF is now taking a decisive step toward institutional digital transformation through the design and implementation of an **Integrated Systems Platform (ISP)**, which will serve as the foundation for a comprehensive **Decision Support System (DSS)**.

PKSF currently serves more than **21 million members** through a nationwide network of over **200 Partner Organizations (POs)**, operating across more than 20,000 branches. The organization delivers integrated programs in inclusive finance, enterprise development, agriculture, risk mitigation, skill enhancement, healthcare, and climate adaptation. To sustain its leadership in inclusive development, PKSF is transitioning toward a **digitally empowered, knowledge-based institution**—capable of leveraging **data intelligence, automation, and artificial intelligence (AI)** for evidence-based policy formulation, operational efficiency, and real-time decision-making.

In alignment with this transformation, PKSF invites **Expressions of Interest (EOI)** from qualified and experienced **software development firms** for the **design, development, and implementation** of the **Integrated Systems Platform (ISP)**—titled **Decision Support System (DSS)**—as a **complete turnkey solution**.

The **ISP-DSS** will function as the central digital ecosystem of PKSF, integrating approximately **60 modules and sub-modules** including at least 3 mobile apps that encompass the institution's financial, operational, developmental, and administrative domains. This unified platform will enable interoperability across departments, projects, and Partner Organizations, allowing seamless data exchange, automated workflows, and institution-wide visibility. The system will also ensure bilingual (Bangla–English) accessibility, scalability, and security while adhering to PKSF's governance and accountability standards.

At the core of the proposed **DSS** lies a sophisticated **Business Intelligence (BI) and Advanced Analytics Layer**, which will consolidate structured and unstructured data from PKSF's internal systems and external sources. This layer will provide comprehensive, real-time analytical capabilities for performance monitoring, KPI tracking, financial oversight, risk assessment, and resource allocation. Through interactive dashboards, spatial analytics, and scenario-based forecasting, the DSS will enhance PKSF's ability to generate actionable insights, improve transparency, and strengthen institutional governance.

In addition, the DSS will be integrated with **AI-driven analytical and cognitive tools** to support intelligent automation, predictive modeling, and natural language-based user interaction. These **AI components** will include anomaly detection, forecasting, and policy recommendation engines that enable management and program teams to anticipate risks, evaluate outcomes, and make data-informed strategic decisions. The system will also feature a

conversational **AI Agent**, enabling users to query data and visualize information intuitively in both Bengali and English.

By combining interoperability, integration, and intelligence, the **ISP–DSS** will enable PKSF to transform its institutional processes—from data collection and validation to reporting and decision-making—into a seamless, automated, and data/knowledge-driven cycle. This initiative represents a cornerstone of PKSF’s strategic goal to build a **digitally transformed, insight-oriented, and future-ready organization**, aligning with PKSF’s **Strategic Plan 2025–2030**, and the Government of Bangladesh’s broader vision for inclusive finance and development.

The Terms of Reference (TOR) for the assignment, attached as DRAFT along with this REOI is part and parcel of this bidding document. The final TOR will be provided with RFP documents. This REOI is intended solely for shortlisting qualified firms based on experience, capacity, and institutional readiness. Detailed functional specifications, architecture, technology stack finalization, MVP structuring, milestones, and payment linkage shall be finalized at the RFP stage based on the final TOR. Information provided in the Draft TOR at this stage is indicative and non-binding for EOI evaluation.

