

TERMS OF REFERENCE
Institute of Natural Resources, Meghalaya

Assignment Title: Selection of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs for setting up of Field Distillation Units (FDU) under MEGH-AROMA MISSION

Reference No: No: MEG INR/2022/94

Aromatic crops are some of the most profitable but underutilized crops, which have immense potential to alleviate socio-economic condition of small and marginal farmers. Essential oils of these crops have very high demand in national and international market. However, the growth opportunities in this sector have not been fully utilized. In order to bring an influential and transformative change in the rural economy, market dynamics and growth opportunity, **MEGH-AROMA MISSION** has been conceptualized which aims to **promote cultivation of these high value crops, processing, value addition and marketing of essential oil for providing additional income to farming communities and encouraging agri-businesses for the people of the state.** Under this Mission the Institute of Natural Resources, Meghalaya an implementing Agency of the mission aims to bring about 1000 ha of additional area under cultivation of aromatic cash crops particularly targeting degraded waste land, and unutilized barren land.

I. Scope of the Project:

Cultivation of Medicinal & Aromatic Plants is gaining momentum day by day due to ever increasing demand of plant based materials naturals in India and abroad. However, sustained supply of high quality planting materials is a common problem faced by user industries. In this endeavor efforts are being made by CSIR-CIMAP to introduced improved technologies and high yielding varieties to increase quality planting materials by the growers and entrepreneurs in the country. The Institute of Natural Resources under Meghalaya Basin Development Authority has planned promotion of medicinal and aromatic plants related activities in the State with the aim to introduce develop and disseminate technologies for cultivation, promotion and processing among the growers and entrepreneurs of the state in a time bound manner. It is emphasized to introduce only such commercially viable crops such as aromatic grasses, Geranium, Patchouli, Pyrethrum, Palmarosa and other crops which are suitable to the agro-climatic conditions of the State. Indigenous aromatic plants such as *Gautheria fragrantissima*, *Litsea cubeba*, *Zanthoxylum khasianum* can be explored for their aromatic oils. It is emphasized to conduct trials relating to plant genotype and environment interaction, production of the plants for field trials at farmers field through CIMAP technologies with special reference to the commercially viable plant varieties in aromatic grasses, Geranium, Patchouli, Pyrethrum, Palmarosa and other crops of economic value suited to the state of Meghalaya.

It is emphasized that introduction of selected MAPS crop in prevailing cropping system in the implementation area shall ensure optimum utilisation of resources effectively and augment income of the growers and entrepreneurs besides generating additional employment opportunities in the State. The MAPs on an average are likely to provide a net profit of Rupees Fifty thousand to One lakh per hectare.

2. Mission Objectives: In order to bring a decisive and transformative change in the rural economy, a mission has been conceptualized which aims for:

- Promotion of cultivation of High value crops in all districts of the State.
- Developing demonstration blocks in form of cluster of commercially importance medicinal and aromatic plants for the state at district level with the area of approximately 10-20 acres in each district initially.
- Establishing multiplication and processing facility for elite planting material of high yielding varieties of selected medicinal and aromatic plants suitable for Meghalaya.
- Establishing conservatories of genetic resources as a part of further providing planting material to the growers.
- Demonstration of processing facility (distillation unit) related technologies to development entrepreneurship.
- Gas Liquid Chromatography
- Establishing laboratory units for determining chemical content or analysing quality of oil.
- To arrange buy back of produce
- To identify and domesticate the excess exploited medicinal and aromatic plant from wild source of Meghalaya

3. Mission Outcomes:

- Bringing about 1000 hectares of additional area under captive cultivation aromatic cash crops particularly targeting rain-fed degraded land across the state.
- Provide technical and infrastructural support for distillation and value-addition to farmers/growers all over the state.
- Enabling effective buy-back mechanisms to assure remunerative prices to the farmers/growers.
- Value-addition to essential oils and aroma ingredients for their integration in global trade and economy.

4. Approach: To achieve the objective of the project the following approaches are planned-

- Developing cluster of priority medicinal and aromatic plants by planting high yielding varieties developed by CSIR CIMAP.
- Observation and data recording on suitability of these plants.
- Release of an information brochure on these plants in local language.
- Development of macro propagation and nursery techniques.
 1. Establishment of varieties of selected plants for further distribution to growers.
 2. Macro propagation under green house for large scale multiplication.
- Conducting training programmes on cultivation and production of MAPs and one or two awareness camps in the farmers' clusters.

- To provide motivation and skill promotional training to growers/farmers in MAPs cultivation and distillation methods for development of entrepreneurship.
- Establishing distillation and quality evaluation facility for processing of plants for demonstrations.
- Further identification of plants of regions which are overexploited in some pockets and needs cultivation to safeguard the biodiversity.
- To increase organic farming through set up of vermin-composting units for distillate waste utilization.

