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# INDIVIDUAL CONSULTANT PROCUREMENT NOTICE

Date: 30th of JULY 2019

Country: Republic of Moldova

**Description of the assignment:** National Consultant for developing a Pre-Feasibility Assessment of urban Biomass Waste to Energy potential in Chisinau

**Project name:** UNDP/GEF Project: Moldova Sustainable Green Cities – Catalysing investment in sustainable green cities in the Republic of Moldova using a holistic integrated urban planning approach

Period of assignment/services: 50 working days from August 13, 2019 to October 25, 2019

**Contract Type:** Individual contract

Proposals should be submitted online by pressing the "Apply Online" button, <u>no later than 8<sup>th</sup> of</u> <u>August 2019</u>.

Requests for **clarification only** must be sent by standard electronic communication to the following e-mail: alexandru.rotaru@undp.org. UNDP will respond by standard electronic mail and will send written copies of the response, including an explanation of the query without identifying the source of inquiry, to all applicants.

# 1. BACKGROUND

The activities of waste management in Moldova are the primary responsibility of the Local government bodies, who have to organise collection and disposal of municipal waste. Currently only between 60 – 90% of municipal waste collection coverage is achieved in urban areas. In rural areas there is limited coverage at only 10-20% and there are also some areas with no waste management services. In Chisinau, the daily rate of waste produced per person is 1.3 kg (source: National Waste Management Strategy for Moldova), that is higher than in other parts of Moldova. However, this figure is thought to be as a result of better collection and monitoring of waste rather than actual greater quantities of waste being generated. It is projected that solid municipal waste will increase by 5% annually in both rural and urban settlements despite an expected population decrease. The General Housing Department of the City of Chisinau has overall responsibility for waste management services which is currently executed through Regia Autosalubritate, the "Company" that provides collection, transportation and disposal of municipal waste as well the operation of the landfills. Approximately 1.5 million tons per year of waste (with up to 60 percent organic and 25 percent recyclable content) is collected using the company's fleet of 58 specialised waste transportation vehicles. Waste is transported to the existing transfer station and then into the temporary dump site in Ciocana district in Chisinau or Tintareni landfill located 30 km from Chisinau. Some plastic and glass are manually separated at the transfer station, although there is

no sorting plant currently in place. The other municipal waste such as biomass from green zones, street waste, construction waste, etc. is not managed in a centralized way. As an example, the Municipal Enterprise "Green Areas Management Association" is facing with problems of depositing the waste from green zones cleaning, most of which now is transported and dumped to the municipal landfills.

In order to overcome the existing waste problem, the municipality of Chisinau is planning to design and to build the platform/facility for collection of the city garden waste and other kind of urban waste not managed by Autosalubritate. The platform is supposed to have several units: composting from urban biomass (leaves), briquetting (briquets from urban biomass) and construction waste recycling. The produced briquettes must be distributed to 3,664 of poor and vulnerable families which are currently using coal and wood heating and being supported by the special fund established by the Chisinau Municipal Council.

The goal of this assignment is to develop a Pre-Feasibility Assessment of urban Biomass Waste to energy potential in Chisinau and reducing fuel poverty in poorer households. The proposed assignment is linked with activity of General Housing and Planning Directorate of the Chisinau Municipality. This project will reduce the incidence of fuel poverty in areas not served by the District Heating network and natural gas supplies and reduce the cost to the Municipality in subsidizing the cost of coal and winter fuel payments to the poorest households. Beside supporting the required behaviour change programs to support the implementation of resource efficient waste management strategies and related waste management hierarchy (reduce, reuse, recycle, waste to energy, disposal), there are possible synergies and co-operation opportunities also for the required investments addressing, for instance, the treatment of the "green waste" i.e. the biomass generated by harvesting and cleaning the green areas of the city.

