



जम्मू केंद्रीय विश्वविद्यालय
CENTRAL UNIVERSITY OF JAMMU
 राया-सूचानी (बागला) जिला सांबा-181143, जम्मू (जम्मू एवं कश्मीर)
 Rahya-Suchani (Bagla), Distt Samba, Jammu-181143 (J&K)

Notice Inviting Tender : Open Tenders

Sealed Tenders in two bid system are invited from OEMs/Reputed firms /authorised dealers having valid registration, to supply and install/print the following items for Central University of Jammu. The detailed tender form(s) can be obtained from the University through demand draft of Rs. 1000/- drawn in favour of **Finance Officer, Central University of Jammu** payable at Jammu or log on to University website www.cujammu.ac.in

1.	Scientific/Lab Equipments for Dept of Nano Science & Materials
2.	Scientific/Lab Equipments for Dept of Chemistry & Chemical Sciences
3.	Printing of Mark Certificates & Degrees

Last date for receipt of Tender(s): 11-04-2017 by 3.00 pm

Date of opening of Technical Bid(s): 11-04-2017 at 3.30 pm

No. CUJ//Proc/F.No65/2017/ 01

Dated: 16-03-2017

Sd/-Registrar

जम्मू केंद्रीय विश्वविद्यालय
Central University of Jammu

Rahya-Suchani (Bagla), District Samba-181143, Jammu (J&K)
Ph: 01923-249 657 & Website: www.cujammu.ac.in

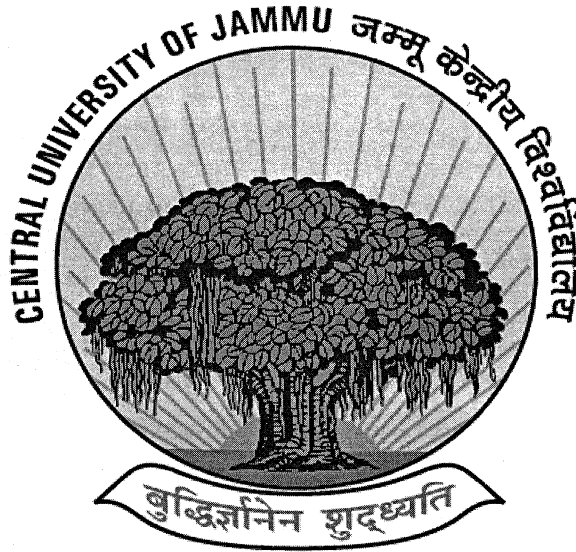
No: CUJ//Proc/F.No65/2017/ 01(02)

Date: 16-3-2017

Cost of tender documents: Rs. 1,000/-

Issued to: M/s.

**TENDER DOCUMENTS CUM RATE CONTRACT AND REGISTRATION OF FIRMS
TO SUPPLY AND INSTALLATION OF EQUIPMENTS / INSTRUMENTS FOR THE
DEPARTMENT OF CHEMISTRY AND CHEMICAL SCIENCES**



Last date and time to submit the bids : 11.04.2017 by 03.00 p.m.

Date and time of opening of bids at University : 11.04.2017 by 03.30 p.m.

**Campus, Rahya-Suchani (Bagla), District
Samba-181143, Jammu (J&K), Tel: 01923 –
249657 ext 206**

Chapter-I: Instructions to the bidders

1. **Preface:** The Central University of Jammu is presently functioning from two campuses, Administrative Block at Rahya-Suchani (Bagla), District Samba, Jammu and Temporary Academic Block & Hostels at Sainik Colony, Jammu. The University intends to purchase equipments / instruments for the Department of Chemistry and Chemical Sciences from OEM / authorized dealers for the University, likely to be installed at both the campuses.
2. **Submission of tender:** The sealed tenders are invited for supply and installation of equipments for the Department of Chemistry and Chemical Sciences under **two bid system** viz. **Technical bid:** consisting of all technical details along with commercial terms and conditions [filled in Annexure-I duly signed and stamp, EMD, relevant technical documents & D.D. of Rs.1,000/- (if downloaded tender form is used)] and **Financial bid** [indicating item wise price for the items mentioned in the technical bid (Annexure-II)], in two separate sealed envelopes and should be super scribed as technical and financial bids accordingly. Both the sealed envelopes should be kept in a third envelope on which it should be super scribed **‘Tender for equipments of Department of Chemistry and Chemical Sciences’**.
3. **Quotation of equipments / instruments:** The Bidder may quote for all equipments/ instruments or part of it as mentioned at Annexure-I and should agree to accept the part supply order as per the criteria of lowest quoted bid for each item. Unit prices are to be quoted both in figures and in words. In case of a discrepancy, that quoted in words / least will be taken as valid.
4. **Opening of bids:** Initially the technical bids will be opened and scrutinized. The firm, who meets the basic requirement as per documents furnished, may be invited for full fledged display / demonstration / to present the samples before opening of financial bid. The University will not bear any cost for presentation of samples. The committee of the University will inspect the samples, may visit the show room / items supplied at other organizations to ascertain the quality. The University may shortlist three to four best quality firms. The financial bid will be opened for those firms who qualify technically and whose sample has been agreed to the satisfaction level of the University. The decision of the University will be final in this regard.
5. **Selection of firm:** The firm will be selected amongst the shortlisted firm only and the equipments / instruments will be considered on lowest quoted basis item wise. Further, if the committee found that the quality of lowest quoted firm is not satisfactory, the committee may recommend and consider next lowest quoted firm. The decision of the committee will be final in this regard. The short listed tender along with the documents will be submitted to the competent authority and upon approval; the successful bidders will be issued purchase order.
6. **Alteration in the bid:** The bidder will not be permitted to alter or modify their bids after receipt by the University; however, the firm can withdraw the bid before the closing last date and time of the tender.
7. **Availability and submission of tender form:** The tender documents can be obtained in person from Procurement Branch, Rahya-Suchani (Bagla), District Samba-181143, Jammu (J&K) (Tel: 01923-249657) on payment of **Rs. 1,000/-** through DD favouring *“Finance Officer, Central University of Jammu”* payable at Jammu during working hours (10:00 to 17:00 hrs). The tender form can be downloaded from University website (www.cujammu.ac.in) and must be submitted along with the cost of tender form of Rs. 1,000/- and EMD. The downloaded tender form without cost of tender form will not be accepted. Last date to submit the tender is **11.04.2017 by 3:00 p.m.** The filled in tender form can be dropped in tender box at the above address or can be sent through post. The bids will be opened on the same day in presence of the

