

KANNUR UNIVERSITY
THAVAKKARA, CIVIL STATION P.O.,
KANNUR, KERALA - 670002

ANRF- II / PMU D - Tel: 04972715243

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NOTICE INVITING E-TENDER

The Registrar, Kannur University invites e-tender(s) in **Two Bid System (Two cover)** for the Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)** at the **Department of Chemistry**, Swami Ananda Theertha Campus, Payyannur, Kannur (ANRF - PAIR Scheme), from **original equipment manufacturers (OEMs) or authorized distributors/dealers** as per the technical specifications and schedule given below. The rate quoted should be inclusive of all taxes, installation charges and other charges. **The Registrar, Kannur University reserves the right to accept or reject the tenders without assigning any reason thereof.** The list of equipment/accessories proposed to be purchased, including its quantity and specifications are furnished in the schedule of items given below. Since this is an e-tender, only those bidders who have enrolled in the <http://etenders.kerala.gov.in> portal with their own Digital Signature Certificate (DSC) can participate in the tender. E-Tender document and other details can be obtained from the above e-portal.

TENDER SCHEDULE

| | |
|--|---|
| E-tender I D | 2026_KnrU_830857 |
| Description of Work | Supply, Installation, Testing and Commissioning of Inductively Coupled Plasma Mass Spectrometry (ICP-MS) |
| Pre-bid meeting - Date, Time and Place | 09.02.2026, 3.00 PM Kannur University Headquarters Thavakkara, Civil Station PO, Kannur, Kerala - 670002 |
| Start date and time for online submission of bids | 12.02.2026, 11.00 AM |
| Last date and time for online submission of bids | 20.02.2026, 11.00 AM |
| Date and time of bid opening | 21.02.2026, 3.00 PM |
| Tender fee (Excluding GST) | ₹17,700 |
| Earnest Money Deposit (EMD) | ₹1,17,489 |
| Performance Security | 5 % of Value of Contract |
| All the MSMEs with Udyog Aadhar Registration or any other body specified by the Ministry of Micro, Small and Medium Enterprises working within the state of Kerala will be exempted from the payment of Tender Fee and EMD. | |
| Place of supply and installation | Department of Chemistry, Swami Ananda theertha Campus, Payyannur, Kannur, Kerala - 670327 |

For further details, logon to <http://etenders.kerala.gov.in>



SPECIFICATION OF THE EQUIPMENT

| Sl No. | Name of the equipment | Required quantity |
|--------|---|-------------------|
| 1 | Inductively Coupled Plasma Mass Spectrometry (ICP-MS) with Ion Chromatograph | 1 |

| | |
|--------------------------------------|--|
| 1. Sample Introduction system | <ul style="list-style-type: none"> • Sample Introduction Kit including Peltier Cooled Spray Chamber (Temp Range -10 to 20 Deg C), PFA/Quartz Nebulizer, Ni Sample and Skimmer cones. • The quoted ICP-MS must have the capability to handle TDS >25% with additional MFC dedicated for argon gas dilution |
| 2. Ion Source and RF plasma: | <ul style="list-style-type: none"> • Computer controlled 27 MHz RF generator operating from 400 to 1600 watts for automatic control of torch ignition, shutdown, and system warm up. • The Plasma torch should have provision for software-controlled alignment for horizontal position, vertical position and sampling depth. |
| 3. Ion Extraction Interface: | <ul style="list-style-type: none"> • Standard large orifice Ni sampling cone with 1.1 mm orifice and skimming cones with 0.5 mm orifice. |
| 4. Ion Focusing System: | <ul style="list-style-type: none"> • The ion lens system must have 90 Deg deflection mechanisms for removing all neutrals from the Ion path. • The Ion path must be maintenance free. |
| 5. Cell Technology | <ul style="list-style-type: none"> • ICP MS shall incorporate a Cell offering operation: Standard Mode, Collision Cell (He) Mode with KED with Mass cut off for lower masses. • Cell must be Non-consumable with zero maintenance. |
| 6. Gas control | <ul style="list-style-type: none"> • System should have dedicated MFC devices to control plasma, auxiliary, nebulizer, reaction gas and collision gas. |
| 7. Quadrupole Assembly | <ul style="list-style-type: none"> • Mass calibration assessed and automatically updated. • The Mass range should be from 2-290 u or better • Scan speed: >3700 u/sec or better • Mass stability: ≤ 0.025 amu per day or more. |
| 8. Ion Detector Assembly: | <ul style="list-style-type: none"> • The ion detector is a simultaneous dual mode discrete dynode electron multiplier, 11 order or more magnitude of dynamic range • The dual-mode detector assembly must come standard with the system. |
| | <ul style="list-style-type: none"> • Turbo pump should be differential pumping. • In the event of power failure, either high vacuum is maintained or the entire |