5. Project Components:

A. Awareness/Capacity Building/Skill Development

B. Cultivation/primary processing/cluster formation

- Selection of interested farmers/ growers willing to take up nursery raising at the initial stage
- Selection of crops
- Promotion of cultivation and processing of aromatic crops
- Multiplication of the planting material of the selected crops
- Selection of clusters of farmers and promotion of cultivation of these crops to newer suitable areas to enhance area under cultivation of selected crops.
- Setting up of distillation units, and catalyzing setting up of farmers cooperatives for marketing the produce
- Market Linkage

6. Project Deliverables:

To provide infrastructural support to stakeholders (Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs) and facilitate establishment of Field Distillation Units (FDUs) for post harvest processing of Aromatic crop to achieve substantial socio-economic growth through processing of essential oils.

8. Period of engagement: The time period for the said engagement would abide on the usage and maintenance of the FDUs by the selected stakeholder, the performance would be reviewed annually and the INR has the right to reclaim the FDUs from the non-performing stakeholders.

10. The Institute of Natural Resources, Meghalaya (INR) invites Application from Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs for setting up of Field Distillation Units (FDU) of essential oil of 200 Kg up to 1 ton capacities.

11. The short-listing criteria are annexed at **Annexure-A**. The assignment will cover all 12 districts of the State, hence interested stakeholders are invited.

6. The INR retains the right to allocate the setting up of FDUs to eligible stakeholders based on their credentials.

7. Further information can be obtained at the address below during office hours (10:00 AM- 5:00 PM)

8. The application must be delivered in a written form to the address below through registered post/ speed post/ courier/ by hand or on or before 17th January 2023.

Sd/-

The Executive Director
Institute of Natural Resource, Meghalaya
Shalom Building, 3rd Floor
Lower Lachumiere, Shillong-793001
Tel. no.: 0364- 2502577
Email-ID: minr.mbda@gmail.com

STANDARD FORMAT FOR APPLICATION

STAKEHOLDER'S PROFILE

A. Stakeholder's profile	
Organizational	Name of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs
	Registration Certificate
	List of members in case of Farmer's Group / SHG's / Cooperative Societies/VECs
	Name of location (Village/Block/District)
	Area under cultivation owned by Individual/entrepreneur /SHG/ Society in Ha.
	Name of Aromatic crops under plantation
	PAN Card
	Voter ID
	GST No.
	NOC from the Headman
Financial Information (Please enclose the financial statement of last financial year)	
	Entrepreneurs/ Farmer' Groups /Registered Groups/Cooperative Societies/ VECs should submit last 6 months Bank Statement

Annexure-A: Criteria for shortlisting/selection of sites for setting up of Field Distillation Unit: In order to ensure sustainability and successful operation of the FDU following criteria are developed.

Points	Criteria	Indicator	Documents Required
1	Proprietary of plantation	Co Operative Society/SHG/VO/IVCS/VEC/VN RMC/Farmer producer group	Registration certificate
2	Availability of standing crop throughout the year	5 acres minimum area under plantation	Land Registration Certificate or NOC from the Headman
3	Continuous Water supply for running the FDU	Spring water, borewell, any other sources of water	Relevant Documents to prove the claims
4.	Availability of land for installation of FDU	Own land preferably within or near the periphery of plantation site	Address Proof
5	Road Connectivity for transportation of herbage from plantation to distillation site	Kutchra road or motorable approached road in all seasons.	Relevant Documents to prove the claims
6	Availability of wood pyre	Biomass waste, briquette, fuelwood	Relevant Documents to prove the claims
7	Irrigation	Availability of rainwater harvesting, perennial source, etc.	Relevant Documents to prove the claims
8	Optimum utilization of the FDU	Minimum 2 charges/day	Relevant Documents to prove the claims
9	Prospect Cluster Formation	Clustering of 2 to many villages within the distance of 5-10 Kms from the CFC	Relevant Documents to prove the claims
10	Stakeholder Contribution	Contribution in the form of construction of processing shed to protect the FDU from rain.	Relevant Documents to prove the claims

11	Women Inclusion	At least 30-50% of the Members of the Group should be women.	Resolution for Registration
12	Update on Group meetings	A photocopy of the minute on every meeting to be copied to the Institute.	Copy of the Minute
13	Termination of Ownership	The Institute has the right to retrieve back the unit if the stakeholder does not maintain or make full operation of the processing unit.	Relevant Documents to prove the claims
14	Ease of market linkage		

(Self-Declaration on Non-Judicial Stamp Paper)

Declaration

Date:.....

To whom so ever it may be concern

I/We hereby solemnly take oath that I/We of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs are authorized signatory in the I/We of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs and hereby declare that I/We of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs do not face any sanction or any pending disciplinary action from any authority against I/We of Farmer's Group / Entrepreneurs / SHG's / Cooperative Societies/VECs." Further, it is also certified that our firm has not been blacklisted by any government or any other donor/partner organization/World Bank in present.

In case of any further changes which effect of this declaration at a later date; we would inform INR accordingly.

Authorized Signatory

(with seal)