

Terms of Reference

National Consultancy: Cash Transfer Programme APIs Development, National Social Protection Council (NSPC)



1. Background

The National Social Protection Council (NSPC) leads the Royal Government of Cambodia's (RGC) efforts to build a social protection system as a tool to reduce poverty, vulnerability, and inequality, contributing to the development of human resources and economic growth. The General Secretariat for the National Social Protection Council (GS-NSPC) is responsible for monitoring and evaluating the implementation of the National Social Protection Policy Framework to ensure transparency and accountability, efficiency, and consistency. UNICEF is supporting the GS-NSPC to develop and implement a Monitoring and Evaluation (M&E) system.

The M&E system serves as a management tool for the GS-NSPC to effectively fulfill its mandated M&E functions. The system facilitates the collection, analysis, and use of routine service/beneficiary statistics, budget and expenditure data, as well as payment and administrative statistics to enable comparative analysis and calculation of the administration-to-benefit ratio, and cost-per-beneficiary by social program components and social protection schemes, which will enable the progress tracking toward achieving goals and informed management decision-making. The system will organize social protection input, output, outcome, principle, and impact indicators to measure progress on poverty, vulnerability, and inequality reduction. The system facilitates performance tracking through easy online access and data entry from the eight line-ministries reporting units. As indicators are specific to the line-ministries/reporting units, the data entry is customized. This system is integrated with the current web-based system of the GS-NSPC. The main purpose of the M&E system is to facilitate the effective and efficient monitoring and evaluation of the RGC's social protection investments and ensure the achievement of the National Social Protection Policy Goals.

2. Purpose

The purpose of this consultancy is to provide IT Technical Assistance to NSPC to develop a Cash Transfer Programme to enable (1) Real-time data synchronization via Application Programme Interfaces (APIs); (2) Reporting dashboard; (3) Automated reporting; and (4) Integration to the GS-NSPC's web-based system.

3. Work Assignment

The key assignments for the consultancy include and require:

a. Review of the available materials

Study the existing web-based system to understand its design and structure.

b. Development

- Development of the APIs for real-time data synchronization;
- Development of Reporting Dashboards (5 dashboards) in total of 16 visuals; and
- Development of Automated Reporting.

c. Software Integration

- Provide technical support to integrate the new system with the existing system and migrate data into MSSQL database server.
- Provide Project Source Code, SQL Script, and Database.

d. Platform and Technology Requirements

- The proposed system enhancement must be integrated with the current web-based M&E system of GS-NSPC.
- The system shall be fully functional in both Khmer and English.
- The proposed system would be hosted on Windows Server 2012 using the IIS web server version 8.0, the data will be stored in the MSSQL database server.
- The entire system will be implemented in ASP.NET Framework and using the MVC pattern. The choice of the front-end programming language and back-end platform will be C#, JavaScript and MSSQL.
- The system must also make use of any popular front-end UI frameworks such as Twitter Bootstrap, Foundation, Google Material Design, Semantic UI, etc.
- The standard report shall be implemented using the RDLC report and for ad hoc reports; the system will have a customized Query Builder feature. In every report, there shall be a feature to export the report as an MS Excel Sheet, MS Word and PDF formats.

e. Security Features

- The software shall have standard security features inbuilt to ensure the integrity of data and the software does not have any flaws or bugs which inadvertently or by design, permit the users to tamper, alter or modify any data without the appropriate permissions.
- The software should include security components built into in the architecture including: (1) the system should ensure that the users follow login procedures; (2) access to the database should be based on the user roles set by GS-NSPC; and (3) the SSL Certificate must be installed.
- The contractor shall suggest suitable security components required in software. In case of any failure, contractor shall be responsible to troubleshoot the issues for the duration of the warranty period.

f. Concurrency, Browser Compatibility and Bandwidth Optimization

- Since the bandwidth of the network through which the application is going to be used is low; the software developed must run optimally (page load time below 10 seconds) on a PC connected to a network with minimum network bandwidth of 56 kbps. The system, including the database, must provide at least 100 concurrent accesses. The system developed must be compatible with and well rendered in Microsoft Internet Explorer 11 and above, Mozilla Firefox 50.0 and above, Google Chrome 55.0 and above, and Safari.
- The system must be responsive and run on any screen sizes including smartphones. Using modern UI frameworks for responsive design is highly recommended.

g. Development Methodology

- The modular-based approach based on the prototyping model must be used for the design and development of the system enhancements.
- The contractor will initially carry out a detailed requirement study including Process Re-engineering wherever possible, which will result in the formulation of a Software Requirement Specification (SRS) document, Software Design document and associated AS-IS and TO-BE workflows.
- On acceptance of SRS, workflow, and design documents by the client/procuring agency, the contractor will develop and present a non-functional prototype (HTML, CSS prototype) of the system to the client and obtain approval for each module. This will facilitate user acceptance of the system enhancements.

- After the development is completed, the software will be first tested on the premises of the contractor by the testers from the contractor's side.
- The testing of the software package with sample test data will be done at the contractor's side and will be presented to GS-NSPC. After the GS-NPSC acceptance test succeeds, the software will be deployed for live operation at MEF's VM after migration into the existing web-based system of GS-NSPC.

h. Warranty, Support, Maintenance & Change Management

- Provide support for a period of 6 months from the time of acceptance of the software by GS-NSPC (i.e. warranty support).
- During the above-mentioned warranty period, the consultant will be responsible for making minor changes within the existing scope described in this TOR, as well as to fix the bugs, if any.

i. Ownership of Source Code

The GS-NSPC will be the rightful owners of the Source Code and all Intellectual Property associated with the system and will have full rights over the ways they can use these resources. The contractor will have no right to commercially use or apply the software elsewhere.

