

भा. कृ. अनु. प. — केन्द्रीय शुष्कि क्षेत्र अनुसंधान संस्थान ICAR - Central Arid Zone Research Institute जोधपुर (राजस्थान) 342 003 / Jodhpur (Rajasthan) 342 003 Website: www.cazri.res.in, Email: aaostoreadmiv@gmail.com



Dated: 28.01.2022

Phone No. 0291 –2787152(AAO) Phone No. 0291-.2786485 (CAO)/ FAX: 0291 – 2788706

F. No. 55(1)2021-2022/Adm. IV/

NOTICE INVITING TENDER THROUGH E-PROCUREMENT

The Director, ICAR-Central Arid Zone Research Institute, Jodhpur on behalf of the President, Indian Council of Agricultural Research, New Delhi invites online bids under Two bid system from the Manufacturer/ authorised dealers/registered firms for the Purchase of Atomic Absorption Spectrometer with Graphite Furnace at ICAR-CAZRI, Jodhpur.

Critical Date Sheet

1.	Date and Time for Issue/Publishing	06.00 PM on 28.01.2022
2.	Document Download / Sale Start Date and Time	06.00 PM on 28.01.2022
3	Document Download / Sale End Date and Time	02.00 PM on 08.02.2022
4.	Bid Submission start Date and Time	06.00 PM on 28.01.2022
5.	Bid Submission End Date and Time	02.30 PM on 08.02.2022
6.	Date and Time for Opening of technical Bids	02.30 PM on 09.02.2022
7.	Pre-bids conference of vendors will be fixed the on in ICAR-CAZRI, Jodhpur	02.30 PM on 04.02.2022
8.	Date and Time for opening of Financial Bid	After finalize the Technical Bid
9.	Address for Communication	Director, ICAR-CAZRI, Jodhpur-342003 (Raj.) India
10.	Tender Fee Bid Security (Earnest Money)	Tender Fee Rs. 500/- Bid Security Rs. 80000/- in the form of Demand Draft/Bankers cheque/Pay order to be drawn in favour of "ICAR Unit-CAZRI, Jodhpur", payable at Jodhpur

Note: The tender form and other details are available on CAZRI's website www.cazri.res.in & CPPP. The interested Manufacturers/authorized dealer/Agency/firm of repute may download the tender document from above websites and upload the same after completing in all respect in the e-procure.gov.in portal as per guidelines mentioned in the portal by or before the due date & time.

Encl.: Annexure- I to IX (for technical Bid Cover (Cover-I) & Annexure- X (for Financial Bid Cover (Cover-II)

Asstt. Administrative Officer (S) for Director

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Instructions for Online Bid submission

The bidders are required to submit soft copies of their bids electronically on the CPP Portal, using valid Digital Signature Certificates. The instructions given below are meant to assist the bidders in registering on the CPP Portal, prepare their bids in accordance with the requirements and submitting their bids online on the CPP Portal.

More information useful for submitting online bids on the CPP Portal may be obtained at: https://eprocure.gov.in/eprocure/app.

REGISTRATION

- 1) Bidders are required to enroll on the e-Procurement module of the Central Public Procurement Portal (URL: https://eprocure.gov.in/eprocure/app) by clicking on the link "Online bidder Enrolment" on the CPP Portal which is free of charge.
- 2) As part of the enrolment process, the bidders will be required to choose a unique username and assign a password for their accounts.
- 3) Bidders are advised to register their valid email address and mobile numbers as part of the registration process. These would be used for any communication from the CPP Portal.
- 4) Upon enrolment, the bidders will be required to register their valid Digital Signature Certificate (Class II or Class III Certificates with signing key usage) issued by any Certifying Authority recognized by CCA India (e.g. Sify / nCode / eMudhra etc.), with their profile.
- 5) Only one valid DSC should be registered by a bidder. Please note that the bidders are responsible to ensure that they do not lend their DSC's to others which may lead to misuse.
- 6) Bidder then logs in to the site through the secured log-in by entering their user ID / password and the password of the DSC / e-Token.

