

TERMS OF REFERENCE (TOR) FOR SARAH PROJECT

PART I		
Purpose of Assignment	Maturity Assessment for AI and Digital Health Integration in Nigeria.	
Location of Assignment	Federal MDAs and 8 States	
Duration of Contract	6 months	
Type of contract	Institutional contract	
Start Date	From: March 2026	To: August 2026
Reporting to:	Emmanuel Emedo (Health Specialist)	
Is consultancy assignment in the approved AWP	Yes	
If, Yes, attach a copy of the approved page		
If No, attach approved NFR/Justification for the consultancy		

1. Background

Artificial Intelligence and related digital technology developments offer great potentials and opportunities for improved health, health systems development, health care and service optimization through improved access, patient outcomes and patient experiences, augmented clinical capabilities, enhanced management and operational efficiencies, data-driven and evidence-based health decision making. Advances in technology, such as improving access to internet connectivity, network speed and efficiency, cloud computing, device connectivity, and data analytics, are accelerating the promise of digital health for health development.

Nigeria's health sector is experiencing, and adapting to, the transformational effects of the rapidly evolving AI and digital health ecosystem. Digital health is a foundational enabler of Nigeria's current strategic health reform, the Nigeria Health Sector Renewal Investment Initiative (NSRII) which ultimately sets to "save lives, reduce both physical and financial pain, and produce health for all Nigerians". Nigeria has made commendable progress in digital transformation through several initiatives led by the Federal Ministry of Health and Social Welfare (FMOHSW), notably the Nigeria Digital in Health Initiative (NDHI). The NDHI aims to establish a unified digital health architecture that ensures interoperability, data governance, and improved service delivery. NDHI has facilitated

engagements and collaborations between stakeholders in the digital health ecosystem: Ministries, Agencies, and Departments (MDAs); public and private sectors; regulators, health administrators, managers, service providers, health service consumers and the public; international development – funders, implementation agencies, NGOs and civil society organizations.

Despite these gains, Nigeria's digital health and AI remains uncharted areas in Nigeria. Progress has been tardy, with the landscape characterized by fragmentation, donor-driven vertical applications, and limited integration across systems. Programs such as DHIS2, the National Data Repository (NDR), SORMAS, and various logistics and workforce systems operate effectively within their domains but often lack seamless interoperability. Scaled deployment of AI and digital technologies in the health sector is hampered by numerous challenges and inabilities related to governance and regulation, culture, human resources, infrastructure, and finance. Advances in regulation include the legislative actions leading to the draft Digital Health Services Bill 2025, currently under debate at the National Assembly.

UNICEF is strategic partner to Nigeria health sector development. Implicit in the Agency's Strategy for Health 2016-2030 is digitalization interventions to strengthen health systems, including emergency preparedness and response through four strategic action areas: advocacy for every child's right to health; influence government policies; strengthen service delivery; and empower communities. UNICEF Health Systems Strengthening Approach prioritizes improvements in the performance of health systems for effective use of resources to reach the most vulnerable. UNICEF's Approach to Digital Health explicitly provides guidance on how digital technologies can be used to further the goals of UNICEF's Strategy for Health 2016–2030 and is centered on supporting government-led digital health initiatives, working with partners, reducing fragmentation, and investing in scalable interoperable technologies. It supports countries adopt digital health interventions that reach all children, including the most disadvantaged, through improved data collection and use, increased accountability and transparency, and greater reach of high-quality health services. It leverages AI to expand access to basic health services (UHC) and ensure inclusivity – guaranteeing that no child is left behind or disadvantaged in the digital health agenda.

To accelerate the shift from digitization to intelligence-driven health systems, there is a growing need to assess the sector's readiness to harness Artificial Intelligence (AI) across data infrastructure, governance, workforce, and operations. UNICEF seeks to support Nigeria's Federal Ministry of Health in the conduct of an AI Maturity Assessment that will provide evidence-based insights into Nigeria's current AI readiness and inform a strategic roadmap aligned with NDHI's objectives.

2. Challenges in Nigeria's Digital Health Landscape

- Fragmentation across multiple, donor-funded systems leading to data silos and duplication.
- Limited interoperability standards and absence of a unified data exchange framework.
- Weak foundational infrastructure (power, connectivity, digital identity integration).
- Inconsistent data governance and enforcement of interoperability policies.

- Insufficient local capacity for data science, AI, and digital governance within health institutions.
- Overreliance on external technical assistance and lack of sustainable local innovation ecosystems.