#### **Necessary Information:**

<b>A. Basic Information (Procuring Entity, Assignment, Procuring Method, Source of fund, etc.) for the Software Development Firm(s):</b>		
1.	Name of the Organization	Palli Karma-Sahayak Foundation (PKSF)
2.	Procuring Entity Name & Designation	Md. Hasan Khaled, Deputy Managing Director
3.	Expression of Interest (EOI) for	Selection of Software Development Firm for the Design, Development, and Implementation of the PKSF’s Integrated Systems Platform titled “Decision Support System (DSS)” as complete turnkey solutions.
4.	EOI Ref. No.	53.23.0000.001.03.001.26.685; <b>28 January 2026</b>
5.	Package No.	PKSF/IT/2025-2026/SD-01
6.	REOI Publishing Date	28 January 2026
7.	Procurement Method	Quality and Cost-Based Selection (QCBS)
8.	Source of Fund	PKSF Own Fund
9.	EOI Closing Date & time	<b>Date: 26 February 2026   Time: 2:30 PM</b>
10.	EOI Submission Place	PKSF Bhaban-1, Plot: E-4/B, Agargaon Administrative Area, Sher-e-Bangla Nagar, Dhaka-1207
<b>B. Key Information for the Software Development Firm(s):</b>		
11.	Brief description of the assignment	<p><b>A. Objectives of the Assignment</b></p> <ul style="list-style-type: none"> <li>i. <b>Deliver a Unified Decision Support System:</b> Design, develop, and implement a modern, integrated DSS that consolidates financial, operational, developmental, and related data into a single interoperable platform.</li> <li>ii. <b>Ensure System Modernization and Integration:</b> Replace existing legacy systems with a unified platform covering all functional requirements, ensuring seamless inter-module integration and bilingual (Bengali-English) accessibility.</li> </ul>