Based on the initial estimates, the production capacity of the wood briquette plant would need to be about 3,000-4,000 tons per year to replace about 1,600 tons of coal, thereby contributing to CO<sub>2</sub> reduction of 4,300 tons per year or 86 ktons of CO2eq over 20 years.

# 2. SCOPE OF WORK, RESPONSIBILITIES AND DESCRIPTION OF THE PROPOSED ANALYTICAL WORK

The consultant will have the following responsibilities:

- 1. Develop a detailed structure of the Pre-Feasibility assessment and consult it with UNDP and Municipality Housing department.
- 2. Identify the exact quantity and typology of the urban waste: Sources of raw material, collection, transportation and depositing methods of vegetal waste;
- 3. Identification of the number of poor and vulnerable families which are currently using coal and wood heating and being supported by the special fund established by the Chisinau Municipal Council. Identify how many of the household beneficiaries have heating equipment that can burn briquets.
- 4. Propose the most cost-efficient methods of vegetal waste collection, transportation and production potential, including the cost/benefit analysis.
- 5. Calculation of the following climate related parameters:
  - a. The CO2 reduced by replacing the burning of coal with wood briquettes;
  - b. Reduced CH4 emissions from the landfill;
- 6. Take lead in presenting the draft Pre-Feasibility assessment report at the meeting with key stakeholders (Ministry of Agriculture, Regional Development and Environment, Municipality, State hydrometeorological service, Academia)

For detailed information, please refer to Annex 1 – Terms of Reference.

# 3. REQUIREMENTS FOR EXPERIENCE AND QUALIFICATIONS

- I. <u>Academic Qualifications:</u>
  - University degree in energy systems, energy efficiency, energy management and/or other related fields;
- II. <u>Years of experience:</u>
  - At least 5 years of professional experience in designing biomass production and processing services or another relevant field;
  - Minimum 4 previous assignments pertinent to conducting technical studies in the field of biomass production and processing;
  - Previous working experience with UNDP or other international agencies will be an asset.
- III. <u>Competencies:</u>
  - Ability and demonstrated success to work in a team, to effectively organize it, and to
    motivate its members and other project counterparts to effectively work towards the
    project's objective and expected outcomes;
  - Excellent communication, analytical, facilitation and presentation skills;
  - Excellent computer literacy (Word, Excel, Internet, Power Point).
- IV. Language skills:
  - Proficiency (verbal and written) in Romanian and English; working level of Russian will be an asset

Proven commitment to the core values of the United Nations, in particular, respecting differences of culture, gender, religion, ethnicity, nationality, language, age, HIV status, disability, and sexual orientation, or other status.

UNDP Moldova is committed to workforce diversity. Women, persons with disabilities, Roma and other ethnic or religious minorities, persons living with HIV, as well as refugees and other noncitizens legally entitled to work in the Republic of Moldova, are particularly encouraged to apply.

### 4. DOCUMENTS TO BE INCLUDED WHEN SUBMITTING THE PROPOSALS

Interested individual consultants must submit the following documents/information to demonstrate their qualifications:

- 1. Proposal:
  - (i) Explaining why they are the most suitable for the work;
  - (ii) Provide a brief methodology on how they will approach and conduct the work (if applicable);
- 2. Financial proposal;
- 3. Personal CV including past experience in similar projects and at least 3 references;
- 4. Offeror's Letter confirming Interest and Availability.

### 5. FINANCIAL PROPOSAL

#### Lump sum contracts

The financial proposal shall specify a total lump sum amount, and payment terms around specific and measurable (qualitative and quantitative) deliverables (i.e. whether payments fall in

installments or upon completion of the entire contract). Payments are based upon output, i.e. upon delivery of the services specified in the TOR.

In order to assist the requesting unit in the comparison of financial proposals, the financial proposal will include a breakdown of this lump sum amount (including fees, taxes, travel costs, accommodation costs, communication, and number of anticipated working days).

