

Request for Quote/Proposal (RFQ/RFP)

Commodity/Service Required:	Manual Drip Irrigation Services: Mod#1
Type of Procurement:	Goods & Service
Type of Contract:	Cost not to exceed
Term of Contract:	One time
Contract Funding:	Department of State (DOS)
This Procurement supports:	Feed The Future Ethiopia Transforming Agriculture
Submit Proposal to:	See the method of submission below
Date of Issue of RFP:	August 31, 2025
Date Questions from Supplier Due:	September 12, 2025, at 16:00 East Africa Time (EAT)
Date Proposal Due:	September 22, 2025, at 16:00 East Africa Time (EAT)
Approximate Date Purchase Order Issued to Successful Bidder(s):	TBD

Method of Submittal:	
Via email to InkindProcurement.ETA@transforming-agriculture.org	
Respond via e-mail with attached document in MS Word / pdf format. The Bidder/Seller agrees to hold the prices in its offer firm for 120 days from the date specified for the receipt of offers, unless another time is specified in the addendum of the RFP/RFQ.	
Solicitation Number:	ETA-AA-25-021-GRT

Attachments to RFP:

1. Attachment "A" – Commodity Specifications
2. Attachment "B" – Instructions to Bidders/Sellers
3. All PO Terms and Conditions are listed on our website at: [rti-po-terms_English Version - v1.20.pdf](#) or for commercial items: http://www.rti.org/files/PO_FAR_Clauses_Commercial_Items.pdf (hereinafter the "Terms"). Supplier's delivery of products, performance of services, or issuance of invoices in connection with this purchase order establishes Supplier's agreement to the Terms. The Terms may only be modified in writing signed by both parties.

All bidders/sellers are responsible to carefully review each attachment and follow any instructions that may be relevant to this procurement.

4. Attachment "C" - Vendor Information Form
5. Attachment "D" - TOR

Attachment A

Commodity Specifications or Statement of Work

Statement of Work

Description of Activity/Service:

TI is an independent organization dedicated to conducting innovative, multidisciplinary research that improves the human condition. Founded in 1958 as a centerpiece of the Research Triangle Park in North Carolina, RTI provides innovative research, development, and a broad range of multidisciplinary services. With a global staff of more than 4,000, RTI implements the Feed the Future Ethiopia Transforming Agriculture Activity. As part of this project, RTI International invites eligible providers to submit bids for manual drip irrigation services. Detailed requirements and service timelines are outlined below.

Product or Service Expectations (both if applicable):

As per the scope of work in **Attachment “D”**

Deliverables, Timelines, Special Terms and Conditions:

Eligibility Requirements

1. For private businesses, offeror must submit proof of legal registration for similar services as demonstrated by 1) commercial registration certificate and tax identification number (TIN) and 2) renewed business license.
2. Offer must be denominated in local currency (Ethiopian Birr)

General Supplier Requirements

1. Bidders/Offerors shall provide a complete design and detailed technical specifications of the manual drip irrigation system, subject to approval by RTI and Manrac. This includes a Bill of Quantities (BoQ) and verify compatibility of existing equipment with the proposed system. See **Attachment B, Section 3 for full proposal requirements.**
2. **Bidders/Offerors can conduct a site visit at their own cost to familiarize themselves with the site conditions**
3. Bidders/Offerors shall supply, deliver, and install all irrigation system components in accordance with the approved design. The final system will be accompanied by a performance validation report.
4. Bidders/Offerors shall provide monitoring and technical support during land preparation to ensure alignment with irrigation system requirements.
5. Bidders/Offerors shall conduct training for Manrac members and staff on system operation and maintenance (O&M), with training materials provided in local languages and attendance sheets submitted.
6. Bidders/Offerors shall submit a final handover report, including layout maps, photos, test results, and user feedback.
7. Bidders/Offerors shall provide four (4) weeks of post-installation follow-up support, with documentation of issues addressed, user feedback, and confirmation of system functionality.
8. Bidders/Offerors shall adhere to the timelines specified in the TOR (Attachment “D” – Section ...)