3. Nigeria's AI Ambitions in Health

Nigeria has signaled a national commitment to responsible and scalable AI adoption. The Federal Ministry of Communications, Innovation, and Digital Economy, in collaboration with the Gates Foundation, launched the AI Scaling Hub to foster AI applications in health, education, and agriculture. Complementing this, the Science Africa Foundation and other partners have initiated programs to leverage AI for strengthening health systems, improving disease surveillance, and enhancing data-driven decision-making. Within this context, the NDHI provides the foundational digital infrastructure upon which AI integration in health can be realized.

4., Purpose, Objectives & Expected Results:

The assessment is purposed to support the adoption and deployment of artificial intelligence and digital technologies for digital transformation of Nigeria's health system towards universal health coverage through the examination of institutional resources, capabilities, and gaps for sustainable implementation of AI and digital health programs.

Specific objectives

- To assess the current state of AI adoption in Nigeria health sector along various dimensions, such as data, technology, people, and processes.
- To create a clear road map and actionable plan with prioritized steps to advance AI capabilities, moving from the current state to a desired future state.
- To establish a baseline for ongoing tracking of progress with the implementation of the AI roadmap.
- To identify key stakeholders of digital ecosystems across the health sector to enable shared understanding and co-creation of a unified approach to AI adoption.
- To lay foundation for a robust legislative framework for AI and digital health governance and development for Nigeria.
- To identify specific weaknesses, risks, or deficiencies in data quality, technical expertise, governance, or ethical considerations in the Nigeria's digital health/AI ecosystem.
- To provide clear recommendations for advocacy and resource mobilization for AI and digital health development in Nigeria.
- To identify and address potential risks related to ethics, bias, security, and compliance for AI development program in Nigeria's health sector.
- To inform key stakeholders of the maturity status of AI and digital health in Nigeria along with key gaps, challenges, roadmap, recommendations, risks and mitigation strategies for AI adoption.

5. Scope of the AI Maturity Assessment

The AI Maturity Assessment will adopt a multidimensional framework inspired by comparable initiatives from India's national and sectoral AI maturity models. It will evaluate the digital health sector across the following domains:

- Strategy and Leadership – Policy alignment, vision, and institutional commitment to AI.
- Data and Infrastructure – Quality, interoperability, access, and readiness of data systems.
- Technology and Tools – Availability and integration of AI-ready digital platforms.
- Governance, Risk, and Ethics – Policies, compliance, accountability, and ethical frameworks.
- Workforce and Skills – Human resource capability, training, and culture of innovation.
- Process and Integration – Embedding AI solutions into core public health workflows.
- Community readiness and acceptance – Digital literacy, access to devices (smartphones, computers), internet connectivity, and the perceived benefits of digital tools.
- Value and Impact – Monitoring benefits, efficiency gains, and public health outcomes.

The assessment will combine desk research, system mapping, stakeholder consultations, and readiness scoring at national and sub-national levels. Sub-national activities will focus on four States selected based on evidenced institutional advancement and input from stakeholder consultations. Outputs will include an AI maturity index for digital health and a phased roadmap for scaling AI-enabled health solutions across the country.

The assignment includes dissemination and socialization of findings and recommendations of the assessment, including the road map for AI adoption.

6. Alignment with NDHI and Stakeholder Coordination

The NDHI's draft strategy recognizes the urgent need to harmonize Nigeria's fragmented digital health landscape and establish interoperability standards. By conducting an AI Maturity Assessment, NDHI will gain actionable insights into where the health system stands on AI readiness and what foundational improvements are required. The assessment will also support NDHI's governance committees—particularly those on Standards, Solutions, and Regulations—by identifying policy gaps and investment priorities.

Special emphasis will be placed on stakeholder coordination. Nigeria's digital health space remains heavily donor-driven, with multiple partners implementing program-specific solutions. The AI Maturity Assessment will map these stakeholders, their systems, and data flows, enabling NDHI to create a unified coordination framework. This will ensure interoperability, reduce redundancy, and align donor-supported systems under a single national digital health architecture. It will also foster alignment between NDHI, the AI Scaling Hub, and the Ministry of Communications and Digital Economy for cross-sector collaboration.

7. Expected Outcomes

- A baseline assessment of AI maturity within Nigeria's digital health ecosystem – a comprehensive digital ecosystem mapping, including relevant public, private, and not-for-profit bodies, partnerships, and networks available/needed for AI integration in health.

