

Terms of Reference (TOR) for Consultancy Services



Training Module Development on Paddy Mat-Based Nursery Preparation and Mechanical Transplanting in Karnataka regions

Title	Training Module Development on Paddy Mat-Based Nursery Preparation and Mechanical Transplanting in Karnataka regions
Timeline	02 months
Expected area of expertise	<ul style="list-style-type: none">• Agronomy and Paddy Nursery Management, Agricultural Mechanization, Farmer Training and Curriculum Development, Multimedia content development
Apply Link	https://forms.gle/fHvKmk7YbMQvQXya6 (Contact Procurement for Form Link)
Last Date for Apply	11th May, 2025

1. Background:

Paddy cultivation in Karnataka continues to rely heavily on manual methods for nursery raising and transplanting. Despite the availability of mechanized solutions like mat-type nursery-based mechanical transplanting, adoption has remained limited due to multiple systemic, technological, and behavioral barriers.

This training module aims to build the awareness and capacities of paddy farmers, agri-entrepreneurs, and rural youth on **mat-based nursery preparation and mechanical transplanting techniques for paddy cultivation**. The training emphasizes the bridging gap between Traditional nursery to Matt based with integration of **clean energy solutions** at every step to enhance sustainability, reduce labor dependency, and promote climate-resilient practices. The curriculum includes **two 1-hour modules**, combining theory, hands-on learning, and field demonstrations.

2. Goal and Objective:

Goal:

Training modules aims to equip paddy farmers and rural youth with best practices in mat nursery and mechanized transplanting through field demonstrations, while integrating clean energy

solutions to enhance productivity, reduce costs, and promote climate-smart, scalable cultivation methods.

Objectives:

- To educate Paddy growers and rural youths on best practices in **mat nursery preparation** and **efficient transplanting**.
- To provide **practical exposure** through demonstrations and live field activities.
- To integrate **clean energy solutions** into nursery management and transplanting operations.
- To enable farmers and service providers to improve productivity, reduce costs, and increase mechanization compatibility.

3. Scope of the study

Focused Geography: Karnataka (Targeted districts- Mandya, Davanagere, Koppala, Udupi, Chitradurga, Raichur, Mysore, Bellary)

Modules Breakdown:

Module 1: Mat-Based Nursery Preparation

Objective: To equip farmers with the knowledge and skills to prepare mat nurseries suitable for mechanized transplanting with clean energy integration

Content:

- Types of Paddy Sowing and Transplanting
- Types of Paddy (Nursery preparations (including Automatic Nursery Making Machine)
- Land/site selection and material requirements.
- Seed selection, soaking, pre-germination, and seed rate.
- Bed preparation, sowing method, and mulching practices.
- Watering schedule, Manure and Fertilizers, labor rate and nursery maintenance.
- Troubleshooting and common challenges.
- Quantitative and qualitative advantages of Matt based Nuseries over Traditional nurseries

Field Visit & Hands-on Training: Video documentation

1. *Demonstration at a functioning mat nursery site (One in manual Matt based Transplanting and Automatic Nursery preparation at **Individual or any SHG/ FPO (ex: SKDRDP, KVK)**)*

Activities: tray preparation, seed sowing, Manuring and maintenance routines.

Video Documentation of Complete Matt based Nursery preparation Training

2. Peer-to-peer interaction with local nursery practitioners (farmers Nursery service Providers and custom hiring centers) - **Questionnaire preparation by consultant**

-- Capturing Video Testimonials of 50 Individual paddy Farmers (at least covering 5 paddy growing districts, 25 each from Non-Matt and Mat based Nursery Farmers at 2-3 mins each)

--- Capturing 5 FPOs/Enterprises video Testimonials for Paddy Nursery Service providers/FPOs _ each at 5-6 mins

Module 2: Transplanting Techniques (Manual & Mechanized)

Duration: 1 hour

Objective: To provide practical skills on transplanting mat nursery seedlings into the field using manual and mechanized approaches, highlighting efficiency gains and energy-smart solutions.