Special Terms and Conditions

1. Please note that all costs associated with the preparation of proposal are the sole responsibility of the bidders. RTI will not reimburse any expenses incurred during this process.
2. All activities shall be carried out in compliance with the approved design, technical specifications, and donor procurement regulations.
3. Equipment supplied must be brand new, durable, and compliant with international quality standards.
4. Training materials must be practical, user-friendly, and translated into local languages (Somali, Afan Oromo, Amharic as applicable).
5. The Service Provider must ensure on-time delivery and installation, adhering to the agreed project timeline.
6. Any deviations from the agreed design, schedule, or scope must receive prior written approval from RTI.
7. Payment will be linked to deliverable milestones, subject to client approval of reports and satisfactory completion of works.
8. The Service Provider shall provide a minimum 12-month warranty on the installed irrigation system components, covering defects in materials or workmanship (see SUPPLIER WARRANTY REQUIREMENTS for more details)
9. The Service Provider shall be fully responsible for the safety of its staff and subcontractors while working on-site, and ensure compliance with local labor, environmental, and safety laws.
10. Bidders/Offerors shall provide spare parts and service options

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Pricing

Item #	Quantity to be Purchased	Description of Preferred Commodity or Services Specifications	Unit of Measure	Unit Fixed Price (Each)	Total Fixed Price (Each)	Lead Time Availability (Number of Days)
2	1	Cost for equipment (to be detailed in a Bill of Quantities (BOQ), including brand, model, and specifications)	Lumpsum			
3	1	Cost for testing, training, and post-installation support.	Lumpsum			
4	1	Cost for logistics, delivery, and any other associated costs	Lumpsum			
		Bidders/Offerors shall supply, deliver, and install all irrigation system components in accordance with the approved design. The final system will be				

		accompanied by a performance validation report				
		Bidders/Offerors shall submit a final handover report, including layout maps, photos, test results, and user feedback				
		Bidders/Offerors can conduct a site visit at their own cost to familiarize themselves with the site conditions				
Sub Total Value						
VAT 15%						
Total Value including 15%						

BID VALIDITY PERIOD

Expected Bid Validity Period by RTI	120 days from the date specified for the receipt of offers
Supplier Bid Validity Period	

SUPPLIER WARRANTY REQUIREMENTS

The service provider shall offer a comprehensive warranty covering all components, materials, and workmanship of the manual drip irrigation system for a period of 12 months from the date of final commissioning and handover. The warranty shall include:

- Defects and Malfunctions:** Prompt repair or replacement of any system components, including mainlines, sub-main lines, laterals, emitters, filters, valves, and connectors, found to be defective or malfunctioning under normal use.
- Leakage and Blockage:** Correction of any issues related to leaks, blockages, uneven water distribution, or pressure inconsistencies arising from faulty installation or defective components.
- Operational Support:** Remote or on-site support to troubleshoot and rectify operational issues during the warranty period at no additional cost.
- Maintenance Guidance:** Assistance with ensuring proper maintenance procedures are followed, including checking emitters, cleaning filters, and addressing minor operational faults.
- Warranty Exclusions:** The warranty shall not cover damages resulting from misuse, unauthorized modifications, neglect, natural disasters, or acts beyond the control of the service provider.

6. **Warranty Claim Procedure:** The service provider shall respond to warranty claims within 48 hours of notification and resolve issues within a reasonable timeframe to ensure minimal disruption to system operation.

Supplier's Response:

- ☐ Yes, we fully accept the warranty requirements as stated above.
- ☐ No, we do not fully accept the warranty requirements.

PAYMENT TERMS ACCEPTANCE

The vendor's willingness to accept RTI's standard payment terms (i.e., payment within 30 days after delivery and acceptance of goods/services and submission of a valid invoice) will be evaluated.

Supplier's Response:

- ☐ Yes, we accept RTI's standard payment terms and conditions.
- ☐ No, we do not accept RTI's standard payment terms and conditions.

By signing this attachment, the bidder confirms he has a complete understanding of the specifications and fully intends to deliver items that comply with the above listed specifications.

