

**Request for Expression of Interest for selection of organization(s) for
Supply, Installation and Commissioning of 2 cubic meter per day capacity
Small-scale Biodigester System**

22nd September 2025

Important information and dates:

Eoi No	PLN/MBDA/12383/2025/NF
Name of the Work	Empanelment of organization(s) for Supply, Installation and Commissioning of 2 cubic meter per day capacity Small scale Biodigester System
Date of Issue of Eoi	22 nd September 2025
Last date for submission of Clarification queries	1 st October 2025
Last date & time of submission of EOI	14 th October 2025, 4:00 PM IST
Date & Time of Opening of the EOI	14 th October 2025, 4:30 PM IST
Address for communication/ submission of EOI	Procurement Unit, O/o MegARISE, RDL Building, Springside Lumsophoh, Nongthymmai- 793014, Shillong, Meghalaya Email ID: meglife.procurement@gmail.com

1. Background:

Access to clean and affordable energy for household cooking is a pressing challenge, particularly in rural areas where traditional fuel sources are scarce or environmentally unsustainable. According to the Report “Identification of Drivers of Deforestation in Meghalaya” published by MBDA, in 2028-19, total consumption of Firewood in Rural Meghalaya is 607942.2 MT. Biogas, a renewable energy source produced through the anaerobic digestion of organic waste, has emerged as a viable solution for addressing this energy gap and an environmentally friendly option too.

MBDA is planning to install these bio digesters across the state. On Pilot basis, Nongsangu Village under Umsning Block under Ri-Bhoi district has been selected for initiating the process.

2. Objective:

- a. Setting up of biogas plants in the form of Small Scale Biodigester System for clean cooking fuel, which results in GHG reduction,
- b. Production of organic enriched Bio-manure in the form of digested slurry as a byproduct of the biogas plants, for supplementing/ reducing of use of chemical fertilizers.

3. Submission of Proposal:

The bidders are expected to submit a detailed proposal covering the following:

- a. Organisation Details
- b. Details of the Biodigester system installed by them
- c. Overall cost required, investments to be made, timelines, support required from the Government, expected return for the community.

4. Other guidelines for submission of Expression of Interest:

- a. EOI must be delivered in a written form to the address mentioned through registered post/ speed post/ courier/ by hand on or email on or before **14th October 2025, 4 PM.**
- b. Queries if any shall be e-mailed to meglifeprocmeg@gmail.com before **11:59 PM 1st October 2025**. No queries will be entertained beyond the deadline.

5. Eligibility Criteria:

The bidders are allowed to collaborate and submit joint responses; however, the following eligibility criteria needs to be fulfilled:

- a. The lead bidder should be an organization having its registered office in India.
- b. The lead bidder shall have the experience of installation of 10 units of the Biodigester System.
- c. The lead bidder should have an average annual turnover of at-least 5 Lakh (averaged over the years 2021-22, 2022-23 and 2023-24).
- d. None of the bidders should be blacklisted by any of the Government organisations in India.

Certificate/ self-declaration stating/ evidencing the above needs to be furnished as a part of the bid response.

6. Evaluation Criteria:

The eligible response would then be evaluated further based on the merit of the proposal. The following is the evaluation criteria for the shortlisting of the responses:

Sl. No.	Evaluation Criteria	Weightage out of 100
i.	Experience in the supply, installation and commissioning of biodigester system. Projects in Meghalaya will fetch a higher score.	30
ii.	Experience of the lead bidder of working on Community NRM project(s).	20
iii.	Merit of the proposed project(s) including the relevance, efficiency, practicality, equitability (especially benefits proposed for the communities involved), sustainability (beyond the project duration as well) impact and/ or innovativeness of the solutions, specifically could taken-up/ scaled in Meghalaya	40
iv.	Availability of human resource with experience with the bidder and the team proposed for the work	10

The eligible entities may be asked for a detailed presentation to the Evaluation committee covering the above criteria prior to the **final shortlisting**.

7. Other conditions:

- a. The Government of Meghalaya reserves the right to extend/ amend the Request for the Expression of Interest at any point of time.
- b. The Government of Meghalaya reserves the right to seek clarification/ additional information and documents from the bidders regarding various claims submitted by them in their proposal.
- c. Selected agencies would get into an agreement with the MegLIFE, MBDA. Shortlisting/ selecting an agency does not necessarily mean that the MegLIFE, MBDA would get into a legally binding agreement with it. This is just an empanelment for Supply, installation and commissioning of Small-scale Biodigester System. A Memorandum of Understanding (MoU) would be signed up with the selected organization(s) and the shortlisted proposal(s) would be looked at on a case-to-case basis and will be taken up based on parameters like the attractiveness of the proposal, availability of funds and other resources, willingness of communities involved etc. Relevant project specific agreements may be signed up with the shortlisted firms subsequently.
- d. Initially there will be a pilot project in Nongsangu Village under Ri-Bhoi District. Later on, on the basis of the outcomes this will be replicated in other MegLIFE villages under Meghalaya.
- e. More than one bidder/organisation may be empaneled under this EoI. MegLIFE, MBDA may allot different bidder/organisation to install in different districts. The separation of their area of implementation may be decided by MegLIFE, MBDA in terms of territorial jurisdiction or any other criteria, which MegLIFE, MBDA may find suitable.
- f. Failure to undertake the work by the bidders after work allotment might lead to their “Black-listing” by the Government of Meghalaya.