Content:

- Importance of timely transplanting and its impact on yields.
- Manual transplanting: best practices and ergonomic methods.
- Mechanical transplanting:
 - Machine types and specifications with few vendors list
 - Land leveling and field preparation.
 - Loading and operating the rice transplanter.
- **Integration of clean energy:**
 - **Battery/electric-powered transplanters.**
 - **Solar charging setups for small agri-machines.**
- Maintenance and servicing of machines.
- Cost-benefit comparison: traditional vs mechanized.
- Quantitative and qualitative advantages of Mechanical Transplanting over Traditional nurseries

4. Field Visit & Hands-on Demonstration:

- Live transplanting using mechanical and manual methods.
- Participants operate or observe transplanters in action.
- Troubleshooting and QA with experts like Agricultural department, Champion farmers
- Interview with at least 10 Transplanters Vendors (**Questionnaire Prepared by Consultant**)

5. Target Audience:

- Small and marginal paddy farmers.
- FPOs and SHG members are involved in nursery or transplantation services.
- Rural youth and entrepreneurs in Agri-mechanization.
- Agri-extension workers and community facilitators.

6. Week wise Plan with Deliverables

Week wise	Focus Area	Objectives	Key Activities	Expected Outputs
Week 1	Orientation & Planning	Stakeholder alignment and resource planning	<ul style="list-style-type: none">- Partner meetings (KVK, SHG, FPO)- Site and stakeholder finalization- Onboard 5 practitioners, 10 vendors, 2 champion farmers- Draft interview questionnaires- Procure inputs for demo	<ul style="list-style-type: none">- Finalized stakeholders/sites- Draft questionnaires- Field visit schedule
Week 2	Module 1: Content Creation Phase 1	Draft nursery training material and tools	<ul style="list-style-type: none">- Prepare draft for: nursery types, seed prep, bed making- Activity checklist for nursery- Script outline for nursery video- Identify 50 farmers (25 mat + 25 non-mat)	<ul style="list-style-type: none">- Draft of Module 1 PDF- Evaluation formats- Farmer list finalized- Identification of 5 Best Matt based Farmers / Sites

Week 3	Module 1: Field Demo & Video	Conduct and document mat nursery preparation	<ul style="list-style-type: none"> - Hands-on nursery creation (manual + automated) - Step-by-step training activities - Record demo Video - Begin interviews with 25 non-mat users 	<ul style="list-style-type: none"> - Demo scripts and footage - Activity records (Video) - 25 videos testimonials (non-mat)
Week 4	Module 1: Peer Learning & Review	Capture peer insights and wrap up nursery module	<ul style="list-style-type: none"> - Peer sessions with SHGs/FPOs - Complete 25 mat nursery farmer interviews - Capture 5 FPO testimonials - Finalize Module 1 manual & video edits 	<ul style="list-style-type: none"> - Final Module 1 word and PDF formats - 25 mat farmer videos - 5 FPO interviews
Week 5	Module 2: Content Creation Phase 2	Develop transplanting training materials	<ul style="list-style-type: none"> - Prepare manual: manual/mechanized transplanting, land prep, machine types - Draft scripts for transplanting videos - Finalize 10 vendors 	<ul style="list-style-type: none"> - Draft Module 2 PDF & video scripts - Tools checklist - Vendor list
Week 6	Module 2: Field Demo & Documentation	Demonstrate manual and mechanized transplanting	<ul style="list-style-type: none"> - Field demo of both transplanting types - Record video of practices - Troubleshooting by experts - Start vendor interviews 	<ul style="list-style-type: none"> - Video footage of transplanting - Demo scripts - 5 vendor interviews - 5 Case studies of best Matt based following Farmers for Training (different districts would be Better)
Week 7	Interviews & Content Finalization	Complete vendor interviews, validate content	<ul style="list-style-type: none"> - Remaining 5 vendor interviews - 2 champion farmer interviews - Review all content with trainers - Final edits of videos & PDFs 	<ul style="list-style-type: none"> - Final Module 2 word and PDF format - Complete interview footage - Clean energy integration examples

Week 8	Consolidation & Delivery	Package final training materials for rollout	<ul style="list-style-type: none"> - Final video edits (with subtitles) - Create toolkit: PDFs, scripts, checklists - Conduct pilot/dry run of training - Submit all deliverables 	<ul style="list-style-type: none"> - Complete training toolkit (PDF + Videos) - Pre/post evaluation formats - Ready-to-use module for scale-up
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7. Expected Outcomes:

- Participants understand and implement mat-based nursery preparation techniques.
- Enhanced use of **mechanized transplanting**, reducing labor burden and increasing field efficiency.
- Promotion of climate-smart rice farming practices.
- Creation of agri-enterprise opportunities around nursery and transplanting services.