PREPARATION OF BIDS

- 1) Bidder should take into account any corrigendum published on the tender document before submitting their bids.
- 2) Please go through the tender advertisement and the tender document carefully to understand the documents required to be submitted as part of the bid. Please note the number of covers in which the bid documents have to be submitted, the number of documents including the names and content of each of the document that need to be submitted. Any deviations from these may lead to rejection of the bid.
- 3) Bidder, in advance, should get ready the bid documents to be submitted as indicated in the tender document / schedule and generally, they can be in PDF / XLS / RAR / DWF/JPG formats. Bid documents may be scanned with 100 dpi with black and white option which helps in reducing size of the scanned document.
- 4) To avoid the time and effort required in uploading the same set of standard documents which are required to be submitted as a part of every bid, a provision of uploading such standard documents (e.g. PAN card copy, annual reports, auditor certificates etc.) has been provided to the bidders. Bidders can use "My Space" or ''Other Important Documents' area available to them to upload such documents. These documents may be directly submitted from the "My Space" area while submitting a bid, and need not be uploaded again and again. This will lead to a reduction in the time required for bid submission process.

SUBMISSION OF BIDS

- 1) Bidder should log into the site well in advance for bid submission so that they can upload the bid in time i.e. on or before the bid submission time. Bidder will be responsible for any delay due to other issues.
- 2) The bidder has to digitally sign and upload the required bid documents one by one as indicated in the tender document.
- 3) Bidder has to select the payment option as "offline" to pay the tender fee / EMD as applicable and enter details of the instrument.

- Bidder should prepare the EMD as per the instructions specified in the tender document. The original should be posted/couriered/given in person to the concerned official, latest by the last date of bid submission or as specified in the tender documents. The details of the DD/any other accepted instrument, physically sent, should tally with the details available in the scanned copy and the data entered during bid submission time. Otherwise the uploaded bid will be rejected.
- Bidders are requested to note that they should necessarily submit their financial bids in the format provided and no other format is acceptable. If the price bid has been given as a standard BoQ format with the tender document, then the same is to be downloaded and to be filled by all the bidders. Bidders are required to download the BoQ file, open it and complete the white coloured (unprotected) cells with their respective financial quotes and other details (such as name of the bidder). No other cells should be changed. Once the details have been completed, the bidder should save it and submit it online, without changing the filename. If the BoQ file is found to be modified by the bidder, the bid will be rejected.
- 6) The server time (which is displayed on the bidders' dashboard) will be considered as the standard time for referencing the deadlines for submission of the bids by the bidders, opening of bids etc. The bidders should follow this time during bid submission.
- All the documents being submitted by the bidders would be encrypted using PKI encryption techniques to ensure the secrecy of the data. The data entered cannot be viewed by unauthorized persons until the time of bid opening. The confidentiality of the bids is maintained using the secured Socket Layer 128 bit encryption technology. Data storage encryption of sensitive fields is done. Any bid document that is uploaded to the server is subjected to symmetric encryption using a system generated symmetric key. Further this key is subjected to asymmetric encryption using buyers/bid openers public keys. Overall, the uploaded tender documents become readable only after the tender opening by the authorized bid openers.
- 8) The uploaded tender documents become readable only after the tender opening by the authorized bid openers.
- 9) Upon the successful and timely submission of bids (i.e. after Clicking "Freeze Bid Submission" in the portal), the portal will give a successful bid submission message & a bid summary will be displayed with the bid no. and the date & time of submission of the bid with all other relevant details.
- 10) The bid summary has to be printed and kept as an acknowledgement of the submission of the bid. This acknowledgement may be used as an entry pass for any bid opening meetings.

11) Pre-bids meeting of vendors will be fixed the on 05.01.2022 at 2.30 PM in ICAR-CAZRI, Jodhpur

ASSISTANCE TO BIDDERS

- 1) Any queries relating to the tender document and the terms and conditions contained therein should be addressed to the Tender Inviting Authority for a tender or the relevant contact person indicated in the tender.
- 2) Any queries relating to the process of online bid submission or queries relating to CPP Portal in general may be directed to the 24x7 CPP Portal Helpdesk.

