

**TENDER NOTICE**  
**Notice No.: 01/2020-2021**  
**For the Purchase of CHNS/O Elemental Analyzer Instrument**

Sealed tenders in two-bid format are invited from original manufacturers or their authorized dealers for supply, installation, testing & commissioning of **CHNS/O Elemental Analyzer instrument** and related accessories:

The instrument shall confirm to the requirements of the specification including spares, accessories, and consumables as mentioned below in Part – A of tender document. **Irrespective of these specifications any comparable version or higher version of the system will also be considered.**

The bidder must comply with all conditions laid down in PART-A, PART-B, PART-C of Tender document

The tender for equipment must be sent in sealed envelope with the Superscription “**TENDER FOR CHNS/O ELEMENTAL ANALYZER INSTRUMENT FOR SICART**” and addressed to Hon. Director, SICART, Charutar Vidya Mandal, Mota Bazar, Vallabh Vidyanagar-388120, Dist: Anand (Gujarat), India, along with necessary tender fees of **Rs. 5,000.00**.

1	Last date for submission of tender	09/03/2021
2	Date of opening of tender	10/03/2021 at 11.00 a.m
3	Earnest Money deposit	2 % of the Quoted Value in the form of At par Cheque in rupees
4	Security Deposit	5% of order value in the form of Bank Guarantee (before placing the PO)
5	Tender Fees (non – refundable)	Rs. 5,000/- Cheque or D/D in favour of “SICART- CVM”

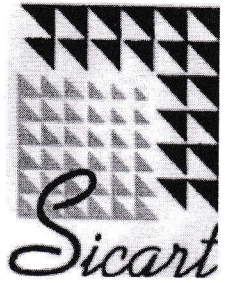
**Tender Document Contains:**

- Part - A : Specifications  
Part - B : General Terms & Conditions  
Part - C : Information to be provided by supplier

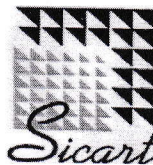
Hon. Director  
SICART  
CHARUTAR VIDYA MANDAL  
VALLABH VIDYANAGAR – 388120  
Dist: ANAND, GUJARAT



**SOPHISTICATED INSTRUMENTATION CENTRE  
FOR APPLIED RESEARCH AND TESTING**  
(Sponsored by Department of Science & Technology, Govt. of India, New Delhi)  
**NABL Accredited laboratory, Certificate No.TC-5124**  
**Sardar Patel Centre for Science & Technology**  
**Charutar Vidya Mandal**  
Vallabh Vidyanagar – 388120, Dist ANAND, GUJARAT, INDIA  
Phone: +91-2692-234966  
E-mail: [sicartcvm@sicart.res.in](mailto:sicartcvm@sicart.res.in) Website: [www.sicart.res.in](http://www.sicart.res.in)



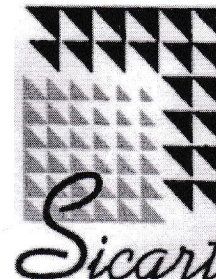
## **Tender Document for the Purchase of CHNS/O Elemental Analyzer**



Hon. Director  
SICART  
CHARUTAR VIDYA MANDAL







## PART – A

### MAIN FEATURES AND TECHNICAL SPECIFICATIONS:

Offers are invited from the reputed manufacturers / Representatives for supply, installation and commissioning of CHNS/O elemental Analyzer system. The system should meet minimum all the technical requirements as detailed below. The higher/advanced or any compatible version of any specification will also be considered if found suitable.

### Anticipated Technical Provisions for CHNS/O elemental analyzer

Principle: Dynamic flash combustion and gas chromatography (or) Adsorption-desorption for Separation of gases, thermal conductivity detection of C, H, N, S and O

Sr. No.	Component	Description
1	Main Features & Technical Specifications	<ul style="list-style-type: none"> <li>• CHNS/O elemental analyzer capable of handling a wide variety of sample types in the field of pharmaceuticals, polymers, chemicals, environmental and energy, including solids, liquids, volatile and viscous samples.</li> <li>• Modes of operation: CHN, CHN/S and Oxygen</li> <li>• Advanced combustion design for multiple sample analysis</li> <li>• Frontal Chromatography for simple, reliable and accurate measurements</li> <li>• Easy Data Management software for data handling</li> </ul>
2	Operating mode	Should have CHN, CHNS, CHNSO or O mode
3	Detector range of analyzer	0.01 - 100% $\pm$ 0.3 for C, H, N, S and O
4	Furnace temperature range	Combustion furnace temp $>1000^{\circ}\text{C}$ Reduction furnace temp $>900^{\circ}\text{C}$
5	Pyrolysis temperature	$>1000^{\circ}\text{C}$
6	Sample temperature	$>1500^{\circ}\text{C}$ or related temperature for multiple types of samples
7	Sample weight	0 to 500mg
8	Time for analysis	CHN $<9$ min CHNS $<11$ min Oxygen $<5$ min CN $<7$ min
9	Detector	TCD
10	Accuracy Precision	$\leq 0.5\%$ or better with helium $\leq 0.3\%$ or better