Signature:

Title:

Date:

Attachment “B” Instructions to Bidders/Sellers

1. **Procurement Narrative Description:** The Buyer (RTI) intends to purchase commodities and/or services identified in Attachment A. The Buyer intends to purchase the quantities (for commodities) and/or services (based on deliverables identified in a Statement of Work). The term of the Ordering Agreement shall be from Award Date to the Delivery date of the Offeror unless extended by mutual agreement of the parties. The Buyer intends to award to a single “approved” supplier based on conformance to the listed specifications, the ability to service this contract, and selling price. We reserve the right to award to more than one bidder. If an Ordering Agreement is established as a result of this RFQ/RFP, supplier understands that quantities indicated in the specifications (Attachment A) are an estimate only and RTI does not guarantee the purchase quantity of any item listed.
2. **Procuring Activity:** This procurement will be made by **Research Triangle Institute (RTI International)**, located at

RTI-Feed the Future Ethiopia Transforming Agriculture
Bole Flamingo, Minaye Building 11th Floor,
Kirkos Sub City, Woreda 09, House Number 501/004/498
Addis Ababa

who has a purchase requirement in support of a project funded by

Department of State (DOS)/Ethiopia

RTI shall award the initial quantities and/or services and any option quantities (if exercised by RTI) to Seller by a properly executed Purchase Order as set forth within the terms of this properly executed agreement.

3. **Proposal Requirements.** All Sellers will submit a quote/proposal which contains offers for all items and options included in this RFQ/RFP. All information presented in the Sellers quote/proposal will be considered during RTI’s evaluation. Failure to submit the information required in this RFQ/RFP may result in Seller’s offer being deemed non-responsive. Sellers are responsible for submitting offers, and any modifications, revisions, or withdrawals, so as to reach RTI’s office designated in the RFQ/RFP by the time and date specified in the RFQ/RFP. Any offer, modification, revision, or withdrawal of an offer received at the RTI office designated in the RFQ/RFP after the exact time specified for receipt of offers is “late” and may not be considered at the discretion of the RTI Procurement Officer. The Seller’s proposal shall include the following:
 - (a) The solicitation number
 - (b) The date and time submitted

- (c) The name, address, and telephone number of the seller (bidder) and authorized signature of same
- (d) Validity period of Quote
- (e) A technical description of the items being offered in sufficient detail to evaluate compliance with the requirements in the solicitation. This may include product literature, or other documents, if necessary
- (f) Bidders/Offerors shall submit a Bill of Quantities (BoQ) and verify compatibility of existing equipment with the proposed system
- (g) If RTI informs Seller that the Commodity is intended for export and the Commodity is not classified for export under Export Classification Control Number (ECCN) "EAR99" of the U.S. Department of Commerce Export Administration Regulations (EAR), then Seller must provide RTI the correct ECCN and the name of Seller's representative responsible for Trade Compliance who can confirm the export classification
- (h) Lead Time Availability of the Commodity/Service
- (i) Terms of warranty describing what and how the warranties will be serviced
- (j) Special pricing instructions: Price and any discount terms or special requirements or terms (special note: pricing must include guaranteed firm fixed prices for items requested)
- (k) Payment address or instructions (if different from mailing address)
- (l) Acknowledgment of solicitation amendments (if any)
- (m) **Past Performance**

Seller can demonstrate his/her capability and resources to provide the items/services requested in this solicitation in a timely and responsive manner, through submission of a document no more than 2 pages outlining the following.

- Experience in similar irrigation projects
- Track record in meeting delivery schedules and quality standards
- References or documented evidence of previous successful implementations (including points of contact with telephone numbers, and other relevant information)

(n) Special Note: The Seller, by his response to this RFQ/RFP and accompanying signatures, confirms that the terms and conditions associated with this RFQ/RFP document have been agreed to and all of its attachments have been carefully read and understood and all related questions

answered

(0) **Bidders/Offerors can conduct a site visit at their own cost to familiarize themselves with the site conditions.**

4. **Forms:** Sellers (potential bidders or suppliers) must record their pricing utilizing the format found on Attachment “A”. Sellers must sign the single hardcopy submitted and send to address listed on the cover page of this RFQ/RFP.

5. **Questions Concerning the Procurement.** All questions in regards to this RFQ/RFP to be directed to

Feed The Future Ethiopia Transforming Agriculture Procurement team

at this email address:

InkindProcurement.ETA@transforming-agriculture.org

The cut-off date for questions is.