bidders at **3:30 p.m.** or any other date convenient to the University authorities, which shall be intimated separately. Hence, the firm should write their phone numbers and email ID on outside the sealed envelope to pass the information, if required.

8. **Registration:** The firm should be registered with the competent authority to manufacture and supply of equipments / instruments, sales tax and service tax and also furnish self attested copies of the following documents:

- (a) Certificate of registration with competent authorities to manufacture and supply of equipments / instruments
- (b) Valid registration with sale tax and service tax authority
- (c) TIN / PAN
- (d) Valid quality certificate from competent authority (i.e. ISO, ISI etc).
- (e) Service tax clearance certificate for the period ending 31.03.2016
- (f) Experience certificate & User List
- (g) Annual turnover with CA audited balance sheet for last three financial years (2013-14, 2014-15 & 2015-16)

9. All the columns in financial bid are to be filled in words and figures. The variation in words and figures, if any, the lowest shall be taken into account.

10. In case the successful bidder declines the offer of contract, for whatsoever reason(s), his EMD will be forfeited.

11. The University reserves the right to reject all or any tender in whole, or in part, without assigning any reason thereof.

12. **Cost:** The rates quoted should be inclusive of all taxes, levies, freight, insurance, transportation, installation including accessories etc at the destination. Rates and make of the equipments are to be quoted in the financial bid as per tender document (Annexure-II), else it may not be considered. All the above stated elements of taxes and others are required to be shown separately and distinctly. The University will provide **Custom duty** and **Central Excise duty exemption certificate** in terms of Government notification No 51/96-Customs dated 23-07-1996 and 10/97-Central Excise dated 1-03-1997 respectively. Further, the University will also provide Certificate under SRO 129 of 2012, if applicable, for exemption of **State Entry tax** on scientific instruments.

13. **Office:** The firm should have its office / authorized dealer / workshop / representative within Municipal limit of Jammu / Samba to provide service after sale and to furnish the addresses of service centre with telephone number along with technical bid. The firm not having authorized office / service centre at Jammu will be required to arrange the service / repair after sale and furnish the certificate to this effect.

14. **Supply:** The firm selected will be required to supply the equipments within the six weeks from the date of issue of purchase order.

15. **Validity of quotation:** All entries in the tender form should be legible and filled clearly. Any overwriting or cutting which is unavoidable shall be signed by the authorized signatory. The bid shall be valid for 90 (ninety) days from the date of opening.

16. Taxes deduction at source as per provision will be made by the University.

Chapter-II: Terms and conditions

17. In case the firm fails to supply the desired specification of equipments as per terms and conditions, the University reserves the right to place the order to the next higher bidder or outside agency and the difference of price will be recovered from the defaulter agency who has been awarded the initial order and this will be binding on the bidder.

18. The University does not pledge himself to accept the lowest quoted or any tender and reserve the right to accept the whole or any part of the tender or portion of the quantity offered and bidders shall supply the same / execute the order at the rate quoted by them.

19. **Rejection of tender:** The conditional tender, incomplete in any form, unfilled / unsigned bids, without required documents, EMD and cost of tender form (if downloaded form is used) shall not be accepted and on such bids any query / intimation will not be entertained. The tender documents are not transferable.

20. The committee may consider any bid, if feels that inadvertently certain required documents are not enclosed by the firm and the firm promises that the required documents obtained before the closing date of the tender will be furnished within stipulated time. The decision of the committee will be final in this regard.

21. **Specification:** The desired specifications and allied technical details are placed at Annexure-I, if required the same may be amended / up graded at the time of placing purchase order without increase in the quoted price. These are basic specifications; the firm may quote the same or higher specification as per enclosed annexure format only, without changing the specification and serial number. The committee may amend the specification and their decision will be final in this regard.