| | |
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| 9. Vacuum System: | vacuum system is to be automatically back-filled by inert gas to preserve the cleanliness of the system. |
| 10. Performance Specifications | <p>Sensitivity specifications will be considered (Guaranteed/factory specifications will be considered. Not the Typical performance.)</p> <p>Sensitivity(MCPS/PPM OR KCPS/PPB):</p> <ul style="list-style-type: none"> ◦ $\text{Li} \geq 80.0 \times 10^6$ cps/ppm ◦ $\text{Co} \geq 290.0 \times 10^6$ cps/ppm ◦ $\text{In or Y} \geq 600.0 \times 10^6$ cps/ppm ◦ $\text{U or TI} \geq 850.0 \times 10^6$ cps/ppm or $\text{Bi} > 600.0 \times 10^6$ cps/ppm. <ul style="list-style-type: none"> • Oxide ratio (%) $\text{CeO/Ce} < 2$ or better • Ba^{++} or Ce^{++} / Ba or Ce < 3 or better • Background mass 4.5/9/220: No gas < 0.5 cps • Short Term Stability $< 2\%$ RSD or better • Long Term Stability $< 3\%$ RSD or better |
| 11. System Controller and Operating System: | <ul style="list-style-type: none"> • Suitable Data Station with all Software controls & future upgrade controls with Instrument software. • Software should provide comprehensive functionality for analysis through fully automated process with autotuning. • The software should have data handling and data management, Data security and access control with 21 CFR part 11 environment supports, compliance management and customizable reporting etc. • Customizability to meet QA/QC functionality needs. • Automated QA/QC checks • Minimum 2 offline user licences |
| 12. Essential Supplies | <ul style="list-style-type: none"> • NIST Certified Multi element (at least 23 elements) aqueous calibration standard (100 ml). • Fume hood with accessories. • 10 KV UPS with one hour Backup • Argon Gas Cylinder – 3 no's • Helium Gas Cylinder – 1 no. • Gas Regulator for all the gases mentioned above – 1 no. each |
| 13. Computer Configuration: | Branded HP/Dell Personal Computer should be supplied along with instrument from manufacturer. |
| 14. Auto sampler | Auto sampler of minimum sample vial holding capacity of 200 positions or more should be offered. It should be metal free and should have independent X-Y-Z movement. |
| 15. Training | Vendor has to give 5 days on site training after the installation |
| | <p>The system should contain additional consumables</p> <ul style="list-style-type: none"> • Concentric Nebulizer – 3 • Sample cones – 3 • Skimmer cones – 3 • Torch – 3 |



16. Essential consumables

- Spray chamber – 3
- Injector 2.5 mm – 3
- Sample uptake tubes – 3 sets (12pcs/pack)
- Sample drain tubes – 3 sets (12pcs/pack)
- Trace Metal Grade Acids (HCL & HNO₃) 500mL -2 Each
- Tune/Calibration Solutions 2 Each

SPECIFICATION FOR ION CHROMATOGRAPH

Ion Chromatograph Compatible with Mobile Phases like KOH, NaOH for Anions and MSA for Cations) with built in Conductivity Detector, Self Regenerating Suppressor for both for Anions and Cations, columns for analyzing Anions (like - Fluoride, Chlorite, Chloride, Chlorate, Bromide, Bromate, Nitrite, Nitrate, Phosphate, Sulfate etc.) Cations (Alkali-Alkali Earth Metals, Amines, Ammonium etc.) Organic Acids, Oxy Anions etc. with fully system control software.

1. **Pump:** Dual Piston Pump – should be made up of PEEK. Should be compatible with aqueous elements of pH 0-14 and reversed phase solvents.

