



THE SHELL PRODUCTION AND DEVELOPMENT COMPANY OF NIGERIA LIMITED TENDER OPPORTUNITY: PROVISION OF ENVIRONMENTAL STUDIES AND SERVICES IN SPDC (CW707686) NIPEX REF: SPDC.00000530

1.0 INTRODUCTION

The Shell Petroleum Development Company of Nigeria Limited (SPDC) in its role as Operator of the NNPC/SHELL/TEPN/AGIP Joint Venture hereby invites reputable and competent registered Nigerian companies (NUPRC, NMDPRA and FMENV registered and licensed) with proven experience in the **PROVISION OF ENVIRONMENTAL STUDIES AND SERVICES IN SPDC,** listed in the scope of work below, to apply for inclusion into the bid.

The proposed contract will commence in Q3 2024 and remain active for a three (3) year duration, with an option to extend for one (1) year.

Please visit the Nigerian Petroleum Exchange Portal www.nipex-ng.com for further details.

2.0 Scope of Work

The scope of work includes PROVISION OF ENVIRONMENTAL STUDIES & SERVICES IN SPDC

The scope of work for the Provision of Environmental Studies & Services in SPDC includes the following:

Environmental Studies (EIA, EER, PIA, ECM)

- Determine the baseline environmental conditions (biophysical, socio-economic and health status).
- Determine the extent, magnitude and concentration of pollutants from the proposed project.
- Determine the extent of impact of the proposed project on the environment.
- Identify socio-economic effects of the project on the communities including impacts on demographic change, natural and cultural resources /properties, livelihood, social infrastructures, and issues on Lifestyles/values, crime and disorder, capacity & quality of infrastructure, economic development and change as well as analysis of the opportunity cost to land take and chemical spills during project activities.
- Identify health hazards that may result from the different phases of the project during execution (including operation and decommissioning) and evaluation of local population exposure to these hazards.
- Develop cost effective integrated Environmental (Social and Health) Management Plan (EMP).
- Description of the existing action namely; installation/project, operations, oil/hazardous materials/waste spillage, waste generation/volume, characteristics of wastes, existing pollution control technology, disposal methods, etc.
- Qualitative and quantitative description of the already impacted environment (biophysical/biodiversity/social and health).
- Levels of significance for losses of environmental resources affected by the already existing installations/projects or action. These environmental resources are the elements, features, conditions and areas valued by man that can be characterized as physiographic, biological (including bioaccumulation and chronic toxicity testing) cultural, aesthetic, etc.
- Modification/mitigation/ameliorating plans to process or systems to either eliminate or decrease adverse environmental impacts to the greatest extent possible.
- Effectiveness of the Environmental Management Plan developed before the project. Development of an EMP (post-EER) for the operations of the Assets.
- Acquisition of qualitative and quantitative data/information (biophysical/socio-economic/health) required for evaluating the impact of the executed project activity on the environment.
- Identification of sources, pathways and receptors of contaminants/pollutants (Conceptual Site Models).
- The use of Risk Based Corrective Action (RBCA) technique to determine the risk associated with the facility.
- Ecological/biophysical data including biodiversity.
- Development of appropriate plan for site restoration and remediation.
- Acquisition of qualitative and quantitative data/information (biophysical/socio-economic/health) required for evaluating the impact of the cleaned-up oil spill on the environment.
- Sludge and oily sand analysis before and after treatment
- Produced Sand, Formation water, Oily wastewater, Sanitary wastewater and Storm Water environmental compliance monitoring
- Drill, develop, label and secure monitoring boreholes for the assessment of contamination and periodic Vertical Electric Sounding (VES), screening, casing, cementing, production using Sumo pump, logging, and capping to secure the borehole with a lock.
- Reporting of ground water quality from established boreholes including its trend analysis.
- Evaluate Physiochemical/biological/microbiological characteristics of the environments impacted by operational discharges.
- Conduct weekly environmental compliance monitoring for operational facilities as applicable such as gaseous point source emission, ambient air quality, produced sand, formation water, oily wastewater, sanitary wastewaters, stormwater monitoring, groundwater and aqueous effluent monitoring.

 Assess all environmental components as applicable e.g. air quality, soil, surface water, sediment, groundwater, fisheries, microbiology, health, socio-economic etc. as required by regulation

Biological Monitoring

- Purchase and/or isolation of healthy and Juvenile forms of Biological Organisms for the Biological Monitoring Tests
 [Minimum Number = 10,000 spp per trophic Level; Including acclimatization in the Lab
- Trucking of Habitat/Natural Water for Study -Habitat water/ Natural Seawater Provision for entire Study (circa 242,500 Litres/study)
- Synthesis of Artificial Sea Water
- Toxicity Testing (using Treated & Untreated Produced Water)
- Acute Toxicity Test acute toxicity test using Microtox® Model 500 for one trophic level: Bacteria (vibrio fischeri). The
 toxic unit EC50 of the effluent and wastewater.
- Acute Toxicity Test 0, 12, 24, 48, 72 & 96 hrs acute toxicity test using the Whole Effluent (WET) procedure for four trophic levels: Marine algae, Crustacea, Mollusc and Fish. The toxic units (Tu) LC50, EC50 NOEC and LOEC.
- Bio-magnification (molluscs, algae and bacteria)
- Bio-magnification: Fish Tissue analysis (Heavy metals and organics)
- Fish Tissue analysis (Observable effects)
- Bio-magnification: Crustaceans Tissue analysis (Heavy metals and organics),
- Bio-magnification: Molluscs Tissue analysis (Heavy metals and organics)
- Bio-magnification: Algal and Microbial analysis (Heavy metals and organics)
- Depuration: Crustacean
- Depuration: Molluscs
- Depuration: Fishes
- Depuration: Crustaceans Tissue analysis (Heavy metals and organics)
- Crustacean Tissue analysis (Observable effects)
- Depuration: Molluscs Tissue analysis (Heavy metals and organics)
- Algal Acute toxicity test.

