

TERMS OF REFERENCE

SUMMARY

Type of Contract (tick the appropriate box)	<input checked="" type="checkbox"/> <i>Institutional Contractor</i>	<input type="checkbox"/> Individual Consultant	<input type="checkbox"/> Technical Assistance to IP (individual)
Title	Service maintenance of the PSA Medical Oxygen Plants at Chinsali General Hospital and Kalindawalo General Hospital, and at the National Heart Hospital.		
Purpose	Undertake repairs and/or maintenance, as the case maybe, in-line with prevailing industry standards for PSA Medical Oxygen Plants repair/maintenance procedures.		
Level and Expected Fee / Budget Ceiling			
Location	Eastern Province, Muchinga and Lusaka Province		
Duration	8 weeks		
Start Date	15 November 2021		
Reporting to	Dr Rodgers Mwale, Health Specialist		
WBS / Grant No	4980/A0/05/100/001/080; SC190726 (Germany)		

BACKGROUND

In December 2019, the World Health Organization (WHO) was alerted to a cluster of cases of pneumonia in Wuhan City, Hubei Province of China, caused by an unidentified virus. The virus was later identified as the Severe Acute Respiratory Syndrome Coronavirus 2 (SARS-CoV2) which causes the Coronavirus Disease (COVID-19). The WHO declared COVID-19 a global pandemic on 11th March 2020 and thus an unprecedented public health emergency worldwide. As of 27th September 2021, COVID-19 has spread to over 250 countries and territories across all continents of the world, with 233.6 million confirmed cases and causing 7.78 million deaths.

Zambia reported its first case on 17 March 2020. COVID-19 has caused significant illness and deaths across the world and has severely affected the global economy by limiting movement of humans and goods within and between countries. In addition, global supply chains are constrained leading to shortages of life-saving health commodities like vaccines, essential medicines, and other medical supplies with potential to negatively impact the direct response to COVID-19 and continuation of essential health services.

Zambia has experienced three waves of COVID-19, with subsequent wave caused more catastrophic impact to health system in terms of severity and virulence with higher infection and case fatality rate. The experts are apprehending even a more catastrophic 4th wave. Epidemiologically each subsequent wave appears to be more easily transmissible thus easily spread and hence more geographically spread whereby, from the second wave, COVID-19 spread to all districts of the country. The Ministry of Health through the Zambia National Public Health Institute (ZNPHI) has led the health sector response. Multi sectoral response and linkages are coordinated through the Disaster Management and Mitigation Unit (DMMU), a unit under the Office of the Vice President. Various multilateral, bilateral organizations and NGOs are supporting Zambia's multi-sectoral responses to COVID-19. The Ministry of Health has developed the COVID-19 Health Sector Response Plan, while the DMMU has development and is leading the implementation of the Multisectoral National COVID-19 Response Plan.

At the peak of the third wave, the national health system was overwhelmed whereby the system could not meet the demand of medical oxygen, a vital therapeutic agent in the management of COVID-19 patients. One of the key lessons learnt from the third wave in Zambia is to build health systems capacity for medical oxygen systems with long term and sustainable solutions. As at 21st October 2021, Zambia has reported a total of 209,589 COVID-19 confirmed cases out of about 2.6 million tests conducted. The country has recorded and 3,658 deaths and 205,746 recoveries. The third wave of COVID-19 outbreak has now waned, but a fourth wave is anticipated towards the end of the year or possibly the beginning of 2022.

JUSTIFICATION

Zambia has just weathered a devastating third wave of the COVID-19 pandemic which overwhelmed the health system, specifically, the medical oxygen production and delivery systems leading to hundreds of deaths. A fourth wave is predicted, and thus, to avoid medical oxygen system production failure and thus patient fatalities, support to repair and/or maintenance of medical oxygen production plants is required. This is not only an important step to prepare the country for the upcoming fourth wave but is will strengthen the oxygen system that is lifesaving beyond COVID-19.

OBJECTIVES / TARGET

The overall objective of this consultancy is to contribute to the case management of COVID-19 patients by improving the availability of medical oxygen in the country.

Specific objectives are:

- i. Validate the pre-assessment of the needs for repair and/or maintenance, at Chinsali and Kalindawalo General Hospitals and at the National Heart Hospital, as submitted by the MoH.
- ii. Repair and/or undertake maintenance of the PSA plants in 3 hospitals i.e Chinsali and Kalindawalo General Hospitals and at the National Heart Hospital.
- iii. Test run and handover functional plants to the Ministry of Health through the respective three hospitals mentioned above.

DESCRIPTION OF THE ASSIGNMENT (SCOPE OF WORK) / SPECIFIC TASKS

The Ministry of Health has undertaken an assessment of the PSA plants at the three sites mentioned above. The consultant is therefore expected to:

- A). Undertake a verification assessment, to verify the findings from the MoH and based on that, the consultant will develop and submit a proposal to UNICEF with attendant costs.
- B). Repair/maintain the plants based on the validated assessment and as per approved proposal submitted to and duly accepted by UNICEF. The consulting firm's responsibility is to procure the replacement parts which must be reviewed and agreed by UNICEF.
- C). Test run and handover a fully functional plant to the Ministry of Health through respective hospitals as detailed above.