September 12, 2025, at 16:00 East Africa Time (EAT)

6. **Notifications and Deliveries:** Time is of the essence for this procurement. Seller shall deliver the items or services no later than the dates set forth in the contract that will be agreed by both parties as a result of this RFQ/RFP. The Seller shall immediately contact the Buyer’s Procurement Officer if the specifications, availability, or the delivery schedule(s) changes. Exceptional delays will result in financial penalties being imposed of Seller.
7. **Documentation:** The following documents will be required for payment for each item:
- (a) A detailed invoice listing Purchase Order Number, Bank information with wiring instructions (when applicable)
 - (b) Packing List
 - (c) All relevant product/service documentation (manuals, warranty doc, certificate of analysis, etc.)
8. **Payment Terms:** Refer to RTI purchase order terms and conditions found in https://www.rti.org/sites/default/files/rti-po-terms_english_version_-_v1.18.pdf, http://www.rti.org/files/PO_FAR_Clauses.pdf, or http://www.rti.org/files/PO_FAR_Clauses_Commercial_Items.pdf. Payment can be made via wire transfer or other acceptable form. Sellers may propose alternative payment terms and they will be considered in the evaluation process.
9. **Alternative Proposals:** Sellers are permitted to offer “alternatives” should they not be able to meet the listed requirements. Any alternative proposals shall still satisfy the minimum requirements set forth in Attachment A Specifications.
10. **Inspection Process:** Each item shall be inspected prior to final acceptance of the item. All significant discrepancies, shortages, and/or faults must be satisfactorily corrected and satisfactorily documented prior to delivery and release of payment.
11. **Evaluation and Award Process:** The RTI Procurement Officer will award an agreement contract

resulting from this solicitation to the responsible Seller (bidder) whose offer conforms to the RFQ/RFP will be most advantageous to RTI, price and other factors considered. The award will be made to the Seller representing the **best value** to the project and to RTI. For the purpose of this RFQ/RFP, price, delivery, technical and past performance are of equal importance for the purposes of evaluating and selecting the “best value” awardee. RTI intends to evaluate offers and award an Agreement without discussions with Sellers. Therefore, the Seller’s initial offer should contain the Seller’s best terms from a price and technical standpoint. However, RTI reserves the right to conduct discussions if later determined by the RTI Procurement Officer to be necessary.

The evaluation factors will be comprised of the following criteria:

- (a) **PRICE**. Lowest evaluated ceiling price (inclusive of option quantities).
 - The lowest evaluated ceiling price, including any optional quantities.
 - Consider total cost for design, equipment, installation, testing, training, and post-installation support.
 - Include logistics, delivery, and any other associated costs.
- (b) **DELIVERY**. Seller provides the most advantageous delivery schedule.
 - Consider timelines for:
 - Equipment sourcing and transport
 - Installation and commissioning
 - Training and post-installation support
 - Preference for suppliers who can meet or shorten the 11-week project duration without compromising quality
- (c) **TECHNICAL**. Items/Services shall satisfy or exceed the specifications described in RFQ/RFP Attachment A.
 - Key considerations include:
 - System design tailored to site-specific requirements (slope, water pressure, soil, farmland area)
 - Quality and durability of irrigation equipment
 - Correct installation, testing, and commissioning procedures
 - Training materials and O&M manuals in local language(s)
 - Compatibility with existing infrastructure
 - Provision of locally available spare parts and service options to ensure sustainability
- (d) **PAST PERFORMANCE** - Seller can demonstrate his/her capability and resources to provide the items/services requested in this solicitation in a timely and responsive manner.
 - Experience in similar irrigation projects
 - Track record in meeting delivery schedules and quality standards
 - References or documented evidence of previous successful implementations (including points of contact with telephone numbers, and other relevant information)

OTHER EVALUATION CRITERIA.

