



DEPARTMENT OF APPLIED SCIENCE & HUMANITIES
ASSAM UNIVERSITY, SILCHAR
(A Central University constituted under the Act of Parliament of India in 1994)
www.aus.ac.in

TENDER DOCUMENT

**Supply , Installation and Demonstration of laboratory equipments for the
Department of Applied Science & Humanities, Assam University Silchar.**

| | |
|---|---|
| Tender Reference | No: AU/TSSOT/ASH/Equipment/Tender/2022/1 |
| Price of Tender Document | Rs. 500.00 |
| EMD | Rs 14000.00 |
| Tender processing fee payable to ITI Limited | As per MHRD E-tendering website |
| Last Date and Time for receipt of online tender offers | 21/12/2022 06:00 PM |
| Time and date for opening of online tender (Technical bid) | 22/12/2022 01:00 PM |
| Time and date for opening of tender online (Financial bid) | 22/12/2022 01:30 PM |
| Address for Communication | Head Department of Applied Science and Humanities, Triguna Sen School of Technology, Assam University, Silchar – 788011, Assam, India Email Id: pradhan.arijita@gmail.com pranab.sarkar83@gmail.com |

NOTICE INVITING E-TENDER

TENDER NOTICE FOR THE SUPPLY, INSTALLATION AND DEMONSTRATION OF LABORATORY EQUIPMENTS

Online quotations as a two-bids system are invited from reputable original manufacturers/authorized dealers and suppliers for the supply of laboratory equipment to Head Department of Applied Science and Humanities, Triguna Sen School of Technology, Assam University, Silchar – 788011, Assam. Detailed technical specifications such as make/model/accessories and price including taxes should be quoted against each item separately.

| Sl. No. | Description and specifications of the equipment | Quantity required | Last date of submission of tender |
|----------------|--|--------------------------|--|
| 1 | <p><u>Magnetic Field In Helmholtz Coil Experiment Setup</u></p> <p>Specification:</p> <ol style="list-style-type: none">1. To study the variation of magnetic field with position of paired coils in Helmholtz arrangement along the axis of the coils carrying current.2. To study the principle of super imposition of magnetic field.3. To calculate the radius of the coil.4. Power Supply : 0-30V DC, at 5 Ampere, Digital gauss meter 0-200 Gauss with magnetic field sensor5. Two coils, the separation for Helmholtz coils is marked on the base.6. Movable magnetic field sensor.7. Accessories should be quoted separately. | 2 | 21/12/2022 |
| 2 | <p><u>Linear Air Track Apparatus</u></p> <p>Specifications:</p> <ol style="list-style-type: none">1. The kit contains everything required for a vast array of experiments covering velocity, force and acceleration, potential energy, kinetic energy, conservation of energy, SHM, motion on level and inclined planes. Gliders should be designed to accept standard slotted masses for additional loads. | 2 | |

| | | | |
|---|--|---|------------|
| | <p>2. It should also be supplied with a comprehensive accessory pack to facilitate every type of interaction. Comes with a range of accessories including, catapults, and buffers. For measurement of gliders speed, standard light gates and timers should be supplied.</p> | | |
| 3 | <p><u>Moment of Inertia measurements Apparatus</u></p> <p>Specification:</p> <ol style="list-style-type: none"> 1. Automation Grade: Manual 2. Dimension (mm): 400 x 400 x 1100 3. Floor Space: 450 x 450 4. Number of Weight: 3 Piece of 0.2 Kg 5. Number of rotation: Counter | 3 | 21/12/2022 |
| 4 | <p><u>Frank-Hertz experiment Apparatus</u></p> <p>Specifications:</p> <ol style="list-style-type: none"> 1. Argon filled tetrode 2. Filament Power Supply : 2.6-3.4V continuously variable 3. Power Supply for VG1K : 1.3-5V continuously variable 4. Power Supply for VG2A : 1.3 - 12V continuously variable 5. Power Supply for VG2K : 0 - 95V continuously variable 6. All the power supplies are highly stabilised and output voltages can be read on 3 1/2 digit, 7 segment LED DPM with autopolarity and decimal indication through a selector switch. 7. Scanning Voltage : 0-80V 8. Scanning Frequency : 115±20Hz 9. Multirange Analogue Voltmeter 10. Range : 0-5V, 0-15V & 0-100V 11. Multirange Digital Ammeter 12. Display : 3 1/2 digit 7 segment LED 13. Range Multiplier : 10⁻⁷, 10⁻⁸, 10⁻⁹ 14. Power : 220V±10% mains, 50Hz. | 2 | 21/12/2022 |