About MBDA: The Meghalaya Basin Development Authority (MBDA) is a Society registered under the Societies Registration Act 1860. Set up in March 2011 and headed by the Chief Secretary, Government of Meghalaya. Its Registered Office is situated at Nongrim Hills, Shillong. MBDA closely works with the communities and aims to address management of natural resources in the state while addressing issues of livelihoods among the rural communities with emphasis on sustainable good practices. Its strategies focus on leveraging the strengths of the land while adapting to climate change, without degradation to the environment.

Terms of Reference

Name of the Work-

Supply Installation and Commissioning of 2 cubic meter per day capacity small scale Biodigester System for treatment of 45-50 kg of Cattle Dung and 35-40 kg of pig droppings or organic waste (such as kitchen waste and agricultural byproducts) daily.

Background-

Access to clean and affordable energy for household cooking is a pressing challenge, particularly in rural areas where traditional fuel sources are scarce or environmentally unsustainable. According to the Report “Identification of Drivers of Deforestation in Meghalaya” published by MBDA, in 2028-19, total consumption of Firewood in Rural Meghalaya is 607942.2 MT. Biogas, a renewable energy source produced through the anaerobic digestion of organic waste, has emerged as a viable solution for addressing this energy gap and an environmentally friendly option too.

MBDA is planning to install these bio digesters across the state. On Pilot basis, Nongsangu Village under Umsning Block under Ri-Bhoi district has been selected for initiating the process.

Objectives-

1. Setting up of biogas plants in the form of Small Scale Biodigester System for clean cooking fuel, which results in GHG reduction,
2. Production of organic enriched Bio-manure in the form of digested slurry as a byproduct of the biogas plants, for supplementing/ reducing of use of chemical fertilizers.

Scope of the Work-

To attain the above-mentioned objectives, the scope covers the setting up of small scale Biodigester System for the treatment of 45-50 kg of Cattle Dung and 35-40 kg of pig droppings or organic waste per day per system for individual/community user.

To achieve this, the selected vendor will ensure the following-

1. Design, Supply, erection, testing and commissioning of the set at the installation site, complete in all respects to the users.
2. Suppliers need to share customer details along with Lat. & Long of the installation sites. Photographs of each installation need to be shared as per the prescribed format.
3. Training community members for digging of pits (digester) for the installation of biogas plants

Turn-key Commissioning-

Small scale Biodigester System will be installed in Nongsangu Village under Umsning Block on a pilot basis on Turn-key contract with at least five years free warranty for trouble-free functioning.

Installation & Commissioning

After the acceptance of the bid, the Bidder/Supplier shall submit a detailed plan with defined timelines to carry out the works, including the delivery to site, erection and commissioning thereof. After approval, the Bidder/Supplier shall adhere to the sequence of order and method stated therein. The plan may be adjusted on the basis of site-specific requirements from time to time.

Terms & Conditions-

- Selected vendor shall work in close coordination with MBDA for site selection and commissioning.
- MBDA, in order to ensure compliance with the schedule, shall review and recommend measures to ensure the assignment is duly completed as per the expectations of the contract.
- The selected vendor shall engage qualified and efficient workers for installation, commissioning and maintenance of the biogas plants.

Facilitation by MBDA-

- MBDA will provide the following facilities to the Bidder/Supplier for carrying out the installation work:
- Space for installation of equipment/ items.
- Support with community mobilization
- If the selected vendor suffers delay and/or incurs costs from failure attributed to MBDA, MBDA shall provide reasonable extension of time or other support to enable the selected vendor to complete the work.

Installation and Maintenance

- Memorandum of Agreement (MOA) in case of Private land and Non-Objection Certificate (NOC) in case of Community Lands shall be taken.
- The Environment and Social Safeguard checklist has to be followed.
- Installation: Vendor should include full setup, installation, and testing of the system, including placement of the digester and storage tank.
- Site Preparation: Vendor should advise on the ground preparation required for installation, including leveling and securing the digester.
- User Manual: Clear instructions on daily feeding, gas extraction, maintenance, and safety protocols.

- Maintenance: Periodic cleaning instructions for the digester and storage tank.
- Include a basic guide for troubleshooting issues such as reduced gas production or leaks.

Technical Specifications for small scale Biodigester System:

Functional Requirements: To generate biogas from cattle/pig dung

Design Requirements: Broad design requirements for the set are indicated below:

A. Input and output Specifications:

1. Gas production capacity to be 2 cubic meter/day
2. Cattle Dung input expected in the range of 45-50 kg/day. In case of pig droppings 35 to 40 Kg/day. Dung: Water ratio: 1:2)
3. Retention period: 40 days
4. Digester volume/slurry tank: 4,000 lit. (minimum)
5. Total volume: 6 cubic meter (minimum)
6. Digester and gas holder shall be a single unit
7. Digester Area to be less than 7.5 square meters.
8. Trouble-free constant pressure of biogas for cooking without external device.

B. Material

1. UV-protected LLDPE high tensile material (minimum 1000 gsm)
2. Unit to be flexible, repairable & portable in design

C. Accessories Included:

1. Double burner SS Stove. With Spring-Free knobs that don't wear & tear.
2. Feeding tank with mixing devices and arrangements as per need.
3. Inlet and outlet pipes branded with appropriate diameter. 14
4. Gas pipe (appropriate dia.) to be branded, length – 30 mtr or more as per location-specific.

D. Safety:

1. Pressure released mechanism to be provided so as to ensure trouble free operation
2. H₂S removal mechanism to avoid corrosion of accessories. Large medium provided with Chemical absorbent which regains its strength after washing and exposure to air.

E. Warranty:

1. 1 year warranty (for manufacturing defects only) provided from date of commissioning.
2. Life guarantee of Digester – 10 years from date of commissioning.

F. Service:

Response to all complaints within 72 hours of complaint logging