22. **Bid security / EMD:** The filled in tender form without requisite security bid / EMD and cost of tender form Rs. 1,000/- (*if the downloaded tender form is used*) will not be considered. **Both the DD (cost of Tender Form)/FDR (for EMDs) are to be drawn separately** favouring "Finance Officer, Central University of Jammu" payable at Jammu. The EMD of bidders will be returned without interest after finalization of the tender. EMD of Successful Bidder(s) will be returned after receipt of Performance Security. 10% of the cost of Purchase order will be Performance Security and will be either submitted by the L-1 in the form of Bank Guarantee or deducted by the University from the payment of Bill, in case bank guarantee is not supplied. The security bid / EMD amount is as follows:

ITEM NO.	EQUIPMENT / INSTRUMENTS	QUANTITY	EMD/ BID SECURITY
1.	Work Station Computer	3	20,000
2.	Desktop Computer (i5)	20	20,000
3.	UPS : 2000VA, 230V	7	4,200
4.	Desktop Computer (i7)	5	6,000
5.	BACK-UPS 700VA 230V	25	1,500
6.	SERVER Computer -I	2	10,000
7.	SERVER Computer -I	2	20,000
8.	Magnetic Stirrer	20	20,000
9.	Rotary Evaporator	4	30,000
10.	Vacuum Pump	4	15,000
11.	Chiller	4	20,000
12.	Microwave Synthesizer	1	30,000
13.	Sonicator	1	5,000
14.	Melting Point Apparatus	3	2,000
15.	Autoclave	1	5,000
16.	Hot air oven	1	1,000
17.	Low temp. bath with built in magnetic stirring	3	8,000
18.	Oil free Diaphragm (PTFE) vacuum pump	4	20,000
19.	Refrigerator	2	1,000
20.	Ice Flaking Machine	1	3,000
21.	Monitor	7	500
22.	CONDUCTIVITY METER	3	1,500
23.	DIGITAL POTENTIOMETER	3	1,500
24.	COLORIMETER	3	1,500
25.	PH METER	3	1,500

Note: EMD for each equipment mentioned above is to be paid collectively (in case a bidder desires to bid for all items) or separately (in case a bidder desires to bid for few or any of the items).

23. **Company profile:** The bidders must submit their company profile and must mention their make/model of the equipments which are offered to be supplied. A list of organizations / agencies to which furniture has been supplied may be furnished along with copies of supply order, with the technical bid.

24. **Experience:** Bidder should be original manufacturer / authorized dealer and should have minimum Five years of experience in supply of similar equipments to Govt. / semi Govt. / PSU / reputed organisation. A certified copy of the same should be attached with the technical bid.

25. **Warranty:** All the equipments should be with onsite comprehensive warranty for minimum period of one years (or as per OEM warranty period, whichever is later) after satisfactory installation and agreed by the University. The firm should repair / replace the faulty items free of cost during the warranty period.

26. **Payment terms:** No advance payment will be considered. The payment will be release in Indian rupees in the following orders:

- (i) **90% payment of purchase order:** After 100% supply & installation of equipments, subject to certification by the University.
- (ii) **10% payment of purchase order / security deposit:** After availing the warranty period plus one month or on receipt of Bank Guarantee of any nationalized bank of equal amount for a period of warranty plus one month.
- (iii) The purchase order may be placed in phase manner and the payment may be considered phase wise.

27. **Quantity:** The quantity mentioned in the tender document can increase or decrease without changing the quoted price at the discretion of the University and the decision of the University shall be final in all respect. This is a tender cum rate contract and registration of suppliers initially for a period of one year and the item offered in the tender can be re-ordered at the same rate, terms & conditions within a period of twelve (12) months extendable by next year mutually agreed by both the parties.

28. **Management services:** The firm would be required to provide the management / consultation services etc. in respect of the equipments to establish any labs / hall, free of cost as and when required. The firm would provide consultancy to CUJ on Products & technologies that would provide more efficiency in working. The firm should also share best practices adopted in the industry free of cost.

29. **Rights of the University:** The University reserves all the rights to reject or accept any tender without assigning any reason or cancel or withdraw the tender notice in part or full. The University reserves the right to accept or reject any bid, and to annual the bidding process and reject all bids at any time, without thereby incurring any liability to the affected bidder or bidders of the ground for such action.

30. Late submission of tenders shall not be accepted. If the tenders are sent by post / courier, it should be ensured that cover should be intact at the time of reaching destination without any damage or loss. The University is not responsible for any delay on account of postal / courier services.

31. **Acceptance of terms and conditions:** The bidder shall sign and stamp each page of this tender document and all other enclosures appended to it as a token of having read and understood the terms and conditions contained therein and submit the same along with the bid. The bidder would fill up the information in the Annexure enclosed at the end of this document at Chapter-III in clear and legible terms. Annexure shall also have to be signed and stamped by the bidder or its authorized signatory.

32. **Termination of contract:** If supply of equipments / instruments is not found satisfactory, the purchase order will be cancelled by the University at any stage. The University reserves the right to decrease or increase the quantity at the time of placing the work order; the firm will undertake the same at the quoted rates.

33. The firm should attend all the calls in respects of the fault, efforts should be made to rectify the major fault within 48 hours. The firm is to provide one single point of contact for effective communication to book the fault for users to seek timely support.