Terms and Conditions

- 1. The tenderer shall quote rates, which will include the delivery (supply and installations) & other incidental charges. Taxes, if any, should be indicated separately.
- 2. The rates should be quoted as per the Financial Bid /BOQ format uploaded on the CPP Portal. Taxes if any, should be indicated separately. It must be noted that the contract shall be awarded to the firm which fulfils all the required specifications, terms and conditions and remains L-1.
- 3. The firm must also possess valid PAN No., TIN No. & GST registration number and a copy of the same must also be enclosed with the tender document.
- 4. Copy of Income Tax Return of last 2 years may be furnished.
- 5. Modification in the tender documents after the closing date and time is not permissible.
- 6. The successful firm shall have to supply the <u>item (from the date of confirmed supply order)</u> within 45 days /as <u>mentioned in the supply order(P.O.)</u> and if the materials are not supplied and installed in time then EMD shall be forfeited. The rates quoted shall be valid for 6 months from the date of opening of tender.
- 7. The contractor/bidder or his representative may contact the undersigned at Tel No.0291-2787152 for any further clarification. No variation in terms of quality of the items shall be entertained or else EMD/Security deposit shall be forfeited.
- 8. The Director, ICAR-CAZRI, Jodhpur shall have the right to reject all or any of the offers, accept more than one offer, and assign part of the job.
- 9. Merely quoting of lowest rates does not mean that order shall be given to that firm. The competent authority will finally decide on the basis of quality & performance of past installations.
 - 10. The interested Firms are required to deposit/submit (in original) Tender fee (not refundable) and an Earnest Money Deposit (EMD) of the amount mentioned in Critical date sheet in the form of Demand Draft/Bankers cheque/Pay order from any of the Commercial Bank in favour of "ICAR Unit-CAZRI, Jodhpur", payable at Jodhpur may be addressed to Director, ICAR-CAZRI, Jodhpur on or before bid submission closing date and time as mentioned in critical date sheet. No quotation/tender shall be considered without the earnest money deposit. Demand Draft drawn in favour of any officer other than "ICAR Unit-CAZRI, Jodhpur" payable at Jodhpur' will not be accepted and the tender will be rejected. The earnest money will be refunded only after the finalization of the procurement and no interest will be paid on earnest money.
- 11. Rates once finalized will not be enhanced/reduced during the currency of the contract. In case of foreign currency, conversion rates in INR will be taken on that day when financial bid open.
- 12. In case, the successful bidder shows inability at any stage, after the contract is finalized and awarded, for whatsoever reason(s), to honour the contract, the earnest money / performance security deposited would be forfeited.
- 13. The Director, ICAR-CAZRI, Jodhpur reserves the right to cancel the contract at any time during the currency period of the contract without giving any reason.
- 14. The firm to whom the tender will be awarded, will have to deposit the performance security equal to 5% 10% of the total amount at the time of installation of the equipment. If the services are not found to be satisfactory, the performance security is liable to be forfeited. No interest will be paid on performance security.
- 15. If any dispute(s) arises between ICAR-CAZRI, Jodhpur and the firm with reference to the contract, ICAR-CAZRI, Jodhpur will decide it and its decision will be binding on the firms.
- 16. **Bid Validity**: 90 days.
- 17. The contract will be given to Least one (L1).
- 18. The Institute is exempted from payment of excise duty if any. Hence, excise duty will not be paid to the firm.
- 19. **Payment-** 100% of the contract price on receipt of goods as per specifications by the consignee supported by satisfactory installation/Demonstration and working report.
- 20. Installation: Should be done within stipulated delivery period as per the order at the location as mentioned in the tender in consultation with the indenting officer, failing which Liquidated Damage clause shall apply. Liquidated Damage clause: It would be realized @ 0.5% (half per cent) of the base price (excluding taxes) of the delayed goods for

each week of delay subject to maximum 10%.

- 21. **Price**
 - i) The price quoted shall be on firm and fixed basis and should be reasonable living no scope for any further negotiation on price.
 - ii) For goods manufactured in India/abroad: The price of the goods should be quoted on FOR basis and in INR (including all kind of charges and taxes) installations commissioning charges, if any.
- **22. Jurisdiction of Court**: The court of the Jodhpur shall have a jurisdiction to decide any dispute arising out of or in respect of contract.
- **23. Force Majeure Clause**: The Supplier shall not be liable for forfeiture of its performance security, liquidated damages or termination for default, if and to the extent that, it's delay in performance or other failure to perform its obligations under the Contract is the result of an event of Force Majeure. For purposes of this Clause, "Force Majeure" means an event beyond the control of the Supplier and not limited to, acts of the Purchaser either in its sovereign or contractual capacity, wars or revolutions, fires, floods. Epidemics, quarantine restrictions, strikes, lockout or any act of war. Notice of the

Tender ID: 2022_DARE_670636_1

happening of any such event is given by either party to the other within 15 days from the date of occurring thereof. However either party at its discretion can terminate the contract in such cases.