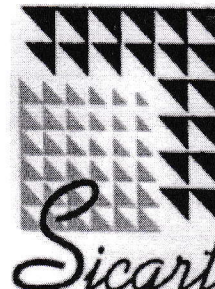
Sr. No.	Component	Description
11	Autosampler	Minimum 50 sample positions with solid and liquid autosampler and liquid sample sealing device
12	Ash removal	Assembly for ash removal/glass insert
13	Operations	Microprocessor controlled with automatic data transfer to computer
14	Software	Latest configuration with ability to provide calculations like elemental ratio, Empirical formula, % Polymer, Solvent of crystallization, CN ratio or the theoretic energy
15	PC system and Printer	(a) A desktop PC with all suitable ports matching with CHNS/O instrument. Latest Windows operating system and latest Microsoft office. (b) A colour laser printer shall be provided for graphic work.
16	Gases and Gas saver mode	Helium and Argon compatibility Auto shut down, wake up, standby, and auto leak test
17	Gas cylinders	High purity (99.995%) helium. Sulphur and oxygen gas cylinder with double stage double meter gas regulator with stainless steel diaphragm and pressure gauge. High purity gas cylinders required for Sulphur and Oxygen analysis along with leak test analyzer
18	Standards / consumable kit	Standards, consumable, sample preparation kits and consumables for analysis of CHNS/O for 1000 runs
19	Basic Infrastructure	Vibration free instrument table
20	Manual	2 set of Operation and maintenance manuals in English language should be supplied along with the system.
21	Performance Guarantee	System should be guaranteed for better accuracy. The accuracy of standard should be equal or $\pm 0.3$ based on the internationally accepted Standard Reference Material

#### Optional

Sr. No.	Facilities	Brief Descriptions
1	Microbalance	0.001 mg sensitivity with automatic weight transfer to analyzer assembly and all required supporting sample preparation kit
2	UPS	Minimum 10 KVA with 2 year AMC after warranty. Online branded appropriate UPS to run CHNS/O system with 2 Hours battery backup. The Cost of UPS should be separately Quoted







## PART – B

### GENERAL TERMS & CONDITIONS:

#### (A) Invoice / Price / Cost:

1. Invoice should have the costing of each unit /component of Instrument separately.
2. The rates should be quoted for each item (including Indian item), stating the specific Brand / Make / Model no. etc. with taxes. The bidder must quote for the equipment in accordance with the specifications mentioned in the tender document which is forming a part of the contract.

The bidders, nevertheless, may submit the offer for similar comparable equipment under the head "option:" and quote separately for such similar equipments or accessories. The price may also be quoted in foreign currency i.e Dollar, Pound, Euro etc. by authorized representatives of imported equipment.

3. The rates should be inclusive of all taxes FOR destination at the institute and should be quoted in the following format.

- 3.1 Basic prices of the Unit -----
- 3.2 Price of necessary accessories / spares / chemicals / glassware's etc. with detailed specifications to be supplied with basic unit and for optional.
- 3.3 Taxes :
  - GST - \_\_\_\_\_
  - Other taxes - \_\_\_\_\_
- 3.4 Packing and Forwarding \_\_\_\_\_
- 3.5 Mode of Transport for (Delivery at the centre located in Vallabh Vidyanagar, Dist: Anand in Gujarat) \_\_\_\_\_
- 3.6 Installation and Commissioning & Training \_\_\_\_\_
- 3.7 Total \_\_\_\_\_
- 3.8 The total price for each item as delivered in 2.7 above should be quoted in bill of material.

