

# INDIAN INSTITUTE OF TECHNOLOGY, KANPUR GT ROAD, KALYANPUR, KANPUR – 208016 UTTAR PRADESH, INDIA

TENDER REFERENCE NO.: IITK/BSBE/AP/2021-2022/NC-22

**BID SUBMISSION END DATE- 24.01.2022** 

# **TENDER DOCUMENTS**

For

"Purchase of Protein Purification System"

# **BID DOCUMENT**

The Indian Institute of Technology Kanpur ("the IITK") invites Bids ("Bids") from eligible, qualified and capable companies for the supply and delivery of "the Goods" and provision of associated services ("Associated Services") according to the requirements as defined in the Tender document.

Name of Work	Purchase Protein Purification System	
Date of Publishing	27.12.2021 (15.00 hrs)	
Clarification Start Date and Time	27.12.2021 (15.00 hrs)	
Clarification End Date and Time	24.01.2022 (15.00 hrs)	
Queries (if any)	No queries will be entertained after clarification end date and time	
Bid Submission Start Date	27.12.2021 (15.00 hrs)	
Last Date and time of uploading of Bids	24.01.2022 (15.00 hrs)	
Last Date and time of <b>submitting</b> , EMD and other documents at IIT Kanpur (if any)	NA	
Date and time of opening of Bids	25.01.2022 (15:00 hrs)	

Interested parties may view and download the tender document containing the detailed terms & conditions from the website <a href="http://eprocure.gov.in/epublish/app">http://eprocure.gov.in/epublish/app</a>

# **Tender document**

Department of Biological Sciences & Bioengineering Indian Institute of Technology Kanpur Kanpur (UP) 208016 India

Enquiry date: December 27th, 2021

Enquiry No: IITK/BSBE/AP/2021-22/NC-22

Sealed quotations are invited for **Protein Purification System.** The detailed specification is described below.

## **Specifications of the Protein Purification System:**

- Completely Bio-compatible inert, fully automated modular system to maintain protein integrity and labile post translational modifications
- System capable of running at flow rates ranging from 0.001 25 ml/min, Max flow rate, isocratic (wash / column packing) is 50ml/min
- System should operate in a pressure range from 0 20 MPa with an accuracy of +/1.2 %
- The UV-monitor should be capable of detecting a wavelength of 280nm using LED technology
- System UV detector should have an absorbance range at least -6 to +6 AU crucial for sharp peaks. Useful when samples which give reading in the negative spectra of the absorbance
- Sensitivity is 4 decimal unit and with an optical path length of 2 mm and the option of
   5mm
- System should have the capability to run in bypass mode with up and down flow by bypassing the column
- The System pump should have Sapphire coating to tolerate up to 8M Urea and 6M Guanidine Hydrochloride.
- The system is pre-assembled with predefined tubings
- System should be supplied with a conductive monitor for conductivity measurement between 0.01ms/cm up to 999.9 ms/cm. System should be supplied with automated temperature compensation and flow restrictor
- System should be able to monitor pH from 0 to 14 pH and should be able to calibrate pH electrode within the system, delay volumes for fractionation calculated automatically
- System should have the option of attaching external detectors through I/o box and capable of doing software controlled multistep purification

- The system should be supplies with an outlet valve of minimum 3 ports
- System should be software controlled, software to be intuitive, interactive process pictures and simplified evaluation. Full control during manual and programmed runs
- Software control with Method Queues resulting in attending operations
- System should be provided with licensed standalone evaluation software for decongestion of work on the main system
- The system should have minimum 1 year of warranty

#### **Fraction Collector:**

- System should be supplied with an outlet valve to divert the flow to fraction collector, waste or an outlet position
- The system should be supplied with a fraction collector which allows the use of 2, 3,8,15 and 50 ml tubes
- It should have a drop sync sensor to minimize spillage
- Fraction collector should have an option of to be used in time, volume or peak recognition mode

#### **Software:**

 System should be software controlled, during manual and programmed runs with real time monitoring of the run