EXPECTED DELIVERABLES

Tasks	Expected Output	Deliverables	Timeframe (Tentative)	Payment Schedule
1. Validation of repair and/or maintenance	Pre-assessment of the repair and/or	Report on the validation of repair	2 Weeks	0%

Tasks	Expected Output	Deliverables	Timeframe (Tentative)	Payment Schedule
needs at 3 PSA Medical Oxygen Plants	maintenance report undertaken by the MoH validated by the consultant	and/or maintenance needs of 3 PSA plants.		
2. Repair/maintain the plants based on the validated assessment and as per approved proposal submitted to and duly accepted by UNICEF.	3 PSA Plants repaired and/or maintained.	Report detailing all repairs and/or maintenance for each PSA plant.	6 Weeks Week	0%
3. Test run and handover a fully functional plant to the Ministry of Health through respective hospitals as detailed above.	A repair and/or serviced PSA plant handed to MoH.	Post repair and/or maintenance report.		100%

REPORTING REQUIREMENTS

1. An inception report outlining the works to be undertaken on the 3 PSA Medical O2 plants - at Chinsali and Kalindawalo General Hospitals and at the National Heart Hospital.
2. Intra-assignment written report within 2 weeks of commencing the assignment with weekly email updates.
3. End of assignment report outlining actions taken, and recommendations going forward within a week of assignment completion.

PROJECT MANAGEMENT

Under the close consultation with Chief of Health and HIV Section, Health Specialist will closely supervise the contract. The consultant/Institution will provide a weekly written update on email to Health and HIV Section and UNICEF may undertake on-site visits for progress tracking and visibility purposes.

LOCATION AND DURATION

The assignment will be undertaken in Zambia specifically in three locations i.e. the Chinsali and Petauke Districts and in Lusaka district, where the 3 targeted PSA Medical Oxygen Plants are located. The proposed duration is maximum of 8 weeks.

PAYMENT SCHEDULE

Payment ¹	Conditions
100%	On completion of the assignment and handing in the assignment completion report with MoH confirmation that the plant is serviced and functional.

¹ In general, payments should be made against delivery of services / products. Advance payments on signature of contract are discouraged, and need to be explicitly justified.

NB: Payment will be withheld if the consultant doesn't meet the above conditions.

QUALIFICATION/SPECIALIZED KNOWLEDGE AND EXPERIENCE

- Institution legally registered in Zambia
- Team leader must have degree level qualification in Mechanical or Biomedical Engineering with expertise and specialized knowledge and at least 5-years' experience in the operation and maintenance of medical oxygen production and delivery system.
- Good written and communication skills.
- Good computer knowledge.
- Fluency in written and spoken English is required.

EVALUATION PROCESS AND METHODS- NOT APPLICABLE- LTA WITH JUSTIFICATION

Item	Evaluation Criteria	Points
	Technical Evaluation Criteria	
1.0	Overall Response	
1.1	Understanding of UNICEF's requirement based on request for pre bid assessment.	20
1.2	Understanding of the Consultancy which UNICEF wants to enter based on the documents submitted by the prospective consultant.	10
2.0	Company profile and key personnel	
2.1	Range and depth of organizational experience with similar projects	10
3.0	Proposed Methodology and Approach	
3.1	Proposed work plan and approach of implementation of the tasks as per the ToR	15
3.2	Implementation strategies, monitoring and evaluation, quality control mechanism	5
3.5	Total Technical Scores	60
4.0	Financial Proposal	
4.1	Financial Proposal	40
5.0	Grand Total	100

Only proposals which receive a minimum of 42 points under a technical evaluation will be considered technically compliant.

Commercial Proposal:

All proposals must be in United States Dollar (US\$). Commercial proposal should provide detailed breakdown of the cost of each activity you have proposed for the implementation of your technical proposal. The contract will be a fixed lump sum contract therefore professional fees and all out of pocket expenses will be part of total price proposal. Travel and accommodation costs need to be built into total budget. Flight costs shall be paid at economy rate to/from the city/country of residence regardless of duration. Costs for accommodation, meals and incidentals shall not exceed applicable daily subsistence allowance (DSA) rates, as promulgated by the International Civil Service Commission (ICSC).

Commercial Proposal Evaluation:

The total amount of points allocated for the price component is 40. 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.:

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

Price of proposal X

Total Technical and Price = 100 Pts

Note: Minimum qualifying marks are 42. In normal circumstances, only those offer that score minimum and above points on technical proposals will be considered for commercial evaluation. However, UNICEF reserves the right to evaluate all commercial offers and/or shortlist selected suppliers from among those who score minimum and above technical scores.

ANY OTHER INFORMATION

The works under the contract are urgent in nature, contractors must take this into consideration as they prepare their proposals.

ADMINISTRATIVE ISSUES

- Bidder should provide an all-inclusive cost in the financial proposal.
- Bidder shall be required to include the estimate cost of travel in the financial proposal. travel cost shall be calculated based on economy class travel, regardless of the length of travel and ii) costs for accommodation, meals and incidentals shall not exceed applicable daily subsistence allowance (DSA) rates, as promulgated by the International Civil Service Commission (ICSC).
- Unexpected travels shall also be treated as above.
- Resources and facilities to undertake this assignment to be provided by consulting firm; e.g. access to printer, office space...etc.