- Identification of governance, regulatory, and cultural enablers, building blocks, and barriers for AI development and integration in health.
- Identification of systems, workforce, infrastructure, data, and policy gaps inhibiting AI integration.
- Scoping analysis of available technologies, tools, and markets for AI and digital health development.
- Comprehensive Digital Health System Mapping, including documentation of extant systems, stakeholders, and data flows
- A structured and costed roadmap for responsible AI adoption at national level.
- A structured and costed roadmap for responsible AI adoption for eight States – Adamawa, Bayelsa, Kaduna, Kano, Kebbi, Kwara, Sokoto, and Zamfara,
- Enhanced coordination among government agencies, partners, and donors.
- Recommendations for capacity development and governance reforms.
- Informed stakeholders of the AI and digital health maturity status of Nigeria health system

Deliverables

The expected scope of work that the organization will carry out is as follows:

- Inception report detailing engagement plans and activities for stakeholders in the Federal and States.
- Develop assessment tools, and update where necessary based on the project requirements.
- Develop and implement a detailed data collection, cleaning/verification, and real-time analysis strategy that will ensure the speed and accuracy of data collection. The data analysis plan needs to be developed before fieldwork and used to analyze the data from the pilot test for finalization of the tool/checklist.
- Develop a comprehensive Digital Health System Mapping, including documentation of extant systems, stakeholders, and data flows.
- Develop and submit a reporting template which will be used for the final report
- Develop report of completed assessment and analysis
- Develop a detailed data quality assurance plan covering the training of data collectors, data collection process, data cleaning, and analysis.
- Develop a costed roadmap for responsible AI adoption at the national level.
- Develop a costed roadmap for responsible AI adoption for eight States – Adamawa, Bayelsa, Kaduna, Kano, Kebbi, Kwara, Sokoto, and Zamfara,
- Develop key recommendations, risks and mitigation plans for adoption, deployment and integration AI and digital health in Nigeria health system.
- Develop dissemination and socialization plan for the assessment and the roadmap with key stakeholders.

Deliverable timelines and payment schedule

Payment schedule	Percentage (%)	Deliverable
<u>Initial Payment</u>	(10%)	On the submission of the inception report (7 pages – max)
<u>Milestone payment 1</u>	(20%)	- Upon satisfactory submission of the following - Baseline assessment report - A detailed data collection, cleaning/verification, and real-time analysis strategy - a reporting template which will be used for the final report
<u>Milestone payment 2</u>	(20%)	- Upon satisfactory submission of the following: - Report on completed assessment and analysis. - A comprehensive Digital Health System Mapping, including documentation of extant systems, stakeholders, and data flows.
<u>Milestone payment 3</u>	(20%)	- Upon satisfactory submission of the following: - A costed roadmap for responsible AI adoption at the national level. - A costed roadmap for responsible AI adoption for 8 States: Adamawa, Bayelsa, Kaduna, Kano, Kebbi, Kwara, Sokoto, and Zamfara, - Key recommendations, risks and mitigation plan for adoption, deployment and integration AI and digital health in Nigeria health system;
<u>Milestone payment 4</u>	(20%)	Upon satisfactory submission of evidence of dissemination and socialization for the assessment and the roadmap with key stakeholders.
<u>Final payment –</u>	(10%)	Upon submission of final Consultancy Report

Reporting Requirements

All working documents and products will be produced in high quality, delivered in an engaging and accessible format. UNICEF should receive all reports and documents specified in the agreed deliverables. All final products will be submitted in soft and hard copy in English in Word and PowerPoint formats (where applicable).

Location and Duration

The assignment is expected to commence in January 2026 and will last until May 2026. The Contract may be extended based on the agreement of both parties.

The contracted institution will be responsible for covering all costs and logistics for all aspects of the assignment. The tasks will involve travel to the federal institutions and eight states – Adamawa, Bayelsa, Kaduna, Kano, Kebbi, Kwara, Sokoto, and Zamfara, including travel to LGAs/facilities where necessary. The approximate number of travel days for the assignment will be defined in the proposal. Additional information will be gathered at the community level to inform community readiness and acceptance - Digital literacy, access to devices (smartphones, computers), internet connectivity, - and the perceived benefits of digital tools.

It is preferred that the contracted institution designates at least one team member per state to serve as Focal Point for the duration of the assignment.