Offshore Environmental Studies

- Produced Water (Untreated and Treated), Slop Tank waste and Reference Chemical Characterization
- Sea Water from the offshore environment, habitat water of the organism and Sediments/Mud flat Characterization
- Testing of Oil Dispersants
- Naturally Occurring Radioactive Materials (NORM) Survey

Biodiversity Studies

- Biodiversity and Ecosystem Services (BES) Assessment
- Validity Surveys of Critical Habitats/Sensitive Areas having overlaps with SPDC-JV assets and activities
- Adhoc Biodiversity Consultancy Services (comprises evolving BES issues arising from SPDC-JV's assets, projects and activities including RAs, IAs, FLBs, etc.,)

3.0 Mandatory Requirements

- 1. To be eligible for this tender exercise, interested contractors are required to be pre-qualified as essential service vendors in the product category 3.02.02 –Safety, Health and Environment, 3.03.05 Safety and Environmental (R & D) services and 3.13.02 Environmental Management Systems Certification NipeX Joint Qualification System (NJQS) data base. Only successfully pre-qualified suppliers in this category will receive Invitation to Technical & Commercial Tender (ITT).
- 2. To determine if you are pre-qualified and view product/service category you are listed for, open http://vendors.nipex-ng.com and access NJQS with your login details, click on continue Joint Qualification Scheme tool, click check my supplier status and then click supplier product group.
- 3. If you are not listed in a product/service category you are registered with NUPRC to do business, contact NipeX office at 27b Oyinkan Abayomi Drive, Ikoyi, Lagos, with your NUPRC certificate as evidence for necessary update.
- 4. To initiate the NJQS prequalification process, access <u>www.nipex-ng.com</u> to download the application form, make necessary payments and contact NipeX office for further action.
- 5. To be eligible, all tenders must comply with the Nigerian Content Requirements in the NipeX system.

4.0 Nigerian Content Requirements

Vendors are to demonstrate strict compliance with the provisions of Nigerian Oil & Gas Industry Content Development Act and also provide the following requirements:

- 1. Tenderer shall demonstrate that entity is a Nigerian-registered company with greater than 51% equity shareholding. Also provide form CO2 and CO7 with evidence of registration with NCDMB NOGICJQS and NUPRC
- 2. Detailed description of the location of in-country committed facilities & infrastructure (Administrative/Technical offices, workshop, laboratory) in Nigeria to support this contract.

- 3. Tenderer shall comply with the latest approved version of NCDMB HCD guideline by committing (via a letter of undertaking) to providing Project-Specific training, man-hour, budget, skill development and understudy plan for Nigerian personnel utilizing OGTAN registered trainer(s) or other approved NCDMB training institution(s).
- 4. Tenderer shall provide evidence of what percentage of your key management positions is held by Nigerians and what percentage of the total work force are Nigerians. Also, show overall percentage of work to be performed in Nigeria and those by Nigerian resources relative to total work scope.
- 5. Tenderers shall provide evidence of Category 1,2,3,4 or 5 NCEC in the Consultancy Services (CS) group to demonstrate capacity and capability for the execution of work scope.

5.0 Closing Date: Only Tenderers who are registered in the product category **3.02.02** – **Safety, Health and Environment, 3.03.05** – **Safety and Environmental (R & D) services and 3.13.02** – **Environmental Management Systems Certification** NJQS product/category as at 05 April 2024 being the advert close date shall be invited to submit Technical & Commercial bids.

6.0 Additional Information

- All costs incurred in preparing and processing NJQS prequalification shall be to the contractor's accounts.
- Suppliers that are prequalified for this product/service category in NJQS must ensure that the name and contact details (physical address, email address and telephone number) of their company and authorised/responsible personnel are up to date in their company profile in the NJQS database.
- SPDC shall communicate only with authorized/responsible personnel of prequalified companies and not through unauthorized individuals or agents.
- All respondents to SPDC must ensure full compliance with the Nigerian Oil and Gas Industry Content Development Act, 2010. (NOGICD) All respondents should educate themselves on the requirements of the NOGICD and ensure full compliance. Non-Compliance is a FATAL FLAW.
- This advertisement shall neither be construed as any form of commitment on the part of SPDC to award any contract
 to any company and or associated companies, sub-contractors or agents, nor shall it entitle prequalified companies to
 make any claims whatsoever, and/or seek any indemnity from SPDC and or any of its partners by virtue of such
 companies having been prequalified in NJQS.
- SPDC will communicate only with authorized officers of the pre-qualifying companies and NOT through individuals or Agents.

ES/NCDMB/SPDC/ADV/UPD/280923/PROVISION OF ENVIRONMENTAL STUDIES AND SERVICES IN SPDC-CW707686

Please visit NipeX portal at www.nipex-ng.com for this advert and other information. Also note that this contract will be progressed through NipeX system.