Flow rate range : 0.00 – 5.0 mL/min

Maximum Operating Pressure : 0-35 MPa (0-5000 psi)

Pressure Ripple : <1.0%

Flow Precision and accuracy : <0.1%

Piston Seal: Dual pump head, wash can be continuous when connected to rinse solution supply.

2. **Rheodyne PEEK Injector with 6 port valve:** Motorized and operated by software control.

3. **Anion Analytical (4 x 250mm) & Guard Columns (4 x 50mm):**

Ion - Exchange column with guard column: for the separation of anions (Fluoride, Chlorite, Chloride, Chlorate, Bromide, Bromate, Nitrite, Nitrate, Phosphate, Sulfate), Organic Acids, Oxy Anions etc.

Cation Analytical (4 x 250mm) & Guard Columns (4 x 50mm):

Ion - Exchange column with guard column: for the separation of Cations (Alkali-Alkali Earth Metals), Amines, Ammonium etc.

4. **Suppressors unit:** Resin or membrane based self regenerating suppressor for **both Anions & Cations**.

5. Columns for Mercury and Arsenic speciation to be quoted along with all the interfaces to connect the IC with ICPMS

6. **Conductivity detector:**

Conductivity detector with temperature controller:

Digital and analog signal range : 0-15,000 μ S

Resolution : 0.00238 nS/cm

Temperature range: Ambient + 7°C, 30 to 55°C

Cell Electrodes : Passivated 316 stainless steel compatible with MSA.

Cell body : Chemically inert polymeric material

Cell volume : <1 μ L

Warranty required: Minimum Three Year warranty required for the whole system.



Terms and Conditions

1. The tender fee and EMD should be remitted online (SBI MOPS), as indicated on the e-tender website.

The 18% GST on the tender fee must be remitted directly to the GST department by the bidder.

| Sl. No | Equipment | Tender Fee in Rupees (₹) | | | EMD (₹) |
|--------|---|--------------------------|--------------|---------------|-----------------|
| | | Excluding GST | GST (18 %) | Total | |
| 1 | Inductively Coupled Plasma Mass Spectrometry (ICP-MS) with Ion Chromatograph | 17,700 | 3,186 | 20,886 | 1,17,489 |

2. All the MSMEs with Udyog Aadhar Registration or any other body specified by the Ministry of Micro, Small and Medium Enterprises **working within the state of Kerala will be exempted from the payment of Tender Fee and EMD.**

3. Custom Clearance of the consignment including all the stages of custom clearance will be under the purview of supplier.

4. The tender should be submitted in two cover system (Technical bid & Financial bid).

5. The successful bidder shall, before signing the agreement and within the period specified in the letter of acceptance of his tender, deposit a sum equivalent to **5 % of the value of the contract** by way of Demand Draft drawn in favour of the Finance Officer, Kannur University payable at SBI Kannur Branch or Kannur Branch of other Nationalized or Scheduled bank, **as performance security** for the satisfactory fulfilment of the contract.

6. The bidder should be registered company/firm. Certificate of incorporation/Company registration certificate/Memorandum and Articles of Associations/Valid GST registration certificate/Valid Income tax registration certificate/Valid Service tax registration certificate should be uploaded/submitted along with the tender.

7. The bidders shall keep their rate firm for a period of **120 days**.

8. Profile of Bidder as per Annexure 1 shall be provided.

9. The bidder should have the responsibility to attend the first level service if any complaint report. The bidder should provide minimum one preventive maintenance during warranty period. Relevant documents or undertaking signed by the personnel with address and contact person's name, phone no, and URL of complaint logging website to be submitted in case, if the bidder doesn't have their own service centre in Kerala and the bidder authorize another service centre/service engineers for attending service.

10. The earnest money deposit (EMD) of the unsuccessful bidders will be returned through ONLINE Transaction and the EMD of successful bidders will be discharged upon the bidder executing the contract and furnishing the security deposit that will have to be deposited for the satisfactory fulfilment of the contract.

11. Forfeiture of EMD:

- (i) If any bidder withdraws from his tender before the expiry of the bid validity period specified **or**
- (ii) in case after being successful bidder, he/firm fails to sign the contract, and to furnish the performance security.