- Official communication shall be done via email and online or virtual (e.g. Zoom, Team) meeting. Telephone communication shall be used if needed, but not as a preferred option for official communication.

Qualification Requirements

The organization is expected to bring together a team with experience relevant to the assignment and indicate in the inception report/work plan how to best deploy the expertise and resources for achieving the deliverables for the consultancy.

Firm requirements

- This RFP is open to local and international firms
- Firm or its lead must have at least five previous assignments in the field of Artificial intelligence, Information technology, with specialty in digital health and information systems for government ministries, development agencies and/or

multilateral organizations, especially in the health sector;

- At least five years of previous experience in developing countries in general, and related to health programming, preferably in Nigeria.
- At least three previous contracts with similar agencies (development banks, UN, multi-lateral agencies, direct contracting by Governments, etc.).

Team members capacities

- A firm of multi-disciplinary teams is preferred for this assignment. The expertise required within the teams should include more than 10 years of experience in: (1). Health systems management; (2) health information systems; (3) information systems strategy, program assessment and monitoring, and evaluation. Team leaders should have at least a master's degree in health informatics, digital health, international development, statistics, or related field and should have expertise in health systems, data and information systems approaches.
- The overall lead or at least one member should have an extensive local knowledge of the Nigerian health sector, program design and implementation including Information Technology, Artificial Intelligence, Data Science, Digital Governance, policy and regulatory expertise and health systems management. This member should have at least a master's degree in public health, international development, Information technology, Artificial Intelligence, statistics, or related field.
- Professional written and oral proficiency in English is required of all team members.

Evaluation process and methods

Contents of Technical Proposals

The written technical proposal will be submitted via email and in PDF format and include the following elements as a minimum requirement:

- a. Presentation of the bidding institution including:
 - Name of the institution/organization;
 - Date of registration/incorporation;
 - Summary of corporate structure and business areas;
 - Corporate directions and experience;
 - Location of offices; and

- Number and type of employees or agents relevant to this proposal.
- b. Narrative description of the bidding institution's experience and capacity in the following areas:
 - Relevant experience in the IT and health sector, specifically evidence of previous jobs in Artificial Intelligence and digital health
 - Previous and current assignments in developing countries in general, and related to health systems leadership, governance, and financing, preferably in Nigeria; and
 - Previous and current assignment with similar agencies (development banks, UN, multi-lateral agencies, direct contracting by Governments).
- c. Relevant references for the bidding institutions (past and on-going assignments) in the past five years. UNICEF may contact reference people for feedback on services provided by the bidding institution.
- d. Samples or links to samples of previous relevant work listed as reference of the bidding institution (at least three), on which the proposed key personnel directly and actively contributed or authored.
- e. Proposed methodology and approach, potential constraints for work assignments (no minimum or maximum length).
- f. Work plan, which will include as a minimum requirement the following:
 - General work-plan based on the one proposed in the SoW, with comments and proposed adjustments, if any; and
 - Detailed timetable by activity (it must be consistent with the general work-plan and the financial proposal).
- g. Team:
 - Summary presentation of proposed team leader;
 - Summary presentation of proposed key personnel;
 - Level of effort of proposed team leader by activity (it must be consistent with the financial proposal); and
 - CV of team leader and key personnel proposed to work on this assignment.

Contents of Financial Proposal

The financial proposal must be fully separated from the technical proposal. The financial proposal will be submitted via email. Costs may be formulated in USD or NGN and free of all taxes. If a local firm quotes in USD, please note that this amount will be converted to Naira using the United Nations Operational Rate of Exchange (UNORE). No local firm will be paid in USD for services rendered under this contract. All costs provided should include the following elements as a minimum requirement:

- a. Overall price proposal; and
- b. Budget by phase, deliverable and by cost category (incl. personnel costs, flights, road transportation, DSA, report editing, and overheads).

Evaluation Criteria

A two stages procedure shall be utilized in evaluating the applications received in accordance with the below criteria, with evaluation of the technical proposal being completed prior to any price proposal being compared. Submitted proposal shall be assessed using Cumulative Analysis Method. Technical proposals should attain a minimum of 56 points to qualify and to be considered.