34. The University may procure certain equipments offered under DGS&D rate contract, the firm may quote for both DGS&D and Non DGS&D rates, if available. The University will procure the equipments on lowest quoted (L-1) basis from the shortlisted firms on item wise and the firm can quote for any items or all the items, the University decision will be final in this regard. If the University procures certain items under DGS&D rate contract, the firm will be required to set / configure the supplied equipments technically on other equipments.

35. **Penalty clause:** The supply and installation of equipments / instruments has to be completed within stipulated time period, in case of delay and the University is not satisfied with the stated reason, the University reserves the right to impose the penalty equivalent to 0.5% per week of the value of undelivered goods or unperformed services limited to a maximum of 10% value of the purchase order / left over cost. Once the maximum is reached, the University may consider termination of the contract / order without any notice and further serious action may be initiated.

36. **Settlement of dispute:** In case of any dispute, University Headquarter (Samba) will be the jurisdiction and the Registrar, Central University of Jammu, shall decide the issue and his decision will be final and shall be the binding on both the parties.

37. In case of any disagreement or dispute between the first party (i.e. Central University of Jammu) and the second party (i.e. agency) arising out of or due to the terms and conditions of contact agreement, the Central University of Jammu shall have the discretion for settlement of such disputes by appointing a sole arbitrator and the award so made by the arbitrator shall be final and binding on both the parties. Jurisdiction shall be Jammu courts only, for any dispute.



**Assistant Registrar
(Procurement)**

Central University of Jammu,

Place: Samba (J&K)

Date: 16th March, 2017

Encl: i) Annexure-I : Technical bid (13 pages)
ii) Annexure-II : Financial bid (12 pages)

TECHNICAL BID*(To be filled by the firm and to be submitted to CUJ in Technical Bid)*

Sl. No.	Particulars of the Company/Firm	Details (if yes, furnish certificate No.)	Appendix No. (attached in bid)
1	Name of the OEM/Firm / Agency:	M/s.	
2	Status of the Firm / Agency: (Proprietorship / Partnership / Joint Stock Co. etc)		
3	Name of the Proprietor / Partner / Director		
4	Address:	--	--
	a) Head Office		
	b) Office at Jammu:		
5	Phone, Mobile No., E-mail & website		
6	Documentary proofs of:	--	--
	a) Valid Registration with competent authority, certificate No.	Yes / No	
	b) Proof of incorporation	Yes / No	
	c) TIN / PAN No.	Yes / No	
	d) Income Tax Clearance Certificate	Yes / No	
	e) Valid Registration no.	Yes / No	
	f) Registration with Sale Tax and Service tax no	Yes / No	
	g) Number of Years Experience		
	h) Experience certificate, where the agency has supplied, installed, tested and commissioned similar Scientific/Lab equipments to other govt /reputed organizations.	Yes / No	
7	Earnest Money deposit details:	--	--
	a) Amount	Rs.	
	b) Name of the drawer and issuing bank		
	c) No. and date of bank draft/FDR/etc		
9	Details of demand draft/ FDR etc &	Rs.	
10	Any other Information		

TECHNICAL BID

Chapter-III: Technical bid (Items with specification): To be filled by the firm and to submit to CUJ along with the technical bid.

Sl. No	Equipments	Qty. Req. (Approx)	Make & model	Agreed by firm (Yes/No), If yes, Sl. No. of technical broacher/details enclosed)	EMD (DD No. & date)
1	<p style="text-align: center;">WORK STATION COMPUTER:</p> <p>Specifications CPU: Intel (R) Xeon (R) Processor E5-2650 v3/v4, 2.2 GHz or higher, 20 MB L3 cache or higher. Chip set and Motherboard: Intel C 602 chipset or better. In-build graphics card Memory: 32 GB DDR4 1600 Mhz or higher, expandable to 256 GB. Hard Disk Drive: 1x1000 GB SATA HDD at 7200 rpm upgradeable to 2 HDD or better. Storage Controller: SATA Controller RAID support 0 & 1. Keyboard : Standard Keyboard Mouse : Optical Scroll Mouse PCI Slots: 5 PCI/PCI Express including 2 PCI Express X 16 for Dual Graphics and TESLA Card support. Bays: Total 4 Bays (2 internal, 2 external) Ports : 5 USB 2.0, 2 USB 3.0, RJ-45, audio in, audio out, mic in. Cabinet : Mini tower Optical Drive : 8 X DVD writer or higher Networking features : Integrated 10/100/1000 Operating System : Linux OS Certifications : Red Hat or Suse Linux or Ubuntu Linux or Cent OS Applications: OEM certification for (a) Digital Content Creation (DCC), (b) Electronic Design Automation (EDA) and (c) Mechanical Computer Aided Design (MCAD) from OEM manufacturing Workstation shall be acceptable. Safety Certification : Power Supply : 230V +/- 10% single phase, 50 Hz AC Power Management : ACPI (Advanced Configuration and Power Management Interface) Bundle Software: System Health monitoring Tool available with H/W box. Security: Integrated panel lock or pad lock.</p>	03			20,000
2.	<p style="text-align: center;">DESKTOP COMPUTER</p> <p>Specification Intel Core i5 with Microsoft windows 8 (or higher) OS & 8 GB RAM Specification: CPU: Intel Core i5-4570, 3.2 GHz, 6 MB Cache or its higher version. Chipset : Intel Q8 series Chipset : Intel Q8 series or better Memory: 8 GB 1600 MHz DDR3 RAM with 32 GB Expandability.</p>	20			20,000