12. The bid shall contain detailed technical specifications, Brochures and pamphlets of the item/items quoted.

13. All the claimed specifications (make, model, year of manufacture, warranty etc.) should be mentioned in the Brochure or Catalogue of the equipment.

14. All charges, taxes, duties and levies should be clearly indicated and the rate tendered should be inclusive of all taxes and other charges.

15. The installation, commissioning and the initial operation will be the responsibility of the supplier.

16. In case of under performance during the warranty period, the item should be replaced and the period of warranty will recommence from the date of replacement.



17. The payment will be made after completion of supply, installation and commissioning.

18. The final acceptance of the tenders rests entirely with the Kannur University who do not bind themselves to accept the lowest or any tender.

19. Communication of acceptance of the tender normally constitutes a concluded contract. Nevertheless, the successful bidder shall also execute an agreement for the due fulfilment of the contract within the period to be specified in the letter of acceptance. In cases where a successful bidder, after having made partial supplies fails to fulfil the contracts in full, all or any of the materials not supplied may at the discretion of the Registrar, be purchased by means of another tender/quotation or by negotiation or from the next higher bidder who had offered to supply already and the loss, if any, caused to the University shall thereby together with such sums as may be fixed by the University towards damages be recovered from the defaulting bidder.

20. The bidder shall undertake to supply materials according to the standard sample and /or specifications.

21. No representation for enhancement of rates once accepted will be considered.

22. The prices quoted should be inclusive of all taxes, duties, cess etc., which are or may become payable by the contractor under existing or future laws or rules of the country of origin/supply or delivery during the course of execution of the contract.

23. Special conditions, if any, of the bidders attached with the tenders will not be applicable to the contract unless they are expressly accepted in writing by the purchaser.

24. The bidder shall quote their rate in the standard BOQ provided, indicating the break up details.

25. The provisions of Kerala Stores Purchase Manual are applicable to this Tender and further proceedings.

26. The University reserves all rights to accept or reject any or all the tenders without assigning any reason whatsoever at its discretion.

27. The bids shall be opened online at Kannur University on the date mentioned in Invitation Bid. If the date fixed for opening happens to be a holiday/due to net failure/ due to technical issue, the tenders will be opened on the next working day, at the same time.

28. Prices shall be quoted in Indian currency only.

29. Bidders must not be blacklisted by any Government or Public Sector Undertaking (PSU).

30. The vendor must have completed minimum of **5 (Five) installations** of similar Systems in Indian Universities/ IITs/NITs/IISERs/ Other State/Central Govt Institutes/ Research Laboratories etc. within the **last 3 (Three) years** before the last date of submission of bid.

31. Spare/ accessory support for a minimum period of **10 (Ten) years** should be provided by the supplier.

32. If the date fixed for the pre-bid meeting happens to be a holiday or if it is postponed due to technical issues, the meeting will be convened on the next working day at the same time.

GST No. of Kannur university : 32AAAGK0152J1ZT

DOCUMENTS TO BE SCANNED AND UPLOADED

1. Bidder Profile (as per format mentioned in Annexure 1)
2. Bid Particulars (as per format mentioned in Annexure 2)
3. Scanned copy of valid registration certificate (GST) & PAN Card
4. Scanned copy of relevant Brochure of the equipment including make & model and copy of its certifications like ISO certification.
5. MSME Firms - Upload MSME certificate/ UDYAM registration certificates
6. Manufacturer Certificate/ Valid authorization certificate from OEM (in case of resellers)



7. Warranty Declaration/Details
8. Details of Service Centres in India
9. Non blacklisting declaration by the bidder
10. Details of **five** previous installations in India within last **3 years**.
11. Declaration regarding Spare/Accessory Support (10 years)
12. Other certificates/declarations if any.