8. Expected Deliverables:

1. Stakeholder Documentation

- Finalized list of stakeholders (KVKs, FPOs, SHGs)
- Profiles of 5 practitioners, 10 vendors, and 2 champion farmers
- Site selection and field visit schedule

2. Training Modules

a. **Module 1:** *Mat-Type Nursery Preparation*

- Training manual (Word + PDF)
- Step-by-step activity checklists
- Final edited training video with subtitles
- 25 video testimonials from non-mat nursery users
- 25 videos from mat nursery users
- 5 FPO testimonials
- Nursery tools checklist

b. **Module 2:** *Manual & Mechanized Transplanting*

- Training manual (Word + PDF)
- Draft scripts for transplanting practices
- Final edited training video with subtitles
- Demonstration documentation for both transplanting types

- v. 10 vendor interview videos
- vi. 2 champion farmer interviews
- vii. 5 case studies of successful mat-based nursery farmers from different districts
- viii. Transplanting tools checklist

3. Learning & Evaluation Tools

- a. Pre- and post-training evaluation formats
- b. Interview questionnaires and feedback templates
- c. Peer learning insights and review notes

4. Clean Energy Integration Examples

- a. Use cases/examples of solar-powered tools in nursery/transplanting
- b. Documentation of clean energy applications from field demos

5. Pilot Report

- a. Summary of pilot/dry-run training with feedback
- b. Recommendations for scaling and replication

9. Timeline: 2 months

10. Eligibility Criteria

1. Practical knowledge of **traditional and mat-type nursery techniques**.
2. Knowledge of **custom hiring models**, machine cost economics, and operational challenges.
3. Proven experience in developing **adult learning materials** and **training of trainers (ToT)** modules.
4. Experience in integrating **visuals, case studies, and field demonstrations** in training materials.
5. Familiarity with **extension systems** such as FPOs, KVKs, NGOs, and government schemes.
6. Capacity to **engage with women farmers, tenant farmers**, and marginalized communities.
7. **Multimedia content development** (videos, animations, interactive PDFs).
8. Experience working with **government partners (e.g., ATMA, DoA, RSKs)**

11. Submission Requirements

1. A detailed proposal outlining Program Plan, approach, methodology, and timelines for each focus area.
2. A financial quote with a breakdown of costs.
3. Profiles and relevant experience of the team.
4. Examples of similar past projects.

12. Selection Parameters

1. Relevant background and experience -20%
2. Quality of approach and methodology - 20 %
3. Local presence/experience working in the state- 10 %
4. Workplan - 20 %
5. Cost effectiveness - 20%
6. HR – 10%

13. Payment Terms:

Fixed as per the agreement between consultant and SELCO Foundation. Please provide your proposal and quotation for the above-mentioned program requirements. Capture Timelines and Split cost wherever possible.

14. Application Process

If your enterprise meets the eligibility criteria and is interested in collaborating with the SELCO Foundation, please complete the application form linked below with the required information. Enterprises are requested to upload their proposals and quotations directly into the application form.

15. To apply

Interested consultants / organisations, with relevant experience (please include samples and/or references of the previous similar work as proof of experience) and based out of India are requested to reach out with a detailed proposal giving a brief on the methodology and the process they will uptake for this project, including budgets (with break-ups and explanation), timelines and milestones and submit the same to google form <https://forms.gle/9wAdd3r9d8DsY9LFA> on before **11th May, 2025**.

Any further queries please write to procurement@selcofoundation.org with a subject line:

“Training Module Development on Paddy Mat-Based Nursery Preparation and Mechanical Transplanting in Karnataka regions” (Name of Project)

Refer Terms and Condition:**1. Sub-contracting:**

In the event that the Consultant requires the services of subcontractors to perform any obligations under the Contract, the Consultant shall obtain the prior written approval of the Foundation. Any rejection or non-performance of the subcontractor shall not, in and of itself, entitle the Consultant to claim any delays in the performance, or to assert any excuses for the non-performance, of any of its obligations under the Contract, and the Consultant shall be solely responsible for all services, obligations and deliverables performed by its subcontractors

2. Quality Assurance

The data submitted to Selco Foundation should be accurate, complete, reliable and relevant. Consulting agency shall establish additional layers for data cleaning and submission.

3. Financials & Reporting

TDS will be deducted on the fixed amount as per Income Tax Act and Rate of Percentage. In accordance with the Central Board of Direct Taxes circular No. 7 of 2022 dated 30th March, 2022 in relation to the clarifications with respect to Section 114AAA of the Income-tax Rules, 1962, failure to link Aadhar number to the PAN card and/or failure by any person, who falls within the income tax bracket or otherwise, to file tax returns in relation to payment of TDS for any service (in accordance with Section 206AB and 206AA) and/or an inoperative PAN card will result in a 20% tax deduction.