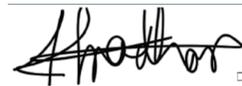
| | | | |
|---|--|----|------------|
| 5 | <p><u>Photoelectric effect apparatus with intensity & wavelength (digital)</u></p> <p>Specifications:</p> <ol style="list-style-type: none"> 1. Apparatus consist of photocell vacuum tube type digital power supply 2. Filter set variable bulb source 3. Connecting cords 4. Light-tight Box 5. Lamp: Incandescent lamp, bayonet type, 12V/5W rating 6. Phototube: Type GD-51 Mixed metal vacuum tube (Cs/Sb), 7-pin base 7. Rated voltage: 24V 8. Integral sensitivity (white light): 100μA/Lm 9. Control Unit: Lamp supply: 0—15V, 185mA—665mA, on 10-turn potentiometer 10. Display resolution: 1mA 11. Electrode voltage supply: -25.5V—+23.5V on 10-turn potentiometer 12. Display resolution: 0.1V 13. Photocurrent amplifier: Ranges: 20 μA: 0—19.99 μA x 0.01 μA | 3 | 21/12/2022 |
| 6 | <p><u>Diffraction experiments Setup</u></p> <p>Specifications:</p> <ol style="list-style-type: none"> 1. Compact instrument with full arrangements for conducting Newton"s Ring experiment. 2. A standard Microscope unit with 30x magnification and rotatable cross line eyepiece. 3. Focusing of microscope is through Rack and Pinion. 4. Longitudinal movement of 26 mm is done by rotating the drum provided which reads up to 0.001cm. 5. Complete with optical glass and convex lens inside a metal case. 6. Provided with complete Sodium lamp assembly. | 2 | 21/12/2022 |
| 7 | <p><u>Engineering Drawing Board</u></p> <p>Specifications:</p> <ol style="list-style-type: none"> 1. Seasoned Pinewood 2. Dimension 23inch\times32 inch\times1.3 inch (thickness) 3. Battons at the back 4. Painted edges 5. Hardwood working Edge inlaid on one side | 16 | 21/12/2022 |

TERMS AND CONDITIONS FOR SUBMISSION OF TENDERS

1. The tenders complete in all respects should be addressed to Head, Department of Applied Science and Humanities, Triguna Sen School of Technology, Assam University, Silchar – 788011, Assam.
2. The tenderers for equipment must submit the bid(s) in a two-bids system (Technical Bid & Financial) along with the EMD, Rs 14000/- and a Tender Fee of Rs. 500/-. The EMD amount and Tender Fee must be submitted separately as a Bank Draft/Pay Order/Banker's cheque from a scheduled /nationalized bank only in favor of '**Finance Officer, Assam University**'. The Soft/scanned copy of such EMD and Tender Fee must be uploaded while submitting the tender and hard copy must be submitted to/reach the Head of the department on or before the time & day of tender opening. The University is not responsible for Postal/ Courier delays, if any.
3. Tenderers will have to supply the laboratory/research equipment manufactured by any one of the reputed companies or groups and not of local brand name or assembled.
4. Proprietary items should be quoted with sole Manufacturer/Dealership certificate. Without dealership or manufacturer's certificate no bids will be accepted.
5. Tenders by e-mail, Fax, Telex, Telegram will not be accepted. Tenders must be submitted in online University E-Tendering Portal (<https://mhrd.euniwizarde.com>) only clearly indicating "**TENDER FOR ITEMS FOR AU/TSSOT/ASH/Equipment/Tender/2022/1**". The technical bid should contain scanned PDF copies (Single pdf file for multiple pages and documents). The seal and signature of the authorized official of firms must appear on all the documents uploaded. The financial bid should contain Bill of Quantities (BOQ) in excel format provided. The bidder is to quote the rate in the space marked for quoting rate in the BOQ. Only downloaded copy with same file name of BOQ document must be uploaded by the bidder after filling up.
6. In case of any modification in specifications/terms and conditions or any clarification to the bid document, it will be hosted in the university website (www.aus.ac.in), (<https://mhrd.euniwizarde.com>) & <https://eprocure.gov.in/epublish/app> only and the bidders are requested to log on to the University website from time to time and no separate corrigendum will be issued in this regard.
7. The rate should be exclusive of taxes and applicable tax should be clearly indicated.
8. The rates should be quoted along with supporting documents of specifications, technical features, list of users and authorized dealership documents (if applicable).
9. Details of availability of after sales support will have to be furnished.
- 10. The university is exempted from paying Customs and Excise duty.**
11. Final offer price, inclusive of all expenses, charges, taxes, duties, transportation,