## The software should:

- Have some predesigned method templates and allow manual designing for customized methods
- Allow running queuing for unattended operations (for example, when a method needs to be executed after the existing run gets over)
- Enable the evaluation of the data and generate reports based on evaluation
- Have the feature of setting ALARMS for low/high limit of various parameters e.g. pH, conductivity, pressure, etc. The alarm should pause/stop the run to protect the column & system.
- Scheduling of the backup (user results file) should be automated
- Include WATCH function (in addition to the alarms) in the control software to
  ensure that various parameters like pH, conductivity, pressure, etc. are in
  acceptable range upon execution of an action by the operator
- Software should be fully GAMP and 21 CFR part 11 compliant
- Should be upgradable without any cost
- should be multiple user and can be used in multiple system

Quotations must be addressed to:

#### Dr. Appu Kumar Singh Lah18

Department of Biological Sciences & Bioengineering Indian Institute of Technology Kanpur Kanpur 208 016, India

Email: Singhappu@iitk.ac.in, nkhullar@iitk.ac.in

#### **Terms and Conditions:**

- 1. All equipment must be compatible with Indian electrical standards and codes. Engineering documentation on the physical sizes and weights of all major and minor components must be submitted.
- 2. IIT Kanpur is fully exempted from payment of GST on Imported Goods against our DSIR certificate.
- **3.** IIT Kanpur is partially exempted from payment of Customs Duty (We will provide Custom Duty Exemption Certificate, CD applicable is 5.5%).
- 4. TENDER Specific Manufacturer Authorization Form from OEM Required.
- **5.** The Institute reserves the right of accepting or rejecting any/all quotations without assigning any reason thereof.
- **6.** All prices should be **F.O.R.**
- **7.** Installation by OEM is preferred.

# TENDER ACCEPTANCE LETTER (To be given on Company Letter Head)

	Date:
To,	
Sub: Acceptance of Terms & Conditions of Ten	der.
Tender Reference No:	
Name of Tender / Work: -	
Dear Sir,	
1. I/ We have downloaded / obtained the tend 'Tender/Work' from the web site(s) namely:	der document(s) for the above mentioned
advertisement, given in the above mentioned	as per your website(s).
from Page Noto (including al	e entire terms and conditions of the tender documents I documents like annexure(s), schedule(s), etc.,), which e shall abide hereby by the terms / conditions / clauses
3. The corrigendum(s) issued from time to time taken into consideration, while submitting this	e by your department/ organisation too have also been acceptance letter.
4. I / We hereby unconditionally accept the ten / corrigendum(s) in its totality / entirety.	der conditions of above mentioned tender document(s)
5. I / We do hereby declare that our Firm has rany Govt. Department/Public sector undertaki	not been blacklisted/ debarred/ terminated/ banned by ng.
information is found to be incorrect/untrue of shall without giving any notice or reason the	by our Firm is true & correct and in the event that the r found violated, then your department/ organisation erefore or summarily reject the bid or terminate the its or remedy including the forfeiture of the full said

Yours Faithfully, (Signature of the Bidder, with Official Seal)

Date:

# **Declaration for Local Content**

(To be given on Company Letter Head - For tender value below Rs.10 Crores)
(To be given by Statutory Auditor/Cost Auditor/Cost Accountant/CA for tender value above Rs.10 Crores)

To, The Director, Indian Institute of Technology Kanpur, GT Road, Kalyanpur, Kanpur -208016	
Sub: Declaration of Local content	
Tender Reference No:	
Name of Tender / Work: -	
<ol> <li>Country of Origin of Goods being offered:</li></ol>	
"Local Content" means the amount of value added in India which shall, be the to the item being offered minus the value of the imported content in the item (inc customs duties) as a proportion of the total value, in percent.	
"*False declaration will be in breach of Code of Integrity under Rule 175(1)(i)(h) of Financial Rules for which a bidder or its successors can be debarred for up to two Rule 151 (iii) of the General Financial Rules along with such other actions permissible under law."	o years as per
You (Signature of the Bidder, with	urs Faithfully, Official Seal)