- 24. **Termination of Contract**:- Time shall be the essence of the contract. The purchaser shall have the right to terminate the contract without any notice in part or in full in any of the following cases:
 - a) The delivery of the material is delayed for causes not attributed to Force Majeure after the scheduled date of delivery.
 - b) The seller is declared bankrupt or becomes insolvent.
 - c) The delivery material is delayed due to causes of Force Majeure by more than reasonable time.
 - d) In case Performance Security is not furnished within the time period specified by the purchaser.
 - e) Supply in the case of successful Tenderer should strictly confirm to the specifications of the equipment being purchased.
 - f) Any change in Address/Telephone/Fax/e-mail of the tenderer should immediately be informed. The state of non-communication by the firm will make the offer liable for rejection.
- 25. **Acceptance or rejection of offer**:- The Director, ICAR-CAZRI, Jodhpur reserves the right to accept or reject any tender in part or full without assigning any reason thereof. The successful bidder should submit order acceptance letter within 10 days from the date of issue.
- 26. On Site warranty and rates for CMC and AMC may be asked to quote as an optional.

'Terms & Conditions are acceptable to us'.

Dated: (Authorized signatory of the firm)

Check list of documents to be uploaded by the tenderer in Technical bid cover

The Firms are required to upload copies of the following documents:-

S.No.	Documents required	Attach	ned with Technical bid
	•	X	Not attached with Technical bid
a)	Scanned copy of Bid Security (EMD) and		
	tender fee/its exemption, if any.		
b)	Scanned copy of Firm's registration issued by		
-,	the Central Govt./State Govt.		
c)	Scanned copy of TIN No. &		
	GST Registration No.		
d)	RTGS detail of the firm		
e)	Scanned copy of Valid PAN issued by		
	Income Tax Department		
f)	Scanned copy of Income Tax Return of last 2		
	years		
g)	Scanned copy of signed our terms and		
	conditions		
h)	Tender acceptance letter		
i)	Scanned copy of signed Price Bid undertaking		
j)	Undertaking that firm has not black listed by		
	any government organisation		
k)	Undertaking that items shall be supplied as		
	detailed in tender document		
1)	Scanned copy of ink singed tender specific		
	authorization from OEM (Original Equipment		
	manufacturer).		
m)	User list, and		
	Scanned copies of the Work Orders awarded		
	to firm by the other Govt. dept./organizations		
	etc. for the said item(s) of last 2 years.		
n)	Any other, if any		

Signature of the Tenderer with seal

<u>Technical Bid</u> <u>Details of the Firm</u>

Name of the firm	:	
Registered/Postal Address	:	

S.No.	Particulars	
1.	Phone number/Mobile number	
2.	E-mail Address	
3.	PAN No	
4.	GST / TIN / GST Reg. No.	
5.	Applicable Bank Details: Bank Name: Branch Address with Phone No. Account No. Type of Account (Current/Saving)	
6.	RTGS/IFSC Code & Branch	

Signature of the bidder

Technical Bid TENDER ACCEPTANCE LETTER (To be given on Company Letter head)

	To
Sub	: Acceptance of Terms & Conditions of Tender.
	Tender Reference No:
	Name of Tender / Work: -
Dear S	Sir,
1. web si	I/ We have downloaded / obtained the tender document(s) for the above mentioned Tender/Work' from the te(s) namely:
2. Pag	_as per your advertisement, given in the above mentioned website(s). I / We hereby certify that I / we have read the entire terms and conditions of the tender documents from the No to (including all documents like annexure(s), schedule(s), etc .,), which form part of the tract agreement and I / we shall abide hereby by the terms / conditions / clauses contained therein.
3. consid	The corrigendum(s) issued from time to time by your department/ organisation to have also been taken into teration, while submitting this acceptance letter.
4.	I / We hereby unconditionally accept the tender conditions of above mentioned tender document(s) nendum(s) in its totality / entirety.
5. sector	I / We do hereby declare that our Firm has not been blacklisted/ debarred by any Govt. Department/Public undertaking.
any no	I / We certify that all information furnished by the our Firm is true & correct and in the event that the nation is found to be incorrect/untrue or found violated, then your department/ organisation shall without giving otice or reason therefore or summarily reject the bid or terminate the contract, without prejudice to any other or remedy including the forfeiture of the full said earnest money deposit absolutely.