	<p>Hard Disk Drive : 500 GB 7200 rpm or higher</p> <p>Monitor: 47 cm or larger(18.5 inch or larger) TFT/LED Digital Colour Monitor TCO-05 certified Keyboard : 104 keys, standard.</p> <p>Mouse: Optical with USB interface.</p> <p>Bays: 4 Nos. or above. Ports : 6 USB Ports or more (at least 2 USB with 3.0),1</p> <p>Display port/VGA port, audio ports for microphone and headphone in front. k.</p> <p>Cabinet: Mini Tower/Tower. DVD ROM Drive : 8X or better DVD RW Drive</p> <p>Networking facility : 10/100/1000 on board integrated Network Port with remote booting facility remote system installation, remote wake up, TPM enabled 1.2 chip using any standard management software</p> <p>Operating System : Windows 8 Professional or higher preloaded, as specified, with Media and Documentation and Certificate of Authenticity</p> <p>OS Certifications: Windows 8 Pro. OS / Linux certification</p> <p>Power Management: Screen Blanking, Hard Disk and System Idle Mode in Power On, Set up Password, Power supply SMPS Surge protected.</p> <p>Preloaded Antivirus : Microsoft Security Essentials Software</p>				
3.	<p align="center">UPS : 2000VA, 230V</p> <p>Specifications:</p> <p>(a) Size & Dimension: 432mm x 85mm x 483mm (H x W x D) Output Power: 2K Watts / 2.0 kVA</p> <p>(b) Wave Form: Sine Wave</p> <p>(c) UPS Type: Line Interactive Segment: Office</p> <p>(d) Nominal Input Voltage of UPS: 230 V</p> <p>(e) Features: Audible alarms, Automatic internal bypass, Intelligent battery management, LED status indicators, Scalable runtime, Temperature-compensated battery charging.</p> <p>(f) Efficiency at Full Load : 88.0 %</p> <p>(g) Bypass: Built-in Bypass</p> <p>(h) Max Configurable Power (Watts) : 1.4 KWatts / 2.0 kVA</p> <p>(i) Nominal Output Voltage: 230V</p> <p>(j) Output Voltage Note : Configurable for 220 : 230 or 240 nominal output voltage</p> <p>(k) Typical recharge time: 3hour(s)</p> <p>(l) Expected Battery Life (years): 3 – 5</p> <p>(m) Control panel: LED status display with load and battery bargraphs and On Line : On Battery : Replace Battery : Overload and Bypass Indicators</p> <p>(n) Standard warranty:2 years repair or replace, optional on-site warranties available, optional extended warranties available</p>	7			4,200
4.	<p align="center">DESKTOP COMPUTER (I7)</p> <p>Specifications:</p> <p>Processor Make: Intel, Hard Disk: 1000 GB, Power Supply: 300 Watt, Internal Bays: 1 No, Cabinet: Tower, USB Port 2.0: 1 No, Type of RAM: DDR 3, RAM Speed: 1600 MHz , Power Efficiency: 85 %, External Bays: 1 No, USB Port 3.0: 2 No. or more, Processor: Intel® Core™ i7-7600 Processor, 2.4 GHz, 4MB cache or higher, Chipset: Intel H110, Graphics Type: Integrated, Graphics: 2, Operating System (Pre-Loaded):</p>	5			6,000