	<p>iii. <b>Implement Advanced Analytics Capabilities:</b> Provide solutions/tools for KPI monitoring, scenario modeling, forecasting, and spatial visualization to support evidence-based decision-making, institutional resilience, and policy formulation.</p> <p>iv. <b>Enable Comprehensive Beneficiary and Partner Management:</b> Build a centralized repository to track beneficiaries and partner organizations to support efficient service delivery.</p> <p>v. <b>Integrate Financial and Resource Management:</b> Develop dashboards and reporting tools for monitoring loan portfolios, funding from government and different development partners, program and project expenditures, etc. enabling real-time financial visibility and informed fund allocation.</p> <p>vi. <b>Embed Knowledge, Risk, and Compliance Intelligence:</b> Develop solutions to incorporate knowledge management, risk monitoring, and compliance tracking with AI-driven analytics, predictive reporting, and automated alerts for proactive governance.</p> <p>vii. <b>Create an Open-Sourced AI Agent for PKSF's DSS:</b> Develop an intelligent, open-sourced AI agent integrated within the DSS to enhance user interaction, automate routine analytical tasks, and support natural language queries. The AI agent will enable users to retrieve insights and visualize data through conversational interfaces in both Bengali and English. It will also assist in predictive analytics, anomaly detection, and policy recommendations, contributing to smarter, faster, and more inclusive decision-making across PKSF's operational ecosystem.</p> <p>viii. <b>Develop a Scalable and Secure Integrated Systems Platform:</b> Build a robust, interoperable, and secure Integrated Systems Platform with workflow automation, cybersecurity measures, and full compatibility with PKSF's digital transformation goals.</p> <p>ix. <b>Implement Media Archive and Document Management:</b> Establish a centralized, searchable media and document management module for storing, organizing, and retrieving digital assets such as reports, images, videos, publications, and official correspondence. The system will support metadata tagging, version</p>
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	<p>control, and secure access permissions, ensuring efficient information governance, institutional memory preservation, and easy knowledge sharing across departments.</p> <p>x. <b>Accessibility and User Adoption:</b> Deliver a user-friendly platform optimized for web and mobile (online/offline), provide comprehensive training, and ensure high user proficiency and engagement.</p> <p>xi. <b>Data Migration and System Reliability:</b> Migrate legacy data using an appropriate Extract, Transform, and Load (ETL) process with high integrity, conduct thorough testing, and deploy a production-ready system with monitoring, support, and knowledge transfer to PKSF.</p> <p>xii. <b>Provide Post-Deployment Support and Continuous Improvement:</b> Provide maintenance support, system monitoring, feedback integration, and change management to ensure sustainability, continuous learning, and operational excellence.</p> <p><b>B. Scope of Work</b></p> <p>The selected Software Development Firm will provide end-to-end services across the complete software development lifecycle:</p> <ul style="list-style-type: none"> <li>i. <b>Project Initiation and Planning:</b> Establish governance structure, develop a comprehensive 30-months project plan (18 months development and 12 months maintenance and technical support) with key milestones, conduct risk assessment with mitigation strategies, and allocate resources coordinating with PKSF for system access.</li> <li>ii. <b>Requirements Analysis:</b> Conduct stakeholder workshops and interviews, perform data migration analysis of both licensed and open-source database and Excel sources, identify integration requirements with third-party systems, and produce Software Requirements Specification (SRS) with complete BRD coverage.</li> <li>iii. <b>System Design:</b> Develop modular PostgreSQL-based architecture, create wireframes and interactive prototypes, define detailed ETL architecture with data mapping and transformation rules, design secure API architecture, and produce comprehensive design documentation.</li> <li>iv. <b>Development and Integration:</b> Implement all BRD modules using modern frameworks,</li> </ul>
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	<p>develop backend services (Java), frontend interfaces (React), and mobile applications (Flutter) with offline functionality. Develop automated ETL tools, build API integrations, and establish CI/CD pipelines with 90% unit test coverage.</p> <p>v. <b>Data Migration Execution:</b> Execute secure extraction from source systems, apply transformation and cleansing, load data into PostgreSQL with validation, conduct comprehensive reconciliation ensuring zero data loss and 99% integrity, and archive legacy data securely.</p> <p>vi. <b>Testing and Quality Assurance:</b> Conduct comprehensive testing, including unit, integration, system, performance (1,000 users), security (penetration testing), offline functionality, and User Acceptance Testing achieving 95% UAT approval.</p> <p>vii. <b>Deployment and Go-Live:</b> Deploy to PKSF infrastructure with high-availability configuration, execute pilot deployment followed by phased rollout, implement monitoring systems, and complete cutover from legacy systems.</p> <p>viii. <b>Training and Knowledge Transfer:</b> Develop comprehensive training materials in Bengali and English, deliver tailored training for end-users, administrators, and the IT team, conduct proficiency assessments, and complete knowledge transfer enabling independent operation.</p> <p>ix. <b>Documentation (Throughout Project):</b> Produce multilingual user manuals, comprehensive technical documentation, operational procedures, data migration documentation, and fully commented source code (90% coverage).</p> <p>x. <b>Post-Deployment Support:</b> Provide maintenance support with 24-hour critical issue resolution SLA, implement system monitoring with monthly reports, collect and integrate user feedback, and complete knowledge transfer to PKSF IT team.</p> <p><b>C. Further breakdown of the scope is as follows:</b>  Further breakdown of the scope includes, but is not limited to (for details please see the TOR and other attached documents):</p> <p>i. Partner integration (APIs, authentication, data exchange with 200+ POs)</p>
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		<ul style="list-style-type: none"> <li>ii. Workflow- and Document-Driven Office Automation (configurable workflows, approvals, task management, e-document repository, versioning, audit trail)</li> <li>iii. AI-driven Data Analytics and Reporting Engine (data ingestion, ETL pipelines, dashboards, predictive analytics, anomaly detection)</li> <li>iv. Secure Microservices-based Platform using Java Spring Boot, Spring Cloud, PostgreSQL, and Python (for analytics modules)</li> <li>v. Containerization and Deployment using Docker/Kubernetes, ensuring scalability and fault tolerance</li> <li>vi. Implementation of Role-Based Access Control, Encryption, and Authentication (OAuth2/OpenID Connect)</li> <li>vii. Integration with PKSF's existing applications, databases, and third-party systems</li> <li>viii. Data migration, integration, and interoperability with existing systems</li> <li>ix. Comprehensive testing, security hardening, and performance tuning</li> <li>x. Training, documentation, and knowledge transfer for PKSF staff and POs</li> <li>xi. Initial 12 months of post-deployment support and SLA-backed maintenance (extendable)</li> <li>xii. The total duration of the project shall be thirty (30) months (18 months for development and implementation, followed by 12 months of maintenance and technical support), as detailed in the Draft TOR. The firm will work closely with PKSF's IT Division and designated departmental teams.</li> </ul>
12.	Others Details	<p>EOI, in two sets (1 original &amp; 1 duplicates) each with supporting documents, must be submitted (using shortlisting questionnaire with attached formats) in sealed envelope at the PKSF Bhaban-1, Plot: E-4/B, Agargaon Administrative Area, Sher-e-Bangla Nagar, Dhaka-1207 directly or by courier/mail and be clearly marked on the envelope:</p> <p><b>Selection of Software Development Firm for the Design, Development, and Implementation of the PKSF's Integrated Systems Platform titled "Decision Support System (DSS)" as complete turnkey solutions</b></p>