4. The Purchaser being educational & Research institute, the concessions applicable in rates / taxes under State / Central Government notification should be considered while quoting. The institution can, however, issue a certificate that the equipment being procured would be used exclusively for teaching / research purposes.
5. In the event of material supplied are not being in accordance to the specifications of items ordered, the supplier will bear the cost and risk and shall arrange to replace the same without any claims whatsoever for the same
6. In case the quoted rates are as per the valid and prevailing contract with DGS and D, New Delhi, the supplier shall furnish certified photocopy of the same to the purchaser. It may also be mentioned whether supplier can accept a direct order based on DGS and D rate Contract





7. **The earnest money deposit:** The tender copy dully filed in must accompany At par Cheque in rupees for 2% of the quoted value in favor of "SICART - CVM". This money shall be refunded to the unsuccessful dealer, as far as possible within 60 days from the date of the opening of the tenders; no interest shall be paid on earnest money deposit. Any offer received without the EMD shall stand wholly rejected. Nevertheless, decision by CVM's authority on such matter shall remain final and binding
8. Please also certify in the quotation that the prices quoted are as laid down in the Manufacturers/sole distributor's price list.
9. Any special discount for educations/research institution should be specified.

**(B) Pre-installations/Installation/Commissioning /Delivery period/Manuals etc.**

10. The instrument and all its sub units should operate on 230  $\pm$ 10 volts, 50 Hz power supply.
11. Pre- installation requirements such as power requirement (single phase or three phase, Power load, UPS) Cooling water supply, air compressor, air condition machine etc. if any) should be provided and specified.
12. The supplier or the Indian representative should install the system and bring in to complete operation, at the centre in Vallabh Vidyanagar in Gujarat or on a location of the purchaser's choice and to purchaser's satisfaction, without any charge.
13. Principal should submit the compliance certificate at the time of installation.
14. The supplier should clearly state the delivery period and time period required for installation and commissioning of the equipment, from the date of receipt of firm order. In case, if supplier anticipates delay in delivery of any or all items due to the reasons beyond its control, the supplier shall apply for suitable extension stating the reason for the same and state its confirm date of delivery. The purchaser, if feels suitable may extend the delivery date. In the case of any unavoidable pandemic situation, warranty should be extended by supplier.
15. IQ, OQ and PQ documents to be supplied after installation and commissioning of the system. You should be provided 21CFR Part-11 compliant software without any extra cost if available.
16. In case of delay of delivery of the equipment beyond the stipulated period, a penalty of 5% (Five Percent) of the total value of the ordered equipment will be levied for each delay or part thereof. The maximum penalty however shall not exceed 25% of the ordered value.
17. The supplier shall provide two sets of both technical service manual and operation/installation manual along with the dust cover for the equipment free of cost. Manuals must be in English language.

**(C ) Warranty/After Sales Service/Repair :**

18. Comprehensive warranty with free of cost supply of spares for 03 (three) years from the date of successful commissioning of the instrument should be covered. Also, after three years warranty, extended warranty up to 2 years to be covered separately.
19. The supplier/ manufacturer shall have to arrange for after sales service as well as Operations & Maintenance (O & M) through their Indian agent/representative. The details are to be specifically mentioned in their bid proposal. However, the purchaser will place a single order in the name of bidder and no separate order in the name of the Indian Representative/ Agent will be placed for after sales/ O & M service.
20. The main unit and all the sub units of the instrument should be serviced by the Indian representative of the supplier / manufacturer.





21. The maximum down time period for repairs of the equipment shall be 72 hours from the date of notification by the purchaser to the bidder / supplier.
22. In case of the authorized dealers quoting on behalf of manufacturers, a copy of certificate stating that the equipment is being quoted by the party is on behalf of the concerned manufacturer and manufacturer undertake the responsibility to provide the after sales maintenance of the equipment.
23. The supplier or the Indian representative should give performance/operational warranty for (i) the Complete system for three years from the date of the completion of the satisfactory installation and commissioning (ii) Critical and non critical spares (iii) and service back up including commitment for the availability of the spares, of the system for a period of minimum 10 years from the date of installation. Also in case of equipment going out of production, at least two years advance notice should be given to enable, one time procurement of the spares.
24. The supplier shall arrange for repair / replacement of the defective / worn out components, of the equipment at our place during the warranty period at purchaser's first instructions within 10 (Ten) days. This will be carried out at the cost of supplier and no charges whatsoever will be paid including the T.A and D.A of the personnel deputed by the supplier for the same.
25. The supplier will be required to get instrument serviced twice in a year for its satisfactory operation during the warranty period of three years. Necessary calibration of the instrument will be done by the supplier as and when required. Separate rates for the calibration shall be quoted along with the period of calibration required.