	Windows 10 Home Single Language, RAM Size: 8 GB, RAM Expandability: 16 GB, DIMM Slots: 2 No, Optical Drive: 1 No, Network Connectivity: 10/100/1000 on board Integrated Gigabit Port, Expansion Slots (PCI): 1 No, Expansion Slots (PCIe X 1): 1 No, Expansion Slots (PCIe X 16): 1 No, Serial Port: Available, Parallel Port: Available, Monitor Resolution: 1280x1024 PIXELS, Keyboard: Standard, Mouse: Optical, Speakers: Yes, ROHS Compliance: Yes, Warranty: atleast one year, Monitor Size:18.5 INCHES or higher, Processor Generation: 7th , VGA: Available, HDMI: Available, Display Port: Available, DVI-D: Available, DVI-I: Available, Monitor Certification: TCO 5.0				
5.	<p align="center"><u>UPS : 700VA 230V</u></p> <p>Specification</p> <p>(a) Output power capacity: 420Watts / 700VA (b) Max Configurable Power (Watts): 420Watts / 700VA (c) Nominal Output Voltage: 230V (d) Recharge Time: 6 Hr (s) (e) Wave Form: Sine Wave (f) UPS Type: Line Interactive (g) Segment: Home (h) Nominal Input voltage of UPS: 230 (i) Input Frequency: 47.63Hz (j) Battery type: Maintenance-free sealed Lead-Acid battery with suspended electrolyte : leakproof (k) Typical recharge time: ~ 6 hour(s) (l) Expected Battery Life (years): 2 - 4 (m) Standard warranty: 2 years repair or replace (n) Nominal Input Voltage: 230V (o) Interface Port(s): USB</p>	25			1,500
6.	<p align="center"><u>SERVER Computer -I</u></p> <p>Specifications: Processor Make: Intel, No. Of Processor: Two, Processor Core: Eight, Mounting Arrangement: Tower, CPU Configuration Or Higher: E5-2620 v4, 2.1 GHz with 20 MB L3 cache memory or higher, Chipset Or Better Compatible With CPU: Intel C600, Motherboard (OEM & Better Compatible With CPU): yes, PCI Slots (Express Gen 3.0 Min.): 6 Nos., Memory (min.): 16 GB ECC 2133 MHz DDR4 RAM, DDR4 RAM Upgrdate (Minimum): 512 GB, DIMM Slots (Minimum): 4 Nos, Hard Disk Drive (or Higher): 3 X 600 GB, Hard Disk Drive RPM With SAS (hot Plug Or Better): 10000 rpm, RAID Controller Caches (Minimum): 1000 MB, RAID Controller: SAS RAID Controller, RAID Controller Ports: 6G, Video Controller (support VGA Or Above Resolution): Yes, In-build graphics card: Yes, Keyboard: Standard 102 No. of Keys, Mouse, Optical Bays (min. 2 Internal Or More Hot Plug): 5, USB Ports (version 2.0/3.0): 4, Certifications, Compliance & Support By Windows, Red Hat Or Novell: yes, DVD ROM (or Better): 8x or better, Networking: Dual LAN (10/100/1000) Network Card With Asset Feature Tracking & Security Management, Remote Wake Up: yes, Power Management: Screen blanking, hard disk & system idle mode in power on, set up password, power supply surge protected, Redundant Power Supply: yes,</p>	2			10,000

8

	Redundant Fan: yes, Server Scalability To Be Achieved Within The Box & Without Adding Nodes Or Blades: yes, Declare Max. Power Consumption Of The System: 800 Watts, Server Main Supply: 230V, ±10%,50 Hz, RoHS Compliance: yes				
7.	<p align="center"><u>SERVER Computer -II</u></p> <p>Specifications: Processor Make: Intel, No. of Processor: Two, Processor Core: 12, Mounting Arrangement: Tower, CPU Configuration Or Higher: E5-2650 v4, 2.2 GHz with 30 MB L3 cache memory, 105 watt or equivalent rolled over next generation processor or higher, Chipset Or Better Compatible With CPU: Intel C600, Motherboard (OEM & Better Compatible With CPU): yes, PCI Slots (Express Gen 3.0 Min.): 4 Nos., Memory (min.): 64 GB ECC 1600 MHz DDR4 RAM, DDR4 RAM Upgradata (Minimum): 512 GB, DIMM Slots (Minimum): 4 Nos, Hard Disk Drive (or Higher): 3 X 600 GB, Hard Disk Drive RPM With SAS (hot Plug Or Better): 10000 rpm, RAID Controller Caches (Minimum): 512 MB, RAID Controller: RAID 5, RAID Controller Ports: 4, Video Controller (support VGA Or Above Resolution): Yes, In-build graphics card: Yes, Keyboard: Standard 101 No. of Keys, Mouse, Optical Bays (min. 2 Internal Or More Hot Plug): 4, USB Ports (version 2.0/3.0): 3, Certifications, Compliance & Support By Windows, Red Hat Or Novell: yes, DVD ROM (or Better): 8x or better, Networking: Dual LAN (10/100/1000) Network Card With Asset Feature Tracking & Security Management, Remote Wake Up: yes, Power Management: Screen blanking, hard disk & system idle mode in power on, set up password, power supply surge protected, Redundant Power Supply: yes, Redundant Fan: yes, Server Scalability To Be Achieved Within The Box & Without Adding Nodes Or Blades: yes, Test Report No., Date Of Test Report Covering Verification Of All Features & Functional Parameters & Environmental Tests Sequence: 1022, Declare SPEC Int_rate_base 2006 & Specfp_rate_2006 For 1,2,4,8 Processor As Applicable: SPEC INT_RATE_BASE 2006 - 56.9,SPECFP_INT_59.6, Declare Max. Power Consumption Of The System: 500 Watts, Details Of Benchmark Indices With Software & Diagnostic Software Used To Test Server: BENCHMARK - SPEC CPU 2006, Server Main Supply: 230V, ±10%,50 Hz, RoHS Compliance: yes</p>	2			20,000
8.	<p align="center"><u>Magnetic Stirrer</u></p> <p>(a) ceramic heating plate (b) Simultaneous digital display of target and actual temperatures via LCD display (c) Directly connection for a PT 1000 temperature sensor enabling a precise temperature control (included in delivery) (d) Elevated control panel for protection against leaking liquids. Pt100 external sensor with 1.5 meter (e) Hot Top indicator >> hot surface warning to prevent burns (f) Control accuracy in medium +/- 0,5 K (in combination with PT 1000) (g) Number of stirring positions: 1 (h) Speed range: 100-1500 rpm (i) Heating temperature range:50-500°C</p>	20			20,000