4. Qualifications or Specialized Knowledge/Experience Required

Qualifications and Experience.

At least 5-year experience on website development using ASP.NET MVC and MSSQL (proven evidence of website development should be provided when sending the proposal).

Knowledge and Skills.

Professional and responsive project team with proven ability to meet tight deadlines and deliver quality work products.

Competencies of Successful Candidate.

Strong communication and facilitation skills, experience working with Government stakeholders and private sector clients on similar projects. Commitment and flexibility to meet client expectations.

Languages.

Proficiency in written and spoken Khmer and English.

5. Location

The consultant is expected to work in-country and full-time, based in the GS-NSPC Office. No travel is foreseen.

6. Duration

The consultant is expected to work for a period of 60 working days, with an expected starting date of 1 February. The indicative schedule of the work assignments with specific timelines is mentioned in "7. Deliverables."

7. Deliverables

The indicative schedules of the work assignments with specific timelines are in the below table:

<i>Deliverables</i>	<i>Timeframe</i>	<i>Payment (including travel costs)</i>
<u>Deliverable 1: APIs for real-time data synchronization</u> Revised Technical Proposal Presentation and web-based functional system delivered Integration with GS-NSPC’s web-based system completed Project Source Code delivered SQL Script delivered Database developed and delivered Report on system adjustment and updates	7 working days	15%
<u>Deliverable 2: Reporting Dashboard</u> Presentation and web-based functional system delivered Integration with GS-NSPC’s web-based system completed Project Source Code delivered SQL Script delivered Database delivered Report on system adjustments and updates	45 working days	70%
<u>Deliverable 3: Automated Reporting</u> Integration with GS-NSPC’s web-based system completed Project Source Code delivered SQL Script delivered Database delivered	3 working days	5%
<u>Deliverable 4: Maintenance services</u> Report on system adjustments and updates (Warranty and Technical Support for 6 months)	5 working days	10%
<u>Total</u>	60 working days	

8. Reporting Requirements

This assignment requires the Consultant to produce work plans for each deliverable output and progress reports (maximum three pages) in English against the above objectives and activity plan and submit them to the GS-NSPC and UNICEF.

9. Payment Schedule linked to deliverables

Payment terms in relation to key deliverables are specified in the “Deliverables” section. The payment is made at the end of the project after all deliverable outputs completed and upon the submission and approval of the final deliverable outputs by the GS-NSPC.

** The fees shall be calculated based on the days estimated to complete the assignment in the Terms of Reference and shall be considered the maximum compensation as part of a lump sum contract and agreed on a work plan for submission of deliverables. No additional fees shall be paid to complete the assignment. Payment will be made upon delivery of all final products and full and satisfactory completion of the assignment.*

10. Administrative Issues

No travel expected during this consultancy

11. Contract supervisor

The consultant will work under the supervision of the GS-NSPC and UNICEF Social Policy Specialist. Compliance with the ToR and timely delivery of the expected deliverables will be closely monitored. Upon completion of work assignments, the supervisor will evaluate the consultant's work, certify relevant documents and process/follow-up on the payments.

12. Nature of 'Penalty Clause' to be Stipulated in Contract

Unsatisfactory performance: In case of unsatisfactory performance the contract will be terminated by notification letter sent five (5) business days prior to the termination date in the case of contracts for a total period of less than two (2) months, and ten (10) business days prior to the termination date in the case of contracts for a longer period

Performance indicators: Consultants' performance will be evaluated against the following criteria: timeliness, quality, and relevance/feasibility of recommendations for UNICEF Cambodia.

13. Submission of applications

Interested candidates are kindly requested to apply and upload the following documents to: <http://www.unicef.org/about/employ/> by 20 January 2022

- Letter of Interest (cover letter)
- CV or Resume
- Performance evaluation reports or references of similar consultancy assignments
- Financial proposal: All-inclusive lump-sum cost including travel and accommodation cost for this assignment as per work assignment.

14. Assessment Criteria

A two-stage procedure shall be utilized in evaluating proposals, with evaluation of the technical proposal being completed prior to any price proposal being compared.

Applications shall therefore contain the following required documentation:

- a. Technical Proposal: Containing a cover letter, updated CV or resume, and copies of 2 relevant performance evaluation reports or references of similar consultancy assignments conducted by the consultant. No financial information should be contained in the technical proposal.
- b. Financial Proposal: Lump-sum offer with the cost breakdown, including consultancy and any other cost required for this consultancy.

For evaluation and selection, the Cumulative Analysis Method (weight combined score method) shall be used for this selection process. The maximum number of points shall be allotted to the lowest Financial Proposal that is opened /evaluated and compared among those technically qualified candidates who have attained a minimum 70 points score in the technical evaluation. Other Financial Proposals will receive points in inverse proportion to the lowest price.

The contract shall be awarded to a candidate obtaining the highest combined technical and financial scores, subject to the satisfactory result of the verification interview.

a) Technical Qualification (max. 100 points) weight 70 %

- Academic qualification at the University level in a relevant field (20 points)
- Professional experience with similar assignments (50 points)
- Knowledge in system integration and languages (30 points)

b) Financial Proposal (max. 100 points) weight 30 %