packing and forwarding, freight, insurance, etc. i.e. all “Inclusive” with free delivery should be up to destination, **F.O.R Destination at the Department of Applied Science and Humanities, Triguna Sen School of Technology, Assam University, Silchar – 788011, Assam.** (Including both delivery and installation and Demonstration).

12. If any item is delivered in damaged condition, the material should be replaced with new ones immediately.
13. Payments will be made after delivery and successful installation and demonstration by factory trained engineers or authorized persons. No advance payment will be made.
14. The bids should be valid for a maximum period of 90 days from the date of opening of tender and the prices should remain valid till execution of purchase agreement.
15. Items of foreign origin should have insurance up to installation site.
16. In case of equipment of foreign origin, the Indian agent should submit one undertaking in nonjudicial stamp paper, stating that if any equipment delivered in damaged condition, they will be liable to replace the same with a new one (applicable only when order is placed).
17. The university reserves the right to accept or reject any or all the bids after recording clear reason(s) for the same.
18. GST registration certificate and PAN to be enclosed by the bidders.
19. **Technical and Financial Competence:** A tenderer must possess the technical competence i.e., having service engineer and/ or associated technical manpower with minimum technical qualification preferably a Diploma in appropriate Engineering branches. The bidder should have competent business capacity as evident from their annual business transaction during last financial year.
20. The items must be supplied within 3 weeks of placing orders.
21. The on-site warranty period and terms must be stated clearly on all equipments.
22. Any dispute arising during the contract will be referred to an arbitrator to be appointed by the University for his decision and award. The award or decision of the arbitrator shall be final and binding on both parties.



Sd/-

Head, Department of Applied Science and Humanities,
Triguna Sen School of Technology,
Assam University, Silchar – 788011, Assam, India

Date: 09/12/2022

Copy to:

1. Copy to Secretary to VC, AUS for VC's kind information
2. The Registrar, AUS
3. The Finance Officer, AUS
4. File for record

PROFORMA FOR SUBMISSION OF TECHNICAL BID

From:

.....
.....
.....
.....

To

Head, Department of Applied Science and Humanities, Triguna Sen School of Technology,
Assam University, Silchar – 788011, Assam, India

With reference to your advertisement dated published in the
..... and posted at Assam University Website, I / We
hereby submit the Technical bid for the _____
required by you. I / We confirm that I / We are the owners / authorized person to offer
you the item as per the desired specifications.

| Serial No. | Name of the equipment | Technical specification as given in Tender | Details to be filled by offerer |
|-------------------|---|---|--|
| 1. | Magnetic Field In Helmholtz Coil Experiment Setup | As given in Tender | |
| 2. | Experiments on an air-track | As given in Tender | |
| 3. | Moment of Inertia Apparatus | As given in Tender | |
| 4. | Frank-Hertz experiment | As given in Tender | |
| 5. | Photoelectric effect apparatus with intensity & | As given in Tender | |
| 6. | Diffraction experiments Setup | As given in Tender | |
| 7. | Engineering Drawing Board | As given in Tender | |

Date:

Signature of the Offerer

Office Seal