



**BANASKANTHA DISTRICT CO-OP.  
MILK PRODUCERS' UNION LTD.**

BANAS DAIRY, PB NO 20, PALANPUR  
-385001, DIST: BANASKANTHA, GUJARAT,  
PHONE: 253881-85. FAX : 02742-252723

Invites Online Tender Bids from reputed eligible Bidders for the following works at our Banas Dairy Plant, Palanpur, Gujarat.

**TENDER NOTICE**

Date:14.03.2026

Open Tender RFQ Reference No: 9000038588/9000038586/9000038582/9000038580 Open Tender RFQ Document For Supply, Installation and Commissioning of Automatic TMR Plant 5 TPH & Automatic TMR Block Machine 5 TPH

Tenders are invited For Tender Document For Supply, Installation and Commissioning of Automatic TMR Plant 5 TPH & Automatic TMR Block Machine 5 TPH for Banas Dairy, Chilling Centre Dhanera (Gujarat) & Banas Dairy Chilling Centre Khimana (Gujarat). Eligibility criteria for this tender and procedure of the tender is available on our Banas Dairy Online Portal <https://evendor.banas-dairy.coop>. Banas Dairy Palanpur.

**Managing Director**



**BANASKANTHA DISTRICT CO-OPERATIVE MILK PRODUCERS' UNION LIMITED**

Palanpur 385001 India  
Phone: **02742-253881 TO 85**  
**REQUEST For Quotation - OC**

Tendor Type : Open Tender RFQ

(ISO Doc No:)

Collective No.:	900038588	Date: 03/12/2026	Quotation Deadline:	15.04.2026 03:00 PM				
Doc Type:	ZR01 - Manual RFQ Mat		Our Reference:					
POrg:	BP00 Central PORG-Banas		Created By	Banas Dairy				
PGroup:	B05Cap Goods Purchase		Our GSTN :	24AAAAB0575E1ZB				
<p>Title: Automatic TMR Block Making Machine</p> <p>Subject: Purchase Enquiry for Materials</p>								
Sr. No.	Material	HSNS/AC	Short Text	Qty	OUn	Delivery Date	Plant	Mat. Grp
10	4063335		Automatic TMR Block Making Machine	2	EA	11.04.2026	BL05	CP0000001
<p>The Pre-Bid Meeting for this tender is planned on 26th March-2026. Kindly provide all your query before this due date to balveersingh@banasdairy.coop, ashishdarji@banasdairy.coop, purbns@banasdairy.coop</p> <p>Automatic TMR Block Machine, Minimum 2.5 TPH, Bag size: 36 kg with supply, installation and commissioning: Note: Supplier can also quote for 5 TPH, bag size: 36 kg, Single machine. Suppliers must visit our existing TMR plant Danta before quoting so they clearly understand current conditions and requirements. Technical specifications in details are attached: Automatic TMR Block Making Machine.</p>								
20	4024933		TMR discharge conveyor	2	Set	11.04.2026	BL05	CP0000001
<p>TMR discharge conveyor as per TMR Block machine capacity 5 TPH</p>								
30	4024932		Intermediate Buffer Hopper	2	Set	11.04.2026	BL05	CP0000001
<p>Intermediate Buffer Hopper 3 ton if TMR Block machine capacity minimum 2.5 TPH, Qty: 02 or Intermediate Buffer Hopper 5 ton if TMR Block machine capacity 5 TPH, Qty: 01</p>								
40	4024936		Vacuuming & Impulse sealer with Conv.	2	Set	11.04.2026	BL05	CP0000001
<p>Vacuuming &amp; Impulse sealer with Conv. qty 2 if TMR Block machine capacity minimum 2.5 TPH, or Vacuuming &amp; Impulse sealer with Conv. qty 1 if TMR Block machine capacity minimum 5 TPH,</p>								
50	4024934		Check Weigher with Printer	2	Set	11.04.2026	BL05	CP0000001
<p>Check Weigher with Printer, qty 2 if TMR Block machine capacity minimum 2.5 TPH, or Check Weigher with Printer, qty 1 if TMR Block machine capacity 5 TPH,</p>								
60	4024937		Air Compressor with tank	1	Set	11.04.2026	BL05	CP0000001
<p>Air Compressor with tank</p>								
70	4024935		Control Panel & HMI_TMR Block M/C	2	Set	11.04.2026	BL05	CP0000001
<p>Control Panel &amp; HMI_TMR Block M/C, 2 set if TMR Block Machine, Minimum 2.5 TPH or Control Panel &amp; HMI_TMR Block M/C, 1 set if TMR Block Machine, 5 TPH</p> <p>Automatic TMR Block Machine, Minimum 2.5 TPH, Bag size: 36 kg with supply, installation and commissioning: Note: Supplier can also quote for 5 TPH, bag size: 36 kg, Single machine. Technical specifications in details are attached:</p>								

## **Technical specifications:**

Automatic TMR Block making hydraulic Press machine (2.5 TPH) with Installation & Commissioning: 2 set

### **Intermediate Buffer Hopper with Inbuilt Conveyor and anti-choking mechanism – 2 Set**

Buffer hopper shall have storage capacity of 3 ton (TMR Feed) made up with 6 mm MS plate painted with EPOXY Paint with supporting structure base of MS Square of min. 100 mm x 100 mm x 6 mm thickness.