Yours Faithfully,

(Signature of the Bidder, with Official Seal)

PRICE BID UNDERTAKING

From: (Full name and address of the Bid	lder)
Го	
Dear Sir/Madam,	
I submit the Price Bid for	and related activities
as envisaged in the Bid document.	
• •	d understood all the terms and conditions as contained in the Bid
document, and agree to abide by them.	
3. I offer to work at the rates as i	indicated in the price Bid, inclusive of all applicable taxes except
Service Tax/GST.	
	Yours Faithfully,
	Signature of the firm with seal

MANUFACTURER'S (OEM) AUTHORISATION FORM

То
The Director, ICAR- Central Arid Zone Research Institute, Jodhpur, Rajasthan 342003
Ref: Your Bidding Documents Nodateddated
Dear Sir,
We, who are established and reputable manufacturers of
No company or firm or individual other than Messrs
We hereby extend our full guarantee and warranty as per the General Conditions of Contract, read with modification, if any in the Special Conditions of contract for the goods and services offered for supply against this Bidding Document by the above firm.
Yours faithfully,
(Signature name and designation)
for and behalf of Messrs
[name & address of the manufacturers]

Note: This letter of authorization should be on the letter head of the manufacturing firm and should be signed by a person competent and having the power of attorney to legally bind the manufacturer. The authorization Certificate should be from the "Manufacturer" only and certificate from any other firm/person including OEM arrangements would not be accepted

(Annexure-VIII)

(Signature of the Firm with Seal)

Technical Bid

(Printed on letter head of firm)

TO WHOM IT MAY CONCERN

We	hereby	certify	that	our	firm M/s
					has not been black listed by any
Government, or semi Government department in India.					

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TECHNICAL BID

Schedule to tender

TECHNICAL SPECIFICATION OF Purchase of Atomic Absorption Spectrometer with Graphite Furnace at ICAR-CAZRI. Jodhnur

S.	nace at ICAR-CA Item Name	Broad Specification	Quantity
N. 1.	Atomic	Atomic Absorption Spectrometer with Graphite-Furnace	01 No.
	Absorption Spectrometer with Graphite Furnace	Fully PC controlled true optical double bean Atomic Absorption Spectrophotometer system with Integrated Graphite Furnace, permanently aligned dual atomizers having capability to use both flame and furnace mode of operation and Hydride Generation System capable of analyzing elements from sub ppb to percentage level in samples like water, plant tissues, soil etc. with following specifications:-	
		1. Atomizer System: A compact integrated dual atomizer system with inbuilt flame and furnace atomizers.	
		a) Change over from Flame to Furnace mode and vice-versa should be automatic and controlled through the software.	
		b) Vertical and horizontal alignment of the flame burner head in the light beam should be Motorized automatic through the software.	
		c) Separate Titanium Burner head with 10 cm slot for Air-Acetylene flame and 5 cm for Nitrous Oxide-Acetylene flame.	
		d) The burner height is to be automatically optimized.	
		2. Background correction and heating system: Deuterium background correction for Flame Atomizer & AC Longitudinal/horizontal Zeeman Background correction for Graphite Furnace (GF) to have higher light through put. The heating of the Graphite Atomizer should be in transverse direction, ensuring the uniform temperature distribution across the graphite tube.	
		3. Alignment: The Graphite Furnace Atomizer must be permanently aligned with no movement, alignment and optimization required. The Furnace Autosampler must be integrated to main Spectrometer with a minimum of 80 sample positions. The system should be equipped with an integrated graphite furnace camera for easy auto sampler tip alignment and real time viewing of the process happening in graphite furnace.	
		4. GF System: The GF system should be supplied with pyrolytically coated graphite tube, integrated platform, rapid furnace heating > 2000°C/s. An imported air compressor and an imported recirculating water chiller unit of appropriate capacity for	

cooling of Graphite Furnace must be quoted by the manufacturer.