# <u>Travel</u>

<u>All envisaged travel costs must be included in the financial proposal</u>. This includes all travel to join duty station/repatriation travel. In general, UNDP should not accept travel costs exceeding those of an economy class ticket. Should the IC wish to travel on a higher class he/she should do so using their own resources.

In the case of unforeseeable travel, payment of travel costs including tickets, lodging and terminal expenses should be agreed upon, between the respective business unit and Individual Consultant, prior to travel and will be reimbursed.

# 6. EVALUATION

Initially, individual consultants will be short-listed based on the following minimum qualification criteria:

- University degree in energy systems, energy efficiency, energy management and/or other related fields;
- At least 5 years of professional experience in designing biomass production and processing services or another relevant field;
- Minimum 4 previous assignments pertinent to conducting technical studies in the field of biomass production and processing.

The short-listed individual consultants will be further evaluated based on the following methodology:

#### Cumulative analysis

The award of the contract shall be made to the individual consultant whose offer has been evaluated and determined as:

a) responsive/compliant/acceptable, and

b) having received the highest score out of a pre-determined set of weighted technical and financial criteria specific to the solicitation.

\* Technical Criteria weight – 60% (300 pts);

\* Financial Criteria weight – 40% (200 pts).

Only candidates obtaining a minimum of 210 points would be considered for the Financial Evaluation.

Criteria	Scoring	Maximum Points Obtainable
<u>Technical</u>		
University degree in energy systems, energy efficiency, energy management and/or other related fields	(University degree – 35 pts, Master's – 45 pts)	45

At least 5 years of professional	(5 years – 35 pts, >5 years – 45	45
experience in designing biomass	pts)	
production and processing services or		
another relevant field		
Minimum 4 previous assignments	(no – 0, each assignement – 15	60
pertinent to conducting technical	pts.)	
studies in the field of biomass		
production and processing.		
Interview (demonstrated technical know	•	interpersonal
skills; initiative; creativity/ resourcefulnes		
Ability and demonstrated success to	limited – <15 pts, satisfactory – <25	40
work in a team, to effectively organize	pts, extensive –<40 pts.	
it, and to motivate its members and		
other project counterparts to effectively		
work towards the project's objective		
and expected outcomes;		
Proven experience in working with	limited – <15 pts, satisfactory – <25	40
international organizations (successful	pts, extensive –<40 pts.	
experience in working with UN		
agencies is an asset)		
Excellent communication, analytical,	limited – <15 pts, satisfactory – <20	30
facilitation and presentation skills	pts, extensive –<30 pts.	
Excellent computer literacy (Word,	limited $- <10$ pts, satisfactory $- <15$	20
Excel, Internet, Power Point)	pts, extensive –<20 pts.	00
Proficiency (verbal and written) in	(English – max 10 pts., Russian–	20
Romanian and English; working level of	max 10 pts. or Romanian – max 10	
Russian will be an asset	pts.)	
Maximum Total Technical Scoring		300
Financial		
Evaluation of submitted financial offers will be do	one based on the following formula:	
<u>S = Fmin / F * 200</u>		200
S – score received on financial evaluation;	re qualified over the technical availation records	200
Fmin – the lowest financial offer out of all the submitted offer – financial offer under consideration.	is qualified over the technical evaluation round;	

### Winning candidate

The winning candidate will be the candidate, who has accumulated the highest aggregated score (technical scoring + financial scoring).

### Important notice

The applicant's who has the statute of Government Official / Public Servant, prior to appointment will be asked to submit the following documentation:

• a no-objection letter in respect of the applicant received from the government, and;

• the applicant is certified in writing by the government to be on official leave without pay for the entire duration of the Individual Contract.

A retired government official is not considered in this case a government official, and as such, may be contracted.

# ANNEXES:

ANNEX 1 – TERMS OF REFERENCES (TOR) ANNEX 2 – INDIVIDUAL CONSULTANT GENERAL TERMS AND CONDITIONS ANNEX 3 – OFFEROR'S LETTER CONFIRMING INTEREST AND AVAILABILITY