4. Indemnification

Both parties shall indemnify and hold its Trustees, Directors and representative officers, employees, agents harmless from and against any and all claims, demands, actions, losses, liabilities, charges, damages, costs and expenses (including but not limited to reasonable attorney's fees) arising out of or resulting from (1) any claims arising in connection with activities undertaken by both parties in connection with the project or (2) Consultant's gross negligence or willful misconduct or breach of any undertaking, covenant, representation or warranty contained in this agreement and/ or the actual infringement of any patent, trademark, copyrights, trade secret or any other intellectual property right of the third party.

5. Patent, Copyright and other Proprietary Rights

- i. Except as is otherwise expressly provided in writing in the Contract, the Foundation shall be entitled to all intellectual property and other proprietary rights including, but not limited to, patents, copyrights, and trademarks, with regard to products, processes, inventions, ideas, know-how, or documents and other materials which the Consultant has developed for the Foundation under the Contract and which bear a direct relation to or are produced or prepared or collected in consequence of, or during the course of, the performance of the Contract. The Contractor acknowledges and agrees that such products, documents and other materials constitute works made for hire for the Foundation.
- ii. Subject to the foregoing provisions, all documents, reports, recommendations, documents, and all other data compiled by or received by the Consultant under the Contract shall be the property of the Foundation, shall be made available for use or inspection by the Foundation at reasonable times and in reasonable places, shall be treated as confidential, and shall be delivered only to the Foundation's authorized officials on completion of work under the Contract
- iii. The Consultant will treat all information given to him/her as information with proprietary value and will not disclose the same to competitors or any outsiders. The Consultant will not at any time, except under legal process, divulge any trade or business secret relating to the Foundation or any customer or agent of the Foundation, which may become known to him by virtue of his position as consultant, save in so far as such disclosure shall be necessary in the interest and for the benefit of the said Foundation and will be true and faithful to the Foundation in all dealings and transactions whatsoever relating to the said Foundation.
- iv. Reports or other data that are developed specifically for the performance of this Contract shall be the property of the Foundation and the Consultant shall deliver reports and data to the Foundation as per the milestones. Dissemination of the reports and any information from the said contracts shall be done with written approval from the Foundation.

6. Publicity, use of name & Logo of the Foundation:

The Consultant shall not advertise or otherwise make public for purposes of commercial advantage or goodwill that it has a contractual relationship with the Foundation, nor shall the Consultant, in any manner whatsoever use the name, emblem, logo or official seal of the Foundation or that of SELCO in connection with its business or otherwise without the written permission of the Foundation.

7. Observance of Law:

Compliance with Laws and Regulations: The Consultant will comply with all applicable laws, rules, regulations and statutory requirements and amendments thereof, in the manufacture and

distribution of products and supplies and in providing services to the SELCO and during the term of this Agreement.

Child Labor: The Consultant will, its parent entities, partners or subcontractors nor any of its subsidiary or affiliated entities (if any) is engaged in any practice inconsistent with the rights set forth in the Child Labour (Prohibition and Regulation) Act of 1986, which, inter alia, requires that a child shall be protected from performing any work that is likely to be hazardous or to interfere with the child's education, or to be harmful to the child's health or physical, mental, spiritual, moral, or social development.

Forced Labor: The Consultant will not engage in any activity that will result in forced or compulsory labor under applicable laws including the Bonded Labour System (Abolition) Act, 1976,

Abuse of Labor: Consultant will act in accordance with applicable laws and regulations and will not violate the rights of labourers as stated in The Factories Act, 1948 and similar legislations.

Working Hours, Overtime, Wages and Other Benefits-Working hours, wages and benefits shall be provided by the Consultant to its staff and employees in accordance with applicable laws including the Minimum Wages Act, 1948.

Declaration of blacklisting: Consultant represents and warrants to SELCO that, as on the date of signing of this Purchase Order, it is neither blacklisted/ debarred nor it is under a declaration of ineligibility by Central / State or Semi-Government Organization/Department or Institutions and Public Sector Undertakings in India and abroad. The Consultant further undertakes to duly inform SELCO in the event it is blacklisted subsequent to execution of this Purchase Order.

Compliance with Anti-bribery Laws: Consultant and each of its directors, officers, employees, agents or other (collectively referred to as "Consultant") represent and warrant that it shall not either directly or on behalf of SELCO Foundation give, offer, promise to offer, or authorize the offer, directly or indirectly (proxy bribing), anything of value (such as money, shares, goods or service, gifts or entertainment) to government officials, government customers, potential government customers or foreign government officials including officials of any public international organizations or officials of any political party either in India or abroad ("Officials") with an Intent to influence any act or decision in his or her official capacity Induce the Official to do or omit to do any act in violation of his or her lawful duty to obtain any improper advantage, or Induce to use such Official 's influence improperly to affect or influence an act or decision.