9.	<p align="center">Rotary Evaporator</p> <p>Rotary evaporator with latest technology built-up having following specifications:</p> <p>(a) Vertical condenser (b) Rotation speed: 20-280 rpm (c) Heating bath range: 20-180 deg. C with digital display, display: Numbers (d) Heating power: 1300-1400 W with a regulation precision of +/- 2 deg C. (e) Bath volume: 3-5 Liters, bath should be made up of stainless steel material, and should be insulated. (f) Evaporation flask: 50 mL-4 Liters (g) Operating voltage: 100-240 V (h) PTFE composite material should be resistant to chemicals for longer life. (i) All glass material should be stress relieved and made of Borosilicate 3.3 glass. (j) Motorized quick action jack for up-down movements (option should be there for lifting the flask in case of power failure. It should be automatically lifted and should control rotation/vacuum)</p>	4			30,000
10.	<p align="center">Vacuum Pump</p> <p>(a) 100% oil-free pumping ensures pure transfer, evacuation and compression (b) KNF stabilization system, allows high suction speed even in the low vacuum range (c) Version for slightly aggressive or corrosive gases and vapors (d) Maintenance-free, environmentally friendly and gastight (leakage rate approx. 6×10^{-3} mbar x l/s, not tested in serial production).</p>	4			15,000
11.	<p align="center">Chiller</p> <p>The chiller with latest technology built-up having following specifications:</p> <p>(a) Temperature range: -10 to 40 deg. C with digital display (b) Coolant: R 134a (c) Pump capacity: 3 l/min, 0.6 bar (d) Cooling capacity: 800 W at 15 deg C (e) Ambient temperature: 15 to 40 deg C</p>	4			20,000
12.	<p align="center">Microwave synthesizer</p> <p>a) Working volume: 10 ml (or less) to 120 ml (or more). At least 50 numbers of 10 ml (or higher) vessel, 10 number of 30ml vessel and 5 number of 120 ml (or more) vessel (for large scale reaction) should be provided with the instrument. The system should have facility to use different sizes of reaction vessels in microwave and the minimum reaction volume is atleast 0.5 ml. 100 numbers of snap caps should be provided if required. Different size of 100 numbers of magnetic stirring bars should be provided to perform reactions under stirring condition. b) Maximum operating pressure: 35 bar or higher with full pressure control. c) Temperature: 260 °C or higher. d) Power: Focused power output of 300 watts or higher. e) Option for reaction at reflux condition: The system should</p>	1			30,000

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	<p>be capable of performing reaction at reflux condition using open vessel (particularly for large scale reaction and under inert atmosphere) as well as reaction under pressurize condition in small sized vessel. Two numbers of necessary condensers (for refluxing condition) and set-up (minimum 2 no.) for using inert gases should be provided with the system.</p> <p>f) Necessary accessories needed to clean the instrument in case of spillage should be quoted. The system should have proper facility for the user to clean the cavity in case of spillage.</p> <p>g) System should be equipped with pressure sensor. Automatic control of temperature and pressure by the programmed cycles. Auto cut option at high pressure.</p> <p>h) In-built magnetic stirring facility should be there in order to perform reaction under stirring condition.</p> <p>i) System should be equipped/provided with necessary software in order to control/adjust the power delivery.</p> <p>j) The system should be equipped with display option and keypad containing operating parameters. In addition to its stand-alone functioning capability, the system must have the option to be connected to the PC.</p> <p>k) Temperature controller: The system should have proper temperature monitor-controller.</p> <p>l) System should be modular and should have option for future upgradation such as peptide synthesizer, cryostat etc.</p> <p>m) Warranty: The system should carry three years comprehensive onsite warranty including all parts. The supplier should certify that the spares will be available at least for 4-5 year in future. Certificate for atleast 5 successful installation in India in last 2 years.</p> <p>n) All other necessary accessories should invariable be quoted for smooth functioning of the instruments.</p> <p>o) The system should be certified as capable of performing all types of common organic reactions.</p> <p>p) Power supply: 220-240V/ 50-60 Hz.</p> <p>q) The system should be capable of heating non-polar solvents or should be quoted with necessary accessories for heating non-polar solvents.</p> <p>r) Cooling of reaction vessels /vials by compressed air. Air compressor should be quoted (if needed) in order to provide cooling facility.</p> <p>s) The system should have Teflon spill cap tolerable at high temperature (up to 150 °C).</p> <p>t) The supplier will have to take care of onsite installation, demonstration and Training.</p> <p>u) Compatible PC/Laptop along with printer should be provided with the instrument in order to monitor reactions through PC/Laptop.</p>				
13	<p style="text-align: center;">Sonicator Probe-Type</p> <p>(a) The instrument should be versatile and should have the flexibility to cater for variable reaction volumes, variable amplitude and pulse modes.</p> <p>(b) Ultrasonic Power rating: 695 Watts or more.</p> <p>(c) Frequency: 20 kHz or more.</p>	1			5,000