<b>C. Procuring Entity Details</b>		
	Name of the Official	Md. Mashiar Rahman
	Designation of the Official	Deputy Managing Director
	Address of the Official	PKSF Bhaban-1, Plot: E-4/B, Agargaon Administrative Area, Sher-e-Bangla Nagar, Dhaka-1207
	Contact details of the Official	Phone No.: 02222218331-33 & 02222218335-39 Email: mashiar_rahman@yahoo.com www.pksf.org.bd, www.facebook.com/pksf.org.bd
13.	Experiences, resource, and delivery capacity required of the software development firm(s)	<p><b><u>Interested software development firms are encouraged to participate through Joint Venture (JV) arrangements. Joint Ventures in which both the Lead Firm and each partner firm independently and separately meet all eligibility and qualification criteria, will be given strong preference during evaluation. Such collaborations are expected to enhance technical capacity, ensure comprehensive coverage of required expertise, and strengthen overall project delivery.</u></b></p> <p>i. The firm should have <b>7 (seven) years of successful experience</b> in software project design and development, including:</p> <p>a) Must have experience in developing and delivering at least 1 (One) full-scale enterprise-level system (i.e. ERP/Core Banking Solutions/Digital Financial (FinTech) Solutions), implemented as on-going complete solution in last five (05) years with a combined value of BDT 10.00 (ten) crore.</p> <p style="text-align: center;">Or</p> <p>Must have experience in developing and delivering large-scale enterprise applications implemented as on-going complete solution in last 5 (five) years with a combined value of BDT 10.00 (ten) crore.</p> <p>b) Must have experience in developing, deploying, and maintaining at least 2 (two) enterprise-level interactive mobile applications for both Android/iOS platforms, integrated with secure and scalable backend systems in last 5 (five) years. (A two-page brief project summary or case study describing the scope, technology stack, key features, user base, and mobile application development, deployment, and maintenance methodology used.)</p> <p>c) Must have demonstrated successful experience in cross platform data migration, both from commercial and open-source databases,</p>

	<p>involving large-scale databases and mission-critical systems, including data extraction, transformation, loading (ETL), data quality assurance, and seamless migration from legacy to modern systems without data loss or service interruption. (A two-page brief case study describing the scope, technology stack, data volume, and migration methodology used.)</p> <p>d) Must demonstrate software development and software service-delivery contracts with a cumulative value of at least BDT 40 crore (Taka forty crore) executed within the last 5 (five) years including both software development contract and relevant Service Level Agreements (SLAs).</p> <p>ii. The software development firm must have proven expertise in the following technology stack:</p> <p>PostgreSQL, React.js/Angular.js/Vue.js, Java (Spring Boot or other relevant well known Java frameworks), Flutter, and microservices-based architecture. Experience in NoSQL database, Spring Cloud, Python language will be considered as added expertise. The firm must provide evidence of this expertise in the last 5 (five) years through project summaries, architectural diagrams, or deployment documentation, while ensuring adherence to any applicable non-disclosure agreements (NDAs).</p> <p>iii. <b>The software development firm</b> with the following expertise will be given preference:</p> <ol style="list-style-type: none"> <li>Demonstrated experience in developing and implementing Business Intelligence (BI) solutions, such as Teradata or equivalent platforms.</li> <li>Demonstrated expertise in conducting proofs of concept (POC), prototyping, and end-to-end development and deployment. (Non-sensitive mock-ups, prototypes, architecture diagrams, or screenshots that illustrate the firm's capabilities while keeping client-specific data confidential.)</li> <li>Proven experience in designing, developing, and deploying AI-driven solutions integrated into enterprise systems. This includes experience in implementing natural language processing (NLP), predictive analytics, recommendation</li> </ol>
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engines, anomaly detection, or intelligent chat/virtual assistants.