**(D) Demonstration and Training:**

26. Demonstration and training for operators of all modules. This should include (besides standard samples) the satisfactory analysis of at least (5) SICART samples carried out by SICART Scientists. Minimum four (04) trainings may be provided at our site until the users satisfy with training. Minimum three persons of SICART to be trained.

**(E) Payment :**

- 1 Advance payment will not be made.
- 2 70% of the total amount will be paid by wire transfer/ LC on supply of equipment and after checking for specifications and after installation and successful commissioning of the equipment. In case where the equipment has not been found in conformity of the specifications as per the final purchase order, the same shall stand rejected.
- 3 Remaining 30 % of the amount will be paid within 3 months from the date of installation and successful operation of the equipment.

**(F) Forfeiture of Security Deposit:**

**27. Forfeiture of Security Deposit Clause for Imported Items.**

1. No change in items and conditions of dealer's will be permitted once the LC is opened or mode of payment is decided. If due to a default on the dealer's part the LC lapses or is to be cancelled, than the security deposit of the dealer will be forfeited, in addition to it the dealer will be liable for payment of excess amount (more than the security deposit) spent on opening of the LC or other related expenses.
2. If the imported instrument is not installed properly within the stipulated time and/or the service manuals are not provided within the stipulated time, the security deposit will be forfeited.



**(G) User's List :**

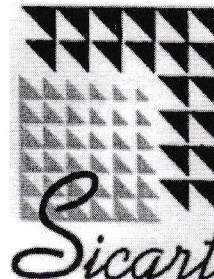
28. Bidders shall supply users list. In addition, they shall invariably furnish documentary evidence in the form of clients certificate (minimum 3) in support of satisfactorily supply and operation of the equipment.

**(H) General :**

29. Should the circumstances warrant that in overall interest of the purchaser an assessment is requirement of the capability and capacity of the bidder to perform and to execute the contract, purchaser reserves the right to assess notwithstanding anything stated above.
30. Conditional tender may not be accepted.
31. Incomplete or unsatisfactory tenders will be rejected without assigning any reason thereof.
32. The validity of the tender may be kept open for a minimum period of 180 days after the receipt of the quotation which may further be extended if need arises.
33. The authority of CVM reserves all the rights to increase or decrease the quantity of or split of the items of the tender at any time while finalization of the award.
34. The CVM authority also reserves the right to reject any or all of tenders without assigning any reasons thereof.
35. In case of any dispute the Jurisdiction shall be ANAND.
36. Tenders received late shall not be accepted. All the tenders shall be opened in presence of the bidders in the office of SICART in accordance with the date & time specified in the tender notice.
37. The manufactures printed leaflet, technical literature of specifications of every item quoted should be accompanied with the quotation failing which quotations will be summarily rejected.
38. In case of a firm whose quotation shall be accepted and order value is more than Rupees 1 lakh, the firm shall have to give an affidavit/declaration on non-judicial stamp paper, to be signed before competent magistrate for installation, free warrantee service during warranty period, for assurance for the supply of spare parts, components on payment basis and also for refund or adjustment of payment against advanced payment made.
39. No correspondence queries or reminders or personal visits regarding quotation position or ordering action will be entertained or replied. Orders when finalized will be intimated to the parties concerned ONLY.
40. Before placing the orders, we may ask the dealers/ suppliers to give us the demonstration of their equipment/instrument at their factory or other laboratories. They have to make all the necessary arrangements and expenses for the same.
41. Essential Spares and Consumables: Tool kit with all mechanical tools and accessories for the system installation and regular operation should be provided.







## PART - C

**Following information must be provided on the letter head of the supplier with due signature.**

a) Name of the firm

b) Type of Business Organization :  
(Please tick (✓) mark as applicable)

- ☐ Sole Proprietorship
- ☐ Partnership
- ☐ LLP
- ☐ Pvt. Ltd. Company
- ☐ Public Ltd. Company
- ☐ Any other (Please specify)

Please attach copy of relevant document.

c) Name of sole Proprietor or managing Partners or Managing Director and other Directors with addresses, telephone Numbers and Email IDs :

d) Details of registered office and other Regional Offices

e) Details about persons to be contacted (Name, Address, Email and Mobile Number)

- (i) For any query related to tender documents submitted
- (ii) For any query related to technical aspects
- (iii) Legal Authority