Sd /-

Prof. (Dr.) Joby K Jose
Registrar



ANNEXURE 1
BIDDER PROFILE

| Sl.No. | Particulars | |
|----------------------------------|---|--|
| Details of bidder (Firm/Company) | | |
| 1 | Name | |
| 2 | address | |
| 3 | Telephone & Mobile Number | |
| 4 | Email & website | |
| Details of Authorized Person | | |
| 5 | Name | |
| 6 | Address | |
| 7 | Telephone & Email | |
| Information about the company | | |
| 8 | Status of Company (Public Ltd. / Pvt. Ltd) | |
| 9 | Details of Registration of Firm (Provide Ref.) | |
| 10 | Number of Professionals | |
| 11 | Location and address of offices (in India & overseas) | |
| 12 | Service Tax Registration Number | |
| 13 | Income Tax Registration Number(PAN) | |
| 14 | GST Registration Number | |

Signature of the Bidder / Seal



ANNEXURE 2

TECHNICAL BID (BID PARTICULARS)

1. Tender Number :-----
 2. Name of the Bidder :-----
 3. Full Address of the Bidder :-----
 4. Name of the actual signatory of the product(s) offered :-----
 5. Bidder's proposal number and date :-----
 6. Name & Address of the officer to whom all references shall be made regarding the Tender :-----
- Telephone :-----
- Mobile :-----
- E-mail :-----

Bidder Signature Name -----

Designation -----

Company -----

Date -----

OTHER DOCUMENTS - FORMAT

DECLARATION REGARDING NON-BLACKLISTING

Title of the Tender: Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)**
E-Tender ID.: 2026_KnrU_830857

I/We, M/s _____,
having registered office at _____,
hereby declare that **our firm has not been blacklisted, debarred, suspended, or banned** by the Government of Kerala, Government of India, any State Government, Central / State Public Sector Undertakings, Autonomous Bodies, Universities, Local Self-Government Institutions, or any other Government organization as on the date of submission of this tender.
I/We further declare that no such proceedings for blacklisting or debarment are pending against our firm as on the date of submission of the bid.



MANUFACTURER CERTIFICATE

(To be issued on Manufacturer's Letterhead)

This is to certify that we, **M/s** _____, having our registered office at _____, are the **manufacturer** of _____ **(name of item/equipment)**.

We hereby confirm that the above-mentioned item offered against:

- **Title of the Tender:** Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)**
- **E-Tender ID.:** 2026_KnrU_830857
- **Purchasing Authority:** _____

is **manufactured by us** and complies with the specifications, standards, and quality requirements mentioned in the tender document.

OEM AUTHORIZATION CERTIFICATE

(To be submitted on OEM Letter Head)

This is to certify that we, **M/s** _____, having our registered office at _____, are the **Original Equipment Manufacturer (OEM)** of _____ **(name of item/equipment)**.

We hereby authorize **M/s** _____, having their office at _____, to participate in the tender mentioned below on our behalf and to quote, supply, install, and provide warranty and after-sales service for our products.

Tender Details:

- **Title of the Tender:** Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)**
- **E-Tender ID.:** 2026_KnrU_830857

We further confirm that:

1. The products offered shall be **genuine OEM products** manufactured by us.
2. We shall extend **full warranty/guarantee and after-sales support**, including availability of spares, as per tender conditions.
3. We shall provide technical support and service assistance directly or through our authorized representative during the warranty and AMC period.
4. We undertake responsibility for product performance and compliance with technical specifications.
5. This authorization is valid for the above tender only.



SPARE AVAILABILITY DECLARATION

- **Title of the Tender:** Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)**
- **E-Tender ID.:** 2026_KnrU_830857

We, M/s _____, having our registered office at _____, hereby declare that the spares required for the operation, maintenance, and servicing of the _____ **(name of item/equipment)** offered by us against **Tender No.** _____, will be available for a minimum period of **Ten years** from the date of successful installation/commissioning.

We further certify that:

1. All essential and critical spares shall be supplied at reasonable and competitive prices.
2. The spares will be made available within a reasonable time whenever demanded during the above period.
3. In the event of discontinuation of the model, compatible or equivalent spares will be supplied without affecting performance.
4. We undertake full responsibility for ensuring uninterrupted availability of spares during the declared period.

WARRANTY DECLARATION / CERTIFICATE

- **Title of the Tender:** Supply, Installation, Testing and Commissioning of **Inductively Coupled Plasma Mass Spectrometry (ICP-MS)**
- **E-Tender ID.:** 2026_KnrU_830857

M/s _____, having registered office at _____, hereby declare that the items proposed to be supplied under the e-tender mentioned above shall carry **warranty for a minimum period of Three years** from the date of successful installation. During the warranty period, **any defect arising due to faulty materials, workmanship, or manufacturing defects** shall be rectified **free of cost**, including replacement of defective parts, labour, and transportation.