- Warranty—Supplier’s acceptance of the requirements (Detailed in the warranty section under “Attachment A”)

- Payment Terms—Supplier's acceptance of RTI's terms and conditions for payment

12. **Award Notice.** A written notice of award or acceptance of an offer, mailed or otherwise furnished to the successful supplier within the time acceptance specified in the offer, shall result in a binding contract without further action by either party.
13. **Validity of Offer.** This RFP in no way obligates RTI to make an award, nor does it commit RTI to pay any costs incurred by the Seller in the preparation and submission of a proposal or amendments to a proposal. Your proposal shall be considered valid for 60 days after submission.
14. **Representations and Certifications.** Winning suppliers under a US Federal Contract are required to complete and sign as part of your offer RTI Representations and Certifications for values over \$10,000.
15. **Certification.** The offeror, by signing its offer, hereby certifies to the best of its knowledge and belief that no Federal appropriated funds have been paid or will be paid to any person for influencing or attempting to influence an officer or employee of any agency, a Member of Congress, an officer or employee of Congress, or an employee of a Member of Congress on its behalf in connection with the awarding of this contract.
16. **Anti- Kick Back Act of 1986.** Anti-Kickback Act of 1986 as referenced in FAR 52.203-7 is hereby incorporated into this Request for Proposal as a condition of acceptance. If you have reasonable grounds to believe that a violation, as described in Paragraph (b) of FAR 52.203-7 may have occurred, you should report this suspected violation to the RTI's Ethics Hotline at 1-877-212-7220 or by sending an e-mail to ethics@rti.org. You may report a suspected violation anonymously.
17. **The John S. McCain National Defense Authorization Act for fiscal year 2019 - section 889.** RTI cannot use any equipment or services from specific companies, or their subsidiaries and affiliates, including Huawei Technologies Company, ZTE Corporation, Hytera Communications Corporation, Hangzhou Hikvision Digital Technology Company, and Dahua Technology Company ("Covered Technology"). In response to this request for proposal, please do not provide a quote which includes any Covered Technology. Any quote which includes Covered Technology will be deemed non-responsive. Additionally, if the United States Government is the source of funds for this RFP, the resulting Supplier shall not provide any equipment, system, or service that uses Covered Technology as a substantial or essential component.

Acceptance:

Seller agrees, as evidenced by signature below, that the seller's completed and signed solicitation, seller's proposal including all required submissions and the negotiated terms contained herein, constitute the entire agreement for the services described herein.



3040 Cornwallis Road ■ PO Box 12194 ■ Research Triangle Park, NC 27709-2194 ■ USA
Telephone 919.541.6000 ■ Fax 919.541.5985 ■ www.rti.org


By: *(Seller Company Name)*

Signature: _____

Title:

Date:

Attachment “C” Vendor Information Form

	 KEY QUESTIONS	VENDOR INFORMATION FORM <i>Please write your answers clearly and use additional paper if needed to provide <u>as much detail as possible</u> in your answers to these questions. More details and facts are always better than fewer details. We will attempt to verify the important facts you have listed below using our local personnel in and around the country.</i>
1	Contact name of reference	
2	Title or position of contact	
3	Phone Number(s) for contact	
4	E-mail address for contact	
5	Company name	
6	Company address	
7	Primary business of company	
8	List cities where company has offices and/or workshops.	
9	List manufacturers or brands your company currently represents.	
10	Define <u>type</u> of representation of each brand (agent, dealer, authorized mfg rep, etc.) and whether or not it is exclusive.	
11	Is company locally owned or foreign owned?	
12	Describe previous experience in working with Department of State (DOS)-funded projects.	
13	If your company has been awarded previous Department of State (DOS)-funded work, please describe.	
14	Please describe your recent experience (last 12 months) with doing work, providing equipment or services as defined in our specifications or statement of work.	
15	List the names and current contact information for the project managers working <u>for your customers</u> in your last two projects for us to contact and ask about your performance.	
16	If your company is based outside of the country, please describe how you would effectively service and support a future contract.	

17	Confirm that you agree to comply with RTI's standard terms and conditions.	
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Attachment “D” Scope of Work

Feed the Future Ethiopia Transforming Agriculture

Scope of Work

Design, Development, Installation, Testing, Commissioning, Training, and follow Up Support for a Manual Drip Irrigation System at Manrac Beraha Cooperative, Shebelley Woreda, Somali Region.