#### **iv. Certifications and Memberships**

**a) Mandatory Requirements:** The following certifications and memberships are compulsory for eligibility:

1. Active and valid membership with the Bangladesh Association of Software and Information Services (BASIS).

**b) Preferable Requirements:**

The following certifications and recognitions are not mandatory but will be considered added advantages during evaluation:

1. CMMI (Capability Maturity Model Integration) Level 3 or above certification for software development processes. ISO certifications demonstrate adherence to international standards.
2. Cloud partnership certification with at least one major global cloud platform (e.g., AWS, Microsoft Azure, Google Cloud Platform, VMware or Oracle Cloud)

#### **A. Legal information of the software development firm:**

<b>Sl. No.</b>	<b>Name of the documents</b>	<b>Please attach the copy with the proposal</b>
1	Cover Letter on company letterhead	
2	Company Brochure	
3	Trade license (Updated)	
4	Registration/Incorporation certificate	
5	VAT certificate	
6	Income Tax Assessment/Acknowledgement Certificate (Updated)	
7	BASIS Membership Certificate (Updated)	
8	In case of Joint Venture must have Legal documents	
9	Certifications (ISO/CMMI, cloud partnership) (with validity)	

**B. Financial Capacity:**

Sl. No.	Name of the documents	Please attach the copy with the proposal
1	Bank Solvency Certificate along with last 03 years financial transaction statement from the EOI submission date	
2	Audited Financial Report (last 03 years) Only the summary of the signed reports is required.	

**C. The software development firm's profile:**

Sl. No.	Name of the documents	Please attach the copy with the proposal
1	Description about firm's (in maximum two pages).	
2	List of organizational committee members/ Board of Directors	

**D.** List of existing assignment related professional manpower (Project Manager, Scrum Master, Tech Lead, Developers, QA, DevOps with clear responsibilities and authority levels. Notably, the qualifications of the consultants will not be considered in the EOI evaluation and shortlisting process).

Sl. No.	Name of the professionals	Designation	Total years of experience

\*Please add more rows if necessary

**E. List of existing resources:**

Sl. No.	Name of the resources	Number	Please attach the list with the proposal
1.	Desktop computers		
2.	Laptops		
3.	Printers		
4.	Photocopiers		
5.	Office space (sqft)		
6.	Vehicles		

**F. The software development firm's experiences:**

- List of completed Project / Solutions at least one (1) full-scale enterprise-level system, such as ERP, Core Banking Solutions, Digital Financial (FinTech) Solutions, each implemented as a complete turnkey solution

Or

large-scale applications implemented as a complete turnkey solution

SL	Project / Solution Name	Type (ERP/ Core Banking/ FinTech/ Large-Scale App)	Turnkey (Yes /No)	Client(s) / Procuring Entity(s) (Details including contact information)	Contract Value (BDT)	Project Timeline (start date) to (Go-Live Date)	Scope / Key Modules	Tech. Stack & Arch.	Evidence (Completion certification /Link)

\*Please add more rows if necessary

b) List of contracts for software development, software service delivery, and associated Service Level Agreements (SLAs) executed within the past five (5) years, with an aggregate value of BDT 40.00 crore (forty crore) across one or more projects

SL	Project / Solution Name	Type (software development, software service delivery, and associated Service Level Agreements (SLAs))	Client(s) / Procuring Entity(s)	Contract Value (BDT)	Project Timeline (start date) to (Go-Live Date)	Evidence (Completion certification /Link)

\*Please add more rows if necessary

c) Description of enterprise-level Mobile Apps deployed **in last five (5) years**.