The Consultant shall not provide any offering, promising, giving or receive, solicit or accept a financial or other advantage, or any other thing of value, with the intention of influencing or rewarding the behaviour of a person in a position of trust to perform a public, commercial or legal function to obtain or retain a commercial advantage.

The Consultant understands and acknowledges that any non- adherence to the warranty as stated herein above will be violation of the provisions of the Indian Prevention of Corruption Act,1988 and other applicable laws and legislations ("Anti-bribery Laws").

In addition, Consultant agrees to promptly report to SELCO Foundation of any incident of breach or potential breach of this section.

Compliance with Sexual Harassment of Women (Prevention, Prohibition & Redressal) Act, 2013 (PoSH): The Consultant shall agree to adhere to the mandates prescribed under the Sexual Harassment of Women (Prevention, Prohibition & Redressal) Act, 2013, which requires all workplaces to have a Policy and Internal Committee to address complaints of sexual harassment that women may face at the workplace.

8. Termination:

Either party may terminate this contract by giving a notice in writing to the other party stating their intention to terminate the same on the expiration of Seven (7) days from the date of such notice. In addition, the Foundation may also terminate this contract forthwith in the event of any fraud, misconduct or neglect of duties on the part of the Consultant. Any notice to be given hereunder shall be sufficiently given to the Consultant if forwarded by registered post or by Courier Service to the last known postal address of the Consultant and shall be sufficiently given to the Foundation if similarly forwarded to the registered office. Upon the termination of this contract and payment of the said fees due up to such termination, and payment of all disbursements and out-of-pocket expenses incurred up to the date thereof (provided the same have been incurred after obtaining prior approval), the Consultant shall deliver all deeds, documents and paper in his possession relating to the business of the Foundation or as the Foundation shall direct, and shall continue to afford him all reasonable assistance for concluding pending matters at the date of such termination without making any charge thereof.

9. Force Majeure:

i. *Force majeure* as used herein means any unforeseeable and irresistible act of nature, any act of war (whether declared or not), invasion, revolution, insurrection, terrorism, or any other acts of a similar nature or force, *provided that* such acts arise from causes beyond the control and without the fault or negligence of the Consultant

- ii. In the event of and as soon as possible after the occurrence of any cause constituting *force majeure*, the affected Party shall give notice and full particulars in writing to the other Party, of such occurrence or cause if the affected Party is thereby rendered unable, wholly or in part, to perform its obligations and meet its responsibilities under the Contract. The affected Party shall also notify the other Party of any other changes in condition or the occurrence of any event which interferes or threatens to interfere with its performance of the Contract. Not more than fifteen (15) days following the provision of such notice of *force majeure* or other changes in condition or occurrence, the affected Party shall also submit a statement to the other Party of estimated expenditures that will likely be incurred for the duration of the change in condition or the event of *force majeure*.
- iii. On receipt of the notice or notices required hereunder, the Party not affected by the occurrence of a cause constituting *force majeure* shall take such action as it reasonably considers to be appropriate or necessary in the circumstances, including the granting to the affected Party of a reasonable extension of time in which to perform any obligations under the Contract.
- iv. If the Consultant is rendered unable, wholly or in part, by reason of *force majeure* to perform its obligations and meet its responsibilities under the Contract, the Foundation shall have the right to suspend or terminate the Contract on the same terms and conditions as are provided for in this Contract.
- v. Both the Foundation and the Consultant fully and freely intend to create an independent Contractor relationship under this Contract. Nothing herein shall be deemed to establish a partnership, joint venture, association or employment relationship between the parties. Both parties agree that the consultant has the right to sole and exclusive control over the manner and means employed in performing their activities under this Contract.

10. Settlement of disputes:

- i. The Parties shall use their best efforts to amicably settle any dispute, controversy, or claim arising out of the Contract or the breach, termination, or invalidity thereof.

Any dispute, controversy, or claim between the Parties arising out of the Contract or the breach, termination, or invalidity thereof, unless settled amicably, within sixty (60) days after receipt by one Party of the other Party's written request for such amicable settlement, the matter shall be referred by either Party to arbitration in accordance with the Arbitration and Conciliation Act, 1996. The venue of the arbitration shall be at Bangalore. Likewise, the jurisdiction will vest with courts in Bangalore.