The Buffer hopper shall have provision of two stirrers, screw Conveyor, pneumatic gates, sensors and VFD.

- Motor: Crompton / Siemens / ABB
- Helical Gearbox: Elicon / PBL / Bonfiglioli
- Condition: Material should not choke, feed must fall gradually.
- Screw conveyor shall be used to discharge the material gradually.

The buffer hopper shall be provided with discharge gate to integrate with discharge conveyor, enabling feed supply to TMR block-making hydraulic press machine's weighing hopper.

There shall be provision for variable pneumatics gates at material discharge end. Buffer hopper's pneumatic gates shall be interlocked with discharge conveyor for uniform material flow.

There shall be provision for continuous material flow at a constant rate.

The buffer hopper shall be provided with a high-level sensor. The high-level sensor shall be interlocked with the infeed conveyor, TMR mixer and its gate.

## **Conveyor from Intermediate Buffer Hopper to TMR Block making Machine (2):**

There shall be TMR feed conveyor which is interlocked with intermediate buffer hopper to transfer TMR feed from hopper to TMR packing / block making hydraulic press machine.

- Type: Belt conveyor
- Rubber rough-tough belt with material handling guide
- 20 mm stoppers at every 150 mm interval
- Cleaning facility at bottom and middle
- Powder coating: 80–100 microns DFT (epoxy-polyester), industrial standard
- Motor: Crompton / Siemens / ABB
- Helical Gearbox: Elicon / PBL / Bonfiglioli

## **Weighing Hopper: 2 set**

There shall be weighing hopper of 50 kg capacity (TMR Feed) which shall be mounted on TMR packing/ block making hydraulic press machine.

- The hopper shall be mounted on 4 cylindrical load cells, each with a capacity of 100 kg.
- Hopper capacity: 50 kg (For TMR Feed)
- TMR weighing tolerance:  $\pm 100$  g
- Load Cell Make: Mettler Toledo / Minebea Intec
- There shall be provision of pneumatic gates at weighing hopper.
- There shall be provision of anti-choking mechanism at weighing hopper outlet.

## **Automatic TMR Block making hydraulic Press machine: 02 set**

- Machine rotation shall be driven by Servo Motor.
- Hydraulic press capacity: minimum 7 kg/cm<sup>2</sup> pressure
- The rotation drum shall be equipped with a variable bag-holding mechanism to securely hold the bags during hydraulic pressing, thereby preventing tearing or damage to the bags.
- There shall be provision of automatic bag exit system from rotation drum to sealing conveyor.

- **Block/Bag size: 36 Kg**
- **Minimum O/P: 2.5 TPH**
- Mouth opening mechanism for packing bag
- Impulse Sealing machine with conveyor.
- Double line Impulse sealing (controlling with transformer, voltage regulator and stabilizer) with chiller mechanism
- Minimum sealing width: 5 mm
- Sealing capacity: minimum 2.5 TPH
- Vacuum packing system with vacuum pressure –700 mmHg
- Screw tank mounted Air Compressor with air receiver tank, 10 HP

### **Check Weigher with Printer (2)-**

- Finished TMR bags shall first be weight cross-checked at conveyor before Vacuuming & hot sealing.
- If weight is within the range then Automatic printer shall generate a label containing:
  - Barcode
  - Company name
  - Batch number
  - Product name
  - Weight
  - Date & Time
  - Etc.

### **If final bag weight:**

- Underweight / overweight → automatic reject

Note: Hand held inkjet printer for printing batch code to be provided.

## **Finished bags Carrying hydraulic Trolley-(2):**

- Shall have capacity of 2 ton to handling finish product manually.

## **Piping, Supports and Structural Platform**

Product piping material (MOC: SS/ GI) required for system working along with suitable GI Platform with safety railing along with toe guard.

## **PLC, Ethernet HMI (Screen size-10”) & IPC:**

The TMR Block Making Hydraulic Press Machine shall be provided with a PLC-based control system integrated with an Ethernet-based HMI and an Personal Computer (PC).

The PLC system shall control, monitor, and interlock the complete operation of the TMR block-making, weighing verification, and impulse sealing process, including:

- Feed transfer from Intermediate Buffer Hopper to Weighing Hopper through the interconnecting conveyor
- Automatic start/stop of feed conveyor based on weighing hopper demand
- Accurate weighing and filling of TMR feed into the weighing hopper
- Weighing checker (check-weigher) in automatic operation to verify:
  - Individual bag weight against preset tolerance limits
  - Underweight and overweight conditions
- Bag filling, hydraulic pressing, vacuuming, and impulse sealing operations
- Conveyor movements and material flow interlocks.
- Safety interlocks, alarms, and emergency stop functions.