5. Lamps

- a) The system should have a minimum 8 lamp holders with a provision of automatic lamp selection and fixed lamp positions. Built-in power supplies for Coded Hallow Cathode Lamps and special lamps that are used for the analysis of volatile elements like As, Hg, Se, Pb etc..
- b) Provision for using single element and multielelments lamps
- c) Coded hollow cathode lamps & Standards (1000 ppm) should be supplied for all elements zinc, copper, manganese, iron, boron, calcium, magnesium, potassium, sodium, selenium, cadmium, chromium, nickel, lead, silver, aluminium, mercury and arsenic to carry a 5000 mA/h lifetime guarantee or better.
- 6. Sample Introduction System: A high sensitivity nebulizer system including impact bead and flow spoiler with corrosion resistant against the acids like 5% hydrofluoric acid, hydrochloric acid and Nitric Acid. Corrosion resistant spray chamber (inert fluoroplastic spray chamber). Autosampler for flame should have a minimum of 80 positions for samples. Should be supplied with high quality vials (>300 nos.) for sample feeding.
- 7. Mode of measurement: Sequential
- 8. Optical System
 - a) A true double beam spectrometer system with high light throughput.
 - b) A focal length of minimum 240 mm or better and the Reciprocal Linear Dispersion should be between 1.6-0.8 nm/mm. Variable slit selection.
 - c) Monochromatotor with Holographic- Diffraction grating with Groove density of 1800 line/mm.
- **9. Hydride Generation Accessory**: The atomic absorption spectrometer system with Fully Automatic Vapour Hydride Generation system for the analysis for the volatile elements (As, Se, Hg,).
- **10. Detector:** Photomultiplier Tubes (PMT) or Solid State Detector (CMOS) Wavelength range: 185 900 nm or better
- **11. Background Correction Methodology:** Deuterium background correction for Flame Atomizer & AC Zeeman Background Correction for the Graphite Furnace with the magnetic field applied along optical path
- **12. Sensitivity**: >0.8 absorbance with the precision of <0.5% RSD for 5 ppm Cu standard.
- **13. Software:** Programmed facility with multitasking software should provide complete control of instrument with instrument status display and its various accessories.

14. Gas Cylinders and Flows system

- a) Acetylene, Nitrous Oxide and Argon filled Cylinders for AAS analysis (UHP Grade) with necessary Tubings & Connectors (**Two sets each of cylinders and tubings/connectors**).
- b) Double Stage Gas Regulators for Acetylene Gas, Argon

Gas, Nitrous Oxide (with heater) Cylinders (one sets of each for each gas).

- c) Software controlled flame ignition and automatic changeover of oxidant flow from acetylene to nitrous oxide when switching to or from air-acetylene to nitrous oxide acetylene flame. Complete gas system should be supplied with instrument.
- d) All safety interlocks built-in and additional feature like Burner Head Interlock, Nebulizer/End Cap Interlock, and Drain Interlock to be built-in.
- **15.** Gas Purifications Panel: Standard Gas Purification panel along with installation.
- **16. Hood and Exhaust Fan:** Stainless Steel Hood with Exhaust Fan including necessary fitting and Ducting Facility.
- **17. Computer System:** Windows based Branded Computer (i5 or above, 19" monitor, Licensed Window 10 or higher, Licensed MS Office; Antivirus for more at least 3 years) with Laser Jet printer with auto Duplex printing (Print, Scan, Copy; >20ppm).
- **18. Data Retrieval system:** Windows 10 Professional based branded laptop (i5 or above and 4GB or more RAM, Licensed MS Office; Antivirus for more at least 3 years)
- **19. Air Cooling system:** 1.5 ton capacity 3+ star rated AC (02 pieces)

20. UPS:

- a) Online UPS with 5 KVA having a minimum of 60 Minutes Battery Back-up capacity for complete AAS unit including computer.
- b) 1 KVA UPS with minimum 30 back-up for computer system (separate)
- **21**. Any other Accessories, if required for installation and successful operation of AAS (Flame and Graphite) should be quoted.
- 22. Site preparation including gas line: by bidders.

23. Optional Accessories:

- a) Ultra pre water purification system: Resistivity at 25° C = >18 M Ω /cm; TOC = \leq 50 ppb; Particulates (size > 0.22 μ m) = < 1 particulate/mL; Bacteria = < 0.05 CFU/mL; Pyrogens (endotoxins) = < 0.005 EU/mL; Flow Rate = atleast 0.5 L/min; Should be supplied with pre filter assembly for physical and other coarse material; 2 Years Warranty after successful installation and Maintenance Contract for the replacement of cartridges/membrane filters/RO after completion of Warranty period.
- b) Coded multi element hollow cathode lamps for elements combination of calcium/ magnesium; sodium/ potassium; copper/ zinc/ manganese/ iron, etc.
- **24.** Warranty: 2 Years after successful installation.

- **25. CMC**: 2 Years Comprehensive Maintenance Contract (CMC) after completion of Warranty period.
- **26**. **AMC:** AMC for 3 years should be quoted optionally.
- **27. Training:** 10 days training for complete operation of instrument after installation.
- **28**. The above specifications should be supported by a printed and authentic technical literature.
- **29**. Institute reserves the right for confirmation of the specification by demonstration from the technically successful bidders.
- **30**. Instrument should be licensed and certified from any reputed international authority.
- 31. List of users of the instrument in India.

(Signature of the Firm with Seal)