SL	App Name	Platform (Android/ iOS)	Enterprise Use Case	Backend System (API/ Services)	Users / Installs	Go-Live Date	Availability /Uptime	Tech. Stack (Flutter, etc.)	Evidence (Play Store/ App Store link)

\*Please add more rows if necessary

d) Description of cross platform data migration experience

SL	Project / Client	Source DB(s)	Target DB	Data Volume (GB / Rows)	ETL Tools & Methods	Downtime Window	Data Quality %	Zero Data Loss (Yes /No)	Go-Live Date	Evidence / Case Study (2-page brief)

\*Please add more rows if necessary

		e) Statement of technology Stack experience in the last 5 Years																					
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		<b>3. Frontend Web Development (React)</b>																					
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<p><b>Frontend Development</b></p> <p>Frontend stack: React, Next.js, or Angular.</p> <p>Key Features: User authentication, dynamic routing, real-time data synchronization, and a complex data model.</p>	State Management	Redux/Redux Toolkit, Zustand, or Context API - appropriate for PKSF scale	
	Component Architecture	Component design, reusability, atomic design, component libraries	
	UI/UX Framework Implementation	Material-UI, Ant Design, or custom design system implementation	
	Performance Optimization	Code splitting, lazy loading, memorization, bundle optimization	
	Responsive & Accessibility	Mobile-first design, WCAG compliance, cross-browser compatibility	
	<b>4. Database Design &amp; Management (PostgreSQL)</b>		
<p><b>Database Design &amp; Management</b></p> <p>PostgreSQL database.</p>	Criteria	Specific Tech / Framework (such as.)	Project specific details
	PostgreSQL Expertise & Version	PostgreSQL 14+, advanced features (JSONB, full-text search, partitioning)	
	Database Design & Modeling	Normalization, indexing strategy, schema design, referential integrity	
	Performance Tuning	Query optimization, explain plans, index optimization, connection pooling	
	Data Partitioning Strategy	Table partitioning for large tables, partition pruning, maintenance	
	Backup & Recovery	Backup strategies, PITR, replication, disaster recovery, data retention	
	Security & Access Control	Role-based access, row-level security, encryption at rest, audit logging	
<b>5. Mobile App Development (Flutter)</b>			
<p><b>Mobile App Development</b></p> <p>Flutter framework.</p>	Criteria	Specific Tech / Framework (such as.)	Project specific details
	Flutter Expertise & Version	Flutter 3.x+, Dart proficiency, cross platform optimization	
	Mobile Architecture	BLoC/Provider/Riverpod pattern, clean architecture, state management	
	Native Features Integration	Camera, GPS, biometrics, offline capabilities, push notifications	
	Performance & Optimization	App size optimization, smooth animations (60fps), memory management	
	Offline-First Capabilities	Local storage (SQLite), sync mechanisms, offline transaction handling	
	Platform-Specific Optimization	Android/iOS specific optimizations, native code integration if needed	

6. Automation & Tools		
Criteria	Specific Tech / Framework (such as.)	Project specific details
Automation Tools & Frameworks	Selenium, Cypress, Playwright, JUnit, Jest, Postman/RestAssured for APIs	
CI/CD Pipeline	Jenkins/GitLab CI/GitHub Actions, automated builds, automated deployments	
Containerization & Orchestration	Docker expertise, Kubernetes/Docker Swarm, container security	

\*Please add more rows if necessary

f) List of experience with Business Intelligence (BI) Solutions

SL	BI Platform (Teradata/ Equivalent)	Project / Client Name	Use Case / Domain	Data Volume / Rows	Dashboards / Reports	Deployment Year	Evidence (Doc Ref/ Link)

\*Please add more rows if necessary

g) List of experience with POC / Prototyping to Production

SL	POC / Prototype Title	Project / Client Name	Objective	Key Artifacts (Mockups/ Diagrams)	Implementation Technologies & Tools	Evidence (Doc Ref/Link)

\*Please add more rows if necessary

h) List of experience with AI-Driven Solutions in Enterprise Systems

SL	Capability Area (NLP/ Predictive/ Recommender/ Anomaly/ Assistant)	Project / Client Name	Model / Technique	Training Data (Size/ Source)	Integration Point (Workflow/ API/UI)	Outcomes	Evidence (Doc Ref/Link)

\*Please add more rows if necessary

The Procuring Entity reserves the right to accept or reject any or all EOIs without assigning any reason whatsoever. Only shortlisted firms will be invited to submit detailed proposals under the Request for Proposal (RFP) stage. Submission of EOI does not guarantee selection.

**Deputy Managing Director-4, PKSF**