Scope of Work (SOW)

Assignment / project Title:	Design, Development, Installation, Testing, Commissioning, Training, and Follow-up for a Pressurized Manual Drip Irrigation System at Manrac Beraha Cooperative, Shebelley Woreda, Somali Region.
Client:	Feed the Future Ethiopian Transforming Agriculture
Client point of contact:	Tatek Hossiso Procurement Manager Transforming Agriculture T: +251 973 437676 E: thosisso@transforming-agriculture.org
Project location:	Shebelley woreda, Somali Region, Ethiopia
Project point of contact	Ato Muhedi (Farm Manager), +251 92 164 3131
Period of performance:	Approximately eleven (11) weeks

1. Background

Transforming Agriculture Activity is implemented under US state department that aims to increase access to healthy diets by improving the competitiveness, and resilience of Ethiopia's food and agriculture system. The project has three intermediate results:

- Increased availability of safe, diverse, nutritious foods
- Increased incomes in the food and agriculture sectors
- Increased convenience and desirability of safe, diverse, nutritious foods

Together, these intermediate results will improve the competitiveness, resilience, and sustainability of Ethiopia's food and agriculture system.

Transforming Agriculture primarily implements its interventions by engaging private sector partners. One of the partners is Manrac Beraha Cooperative (hereafter referred to as Manrac), which is currently involved in orange production using a ring and furrow-based irrigation system in Shebelley woreda, Somali region. To improve water efficiency, crop productivity and quality, Manrac aims to upgrade its existing irrigation system to a manual drip irrigation system and expand its orange farmland.

Ethiopia Transforming Agriculture is supporting Manrac in this transition by facilitating the shift from traditional ring and furrow irrigation to a more efficient manual drip irrigation system. The intervention will cover both the existing orange farmland and the planned expansion areas, located in Shebelley Woreda, Somali Region. This project will support the full implementation of the new irrigation system, from design and material delivery through installation, operational readiness, and post commissioning support ultimately enabling improved orange production and sustainable water use across the expanded farmland. The estimated total land area for orange cultivation is approximately 35 hectares. This initiative aims to ensure long-term functionality, durability, and ease of use and maintenance of the irrigation system, ultimately contributing to improved yields and more sustainable resource management.

This scope of work outlines the full scope of services required to deliver a fully operational manual drip irrigation system, covering all phases from system design, to installation, commissioning, final handover, training, and post commissioning follow up support

2. Objective

To procure the services of a qualified and experienced service provider to carry out the complete design, supply, land clearing follow up support, installation, testing, commissioning, training, and post-installation support for a manual drip irrigation system across Manrac's existing and expansion farmland.

3. Scope of Work

The selected service provider will be responsible for completing the following components:

3.1 Design and Development

The service provider shall be responsible for developing a complete manual drip irrigation system design tailored to the specific site conditions.

This includes:

- Developing a complete manual drip irrigation system design tailored to the unique requirements of the site.
- Preparing a detailed layout and comprehensive technical specifications based on on-site assessments, including confirmation on exact area (hectares) to be developed under drip irrigation for orange.
- Incorporating all relevant site-specific factors - such as slope, water pressure, soil characteristics, and access constraints - into the design from the outset.
- Submitting a finalized, site-specific design and implementation plan for review and approval.
- Based on the proposed design, develop bill of quantities and submit for Transforming Agriculture review and approval.

3.2 Sourcing, Delivery, and Logistics Management for Irrigation Equipment

The service provider shall be responsible for the transport and delivery of all equipment and materials required for the implementation of the manual drip irrigation system. This includes:

- Conduct an inventory of existing equipment prior to delivery, identify any missing or inadequate items, and ensure all required equipment is ordered accordingly.
- Supply and transport all system components to the designated project site.
- Ensure all equipment is delivered in good condition, within the agreed timeframe.
- Coordinate logistics to minimize delays and prevent damage or loss during transport.
- Notify Manrac and RTI upon delivery and provide a delivery checklist or inventory for verification. Additionally, if the supplier places the order, they must verify the order details directly with RTI and Manrac prior to fulfillment.

3.3 Provide Monitoring Support During land preparation

Land preparation will be the responsibility of Manrac. However, the service provider shall closely monitor the process to ensure it aligns with the technical requirements of the drip irrigation system design. Specifically, the service provider will:

- Provide guidance on field clearance, leveling, and marking to support proper system layout.
- Advise on trench dimensions and locations for mainlines or control valves.
- Verify the readiness of inlet points and pathways for water delivery structures prior to installation.