## **HMI & PC Data Management**

- The Ethernet-based HMI shall be used for:
  - Machine operation and monitoring
  - Setting target bag weight and tolerance limits
  - Display of:

- Real-time bag weight
  - Bag counter (accepted / rejected)
  - Batch number
  - Alarms and machine status
- The Industrial PC shall be provided for:
  - Recording of:
    - Total bags produced
    - Accepted and rejected bag count (as per weighing checker)
    - Individual bag weight / total batch weight
    - Batch number
    - Date and time of Bag
  - Data export in standard formats (Excel / CSV) via USB or Ethernet

**Electrical Installation Material:**

Power cables and control cables (PVC insulated)	Yes
Earthing, Earthing cables, Copper strips and GI Strips, Ethernet cables & Accessories	Yes
Cable Glands & Adaptors, cable lugs, cable ties	Yes
Isolator switches & mountings	Yes
Cable trays – rod type, GI	Yes
Supports for cable trays, GI	Yes
All accessories to complete installation work	Yes

**Technical Commercial Price Format (To Be Filled by Vendor):**

<b>Sr. No.</b>	<b>Equipment Name</b>	<b>Specification</b>	<b>Make/MOC</b>	<b>Qty</b>	<b>Price (Rs.)/Unit</b>	<b>Total Price (Rs)</b>
1	Buffer Hopper,			2 set		
2	TMR Feed conveyor			2 set		
3	Weighing Hopper, 50 kg			2 set		
4	TMR Block making hydraulic press machine			2 set		
5	Vacuuming & Impulse sealing mechanism			2 set		
6	Air Compressor			1 no.		
7	Check Weigher with Printer			2 set		
<b>Total Price (Rs.)</b>						

### **Technical Deviation Clause:**

The bidder shall strictly comply with the technical specifications mentioned in the tender document.

Any deviation from the specified technical requirements, design parameters, capacity, material of construction (MOC), performance criteria, or scope of supply shall be clearly indicated equipment-wise in the prescribed format.

Deviations not explicitly mentioned shall be treated as NIL, and the supplied equipment shall be deemed to be fully compliant with the tender specifications.

Banas Dairy reserves the right to accept or reject any deviation without assigning any reason.

### **Equipment's Make:**

PLC (Transistor output)/ HMI: Schneider / Allen Bradley/ Delta / Mitsubishi / Omron

VFD: Danfoss / Delta / Mitsubishi / Schneider

Bearing: SKF / NTN

Pneumatic Valve: Janatics / SMC / Festo

Hydraulic valves shall be of Hydrank / Yuken / Any std. make

Sensor: Omron / Baumer/ IFM/ Autonics/ Honeywell

Cable/ Flexible Cable: Adcab/ Polycab/ Havells/ KEI/ RR Kabel / LAPP

Motor (IE3): Crompton / Siemens / ABB

Helical Gearbox: Elicon / PBL / Bonfiglioli / any std. make

MCB/Relay (if possible use SSR)/Contactor: L&T/ Schneider / ABB / Siemens

Air Compressor: Atlas Copco/ Ingersoll Rand (I.R) / Hitachi / Elgi

## **Supplier Scope:**

- Plant layout, design, manufacturing, supply, testing, installation and commissioning of TMR Block Machine Unit.
- Ensure proper integration of the TMR plant unit with the TMR packing unit to achieve a consistent production capacity of 5 tons per hour.
- All critical and common spare parts corresponding to the installed equipment (such as motors, bearings, sensors, gearboxes, VFDs, etc.) shall be supplied.
- One Spare Motor of all size should be in Scope of Supply apart from the installed one.
- Tool kits for Operation and Maintenance of the Plant should be in the Scope of Supply of the System Equipment.
- The supplier shall provide a Personal Computer for the complete integration with the PLC/HMI.
- Free replacement/repair of any defective part(s) and services during the warranty period of one year from the date of commissioning.
- Provide 30 days of operational and maintenance training to Banas Dairy personnel.
- Supplier shall provide a performance trial run of 30 days after commissioning.
- Submit all relevant documentation, including Operation & Maintenance manuals, wiring diagrams, and test certificates.
- Ensure compliance with all safety standards during installation and operation.
- Supplier shall provide GA drawings, including equipment layout, drainage line routing, emergency exits, and fire-safety provisions, in compliance with applicable safety and statutory norms.
- The supplier shall submit equipment-wise connected load (kW), running load (kW) for the complete TMR plant and associated equipment.
- All motors shall be IE3 efficiency class minimum, suitable for continuous operation.

### **Banas Dairy Scope:**

- Civil foundation works for the new machine and its supporting structures.
- Provision of single-point power supply.

### **Tools & Trainings:**

The successful running of the equipment should be provided by the supplying firm for minimum of 30 Days. Original catalogue and specification sheet should be submitted along with the tender application.

Operations and Training Manuals should be supplied with the supply equipments.

The Standard equipment along with accessories should be guaranteed for period of one year. A comprehensive after sales services should be provided by the supplier, during and after the guarantee/warrantee period of the equipment.