- The evaluation criteria for selecting the institution are as follows:

Item	Technical Evaluation Criteria	Maximum Obtainable Points
1	Overall Response	10
1.1	Overall Response e.g. the understanding of the assignment by the proposer and the alignment of the proposal submitted with the ToR	5
1.2	- Completeness of response with relevant contextual analyses - Overall concord between TOR/needs and proposal	5
2	Company Experience and Key Personnel	40
2.1	Evidence of previous jobs in Artificial Intelligence and Digital Health.	15
2.2	Number of customers, size of projects, number of staff per project	5
2.3	Client references	5
2.4	Key personnel: relevant experience and qualifications of the proposed team for the assignment	5
2.5	Company policy on Child labor, Safeguarding and Prevention of Sexual Exploitation and Abuse (articulate policies for the protection & safeguarding of children and prevention of PSEA) - mandatory	5
3	Proposed Methodology and Approach	20
	e.g. Work plan showing detail sampling methods, project implementation plan in line with the project	
3.1	Technologies used - compatibility with UNICEF	5
3.2	Project management, monitoring and quality assurance process	5
3.3	Innovation approaches (With less impact to the Environment)	5

3.4	• Gender and disability considerations – As required • Organization commitment to Sustainability (Please provide details (including and targets and achievements) of your organization's sustainability management policy, management system to control sustainability issues. e.g. Environmental Management System, Social Accountability e.g. your contribution to local community etc.) that covers the service required	
Total Technical Score		70
Total Financial Score		30
Sum of Technical & Financial Scores		100

Minimum technical score: 80% of 70

points = 56 points FINANCIAL

EVALUATION (30 points)

Only those financial proposals for bidders which have been technically accepted according to the above criteria will be opened. The Financial proposal will be weighted based on clarity and appropriateness.

The price should be broken down for each component of the proposed work. The total amount of points allocated for the price component is **30**. The maximum number of points will be allotted to the lowest price proposal that is opened and compared among those invited firms/institutions which obtain the threshold points in the evaluation of the technical component. All other price proposals will receive points in inverse proportion to the lowest price, e.g.:



Max. Score for price proposal * Price of
lowest priced proposal Score for price proposal X = -----

Price of proposal X

The Contract shall be awarded to a bidder obtaining the highest combined technical and financial scores. Proposals not complying with the terms and conditions contained in this ToR, including the provision of all required information, may result in the Proposal being deemed non-responsive and therefore not considered further.

Administrative issues

The contracted institution will be responsible for the procurement of supplies, equipment, and other resources needed to meet contractual obligations. These resources will become the property of the organization upon completion of the Contract.

The use of resources purchased or provided under the Contract and the travel related expenses, including amount of per diem, other allowances to pay as well as recruitment, firing, posting, remuneration, and customary managerial prerogatives over staff who are receiving payments shall be the responsibility of the contracted institution.

Project Management

The institution contracted for this consultancy will work under the PHC System Strengthening Cluster within the Health Section and report to the responsible Health Specialist under the supervision of the Health Manager. The Health Specialist will track the consultant's work progress, certify relevant documents and process/follow up on payments. The Health Manager will hold final programmatic and financial oversights ensuring it is in line with the intended results, scope, and budget. The PHC System Strengthening Cluster will be the coordinating link between the contracted institution and relevant partners, and sub-national authorities.

RFP Submission Instructions to bidders:

1. Proposals should be made separately: Technical and Financial should be sent separately. Technical proposals should not have financial information as such technical proposals will be disqualified.
2. All completed proposals should be submitted to this email address:
ngrsupply@unicef.org
3. The Technical proposal email should be sent separate from the financial proposal, and



the Technical Proposal subject line should read: **XXXX (name of organization)**

Technical Proposal – RFP for AI & Digital Health Maturity Assessment

4. The Financial proposal email should be sent separately from the technical proposal, and the Financial Proposal subject line should read: **XXXX (name of organization) Financial Proposal – RFP for RFP for AI & Digital Health Maturity Assessment**
5. Financial proposal should include brief cover letter with summary of cost on letter-headed paper with contact details of the company and duly signed with a detailed breakdown of cost should be provided
6. All questions and queries to be sent to all the 6 email addresses below. Proposals SHOULD NOT be sent OR copied to these addresses:
Augustine Ohashiegbulam <aohashiegbulam@unicef.org>; David Ernesto Flores Cevallos <dflorescevallos@unicef.org>; Stanley Omobude <somobude@unicef.org>;
7. All proposals should be sent to: **ngrsupply@unicef.org ONLY**

United Nations Children's Fund
UN House, Diplomatic Drive, Central
Business District PMB 2851, Garki
Nigeria

www.unicef.org/nigeria