3.4 Pre-Installation Planning and Material Listing

- Prior to installation, the service provider shall prepare and submit a comprehensive list of all required equipment, fittings, and materials based on the system design. This list will ensure that all necessary components are available on-site before installation begins.

3.5 Installation

- Install the drip irrigation system across the existing and expansion plots based on the approved design.
- Components include:
 - Mainlines and sub-main lines
 - Laterals and emitters
 - Filters, valves, and connectors
- Ensure all joints are sealed properly and system layout allows for equal water distribution.
- Anchor and stabilize pipes as needed.

3.6 System Compatibility Verification

Before flushing and testing the system, the service provider shall verify the compatibility of existing infrastructure (pumps, reservoir) with all newly procured components. This includes ensuring proper fit, connection integrity, and functionality between old and new system elements to prevent operational issues during testing and commissioning.

3.7 Testing and Commissioning

- Flush the system and check for leaks, pressure issues, or blockages.
- Conduct uniformity tests to confirm even water distribution across plots.
- Document the test results, adjustments made, and ensure system is fully functional.
- Submit a commissioning report for review and approval.

3.8 Training on Operation and Maintenance (O&M)

- Deliver practical training sessions to Manrac members and employed technical staff on:
 - Daily system operation
 - Maintenance practices (cleaning filters, checking emitters, repairing minor leaks)
 - Troubleshooting basic faults, etc.
- Provide visual operation and maintenance (O&M) guides or manuals in local language. These are easy-to-understand instructional materials that use images, diagrams, or illustrations- along with text in the local language (e.g., Somali, Afan Oromo, Amharic) - to explain how to:
 - Operate the system or equipment correctly
 - Maintain it regularly (e.g., cleaning filters, checking connections)
 - Troubleshoot common issues

3.9 Ongoing Support After Installation

- The service provider shall provide follow-up support for four weeks after commissioning to monitor system performance and promptly address any operational issues that may arise during this period.

4. Deliverables

The service provider shall submit the following:

- Complete manual drip irrigation system design developed by the service provider from the ground up, including all site-specific considerations, and validated and approved by RTI and Manrac.
- Assess existing equipment prior to delivery to ensure compatibility with newly purchased items.
- All required equipment delivered to the site and verified against the bill of quantities/ inventory list.
- Monitoring and follow-up support provided during farm land preparation as determined during the study and design phase, and full installation of the irrigation system according to specifications.
- Functional testing and commissioning report confirming system performance and compliance.
- Final handover report including site photos, detailed layout map, system performance summary, and Manrac's feedback.
- Completion of operations and maintenance (O&M) training session, with attendance sheet submitted.
- Report on ongoing Support After Installation, including:
 - Summary of follow-up visits or remote support provided
 - Issues identified and actions taken to resolve them
 - Feedback from system users (e.g., operators or cooperative members)
 - Confirmation that the system remained fully operational during the support period, but it should be validated by Manrac and optionally witnessed or verified by the Transforming Agriculture team.
 - Recommendations for ongoing maintenance or improvements, if applicable

5. Timeline

Total project duration will be approximately 11 (eleven) weeks.

Table 1 Project duration

Activity	Estimated Duration
Design and planning	1 week
Equipment transport	1 week
Land preparation monitoring and follow up support	1 week
System installation	2 weeks
Testing and commissioning	1 week
O&M training and reporting	1 week

Activity	Estimated Duration
Ongoing Support After Installation	4 weeks
Total	11 weeks

6. Roles and Responsibilities

Table 2 Roles and responsibilities

Entity	Responsibilities
Service Provider	Execute all technical, logistical, training, and Ongoing Support After Installation as per the scope of work
Manrac	Provide field access, land preparation, and coordinate local activities
Client (Feed the Future Ethiopian Transforming Agriculture)	Monitor implementation, validate quality, and approve deliverables

7. Technical Requirements

- All work must align with the system design and technical specification
- The system must be installed for long-term durability, ease of use, and low-maintenance operation
- System must be fully functional and ready for use at handover (Testing must confirm full functionality before commissioning).
- All training materials and O&M manuals must be clear, practical, and provided in the local language