	<p>(d) Operation: should be microprocessor based.</p> <p>(e) Amplitude control: from 10% or less to 100 % in increments of 1% or less.</p> <p>(f) Pulse mode: with pulse duration of 1 second or less to 9 hours or more in increments of 1 s or less.</p> <p>(g) Timer: Programmable timer up to 10 hours or more.</p> <p>(h) Programmability: Should be programmable to run multiple programs in sequence. 10 programming sequences or more.</p> <p>(i) Display: Real time digital display for total energy output, timer etc.</p> <p>(j) Protection: Should have overload protection.</p> <p>(k) Certification: All parts and the assembly thereof should be CE compliant.</p> <p>(l) Auto tuning: Instrument should constantly monitor frequency changes (if any) in the converter and tip assembly and automatically tune frequency. Should have touch screen control.</p> <p>Accessories</p> <p>(m) Sound Proof Box made up of corrosion resistant durable materials, with transparent windows to see the reaction.</p> <p>(n) Jack stand to be used inside the sound proof box.</p> <p>(o) High intensity horn with a threaded end for processing 10 ml or less to 250 ml or more.</p> <p>(p) Microtip made of inert and durable materials such as titanium, sapphire etc. for processing volumes of 200 µl or less and 5 ml ore more.</p> <p>(q) All necessary accessories such as wrenches, power cables, converter cables etc. should be quoted.</p> <p>Optional accessories</p> <p>(r) Temperature probe and feedback control using temperature probe.</p> <p>(s) Microtip made of inert and durable materials such as titanium for volumes of 5 ml or less to 50 ml or more.</p> <p>(t) Microtip made of inert and durable materials such as titanium for 25 ml or less to 500 ml or more.</p> <p>(u) Microtip made of inert and durable materials such as titanium for 200 µl or less to 5 ml or more.</p> <p>(v) Microtip made of inert and durable materials such as titanium for 50 ml or less to 1000 ml or more.</p> <p>(w) Available Input power: 220 V one phase/three Phase, 50 Hz.</p> <p>(x) The quoted system should be certified as complete for carrying out the following experiments:</p> <p>(y) Cell disrapture, dispersing materials including nanomaterials such as carbon nanotubes, metal nanoparticles etc. Preparation of nanoparticles using ultrasonic cavitation. All necessary accessories must be included in the quotation.</p> <p>(z) Three year on-site extended warranty on all parts.</p> <p>(aa) AMC should be quoted as optional.</p>				
14.	<p style="text-align: center;"><u>Melting point Apparatus</u></p> <p>(a) Temperature range: ambient to 360 °C or more</p> <p>(b) Temperature resolution: 0.1 °C or less.</p> <p>(c) Temperature accuracy: ± 0.5 at 20 °C or better, and ± 1 at</p>	3			2,000

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	<p>360 °C or better.</p> <p>(d) Ramping Rate: 0.5 °C to 10 °C or better.</p> <p>(e) Cool down time 360°C to 50 °C in approx. 10 minutes or better.</p> <p>(f) Supply voltage, current and frequency: compatible to Indian conditions.</p> <p>(g) Display: Digital.</p> <p>(h) Language: English.</p> <p>(i) No. of samples: 3 or more simultaneously.</p> <p>(j) All other necessary accessories should be quoted.</p> <p>(k) The equipment should have CE compliance.</p> <p>(l) Three year onsite extended warranty.</p> <p>(m) AMC should be quoted as optional.</p>				
15	<p style="text-align: center;"><u>Autoclave Specifications</u></p> <p>(a) Capacity: 120-150L</p> <p>(b) Model: Fully Automatic</p> <p>(c) Chamber type: Front Loading</p> <p>(d) Timer: 0-10hr</p> <p>(e) Pressure: 2.0 Kg/ cm² at 130 °C</p> <p>(f) Pressure gauge: 0-4 Kg/ cm²</p> <p>(g) Temperature accuracy: ± 0.5 °C</p> <p>(h) Sterilization Temperature: Ambient 10 °C -120 °C</p> <p>(i) Sterilization time range: 0-9hours</p> <p>(j) Pressure resistance: Chamber pressure should resist 60 psi for safety</p> <p>(k) Material exterior: Epoxy resin powder coated steel</p> <p>(l) Display and program: LED/LCD to indicate working status of temp. & pressure</p> <p>(m) Pre-programmed cycle for liquid, solid, porous load and Vacuum leak and Bowie dick cycle</p> <p>(n) Alarms: Automatic shutdown with beep reminding after sterilization and recycle of operation is completed</p> <p>(o) Lid closing/opening: Pedal free system for lid closing</p> <p>(p) Safety features: Over temperature, Low level water limit, over current, auto release against over pressure</p> <p>(q) Safety valve for 20 psi with an extra safety valve for 25 psi, emergency cut-off switch</p> <p>(r) Door should not open if the chamber is pressurized</p> <p>(s) Baskets: 3 nos. Of baskets (Mesh/Perforated)</p> <p>(t) Operating voltage: 230 ±10VAC, 50 Hz</p> <p style="text-align: center;"><u>Other Important Requirements</u></p> <p>A control lockout to prevent a cycle starts when the door is not closed and locked. Steam pressure lock to prevent operator from opening if pressure exists in the chamber. After reaching normal temperature, door should be opened by a single switch mode, preferably Water auto fill for steam generation. Internal memory for documentation of ~500 sterilization cycles. Local Service Support should be within 72 hours of report.</p> <p style="text-align: center;">Additional features/accessories if any that can potentially increase the productivity and safety of the instrument should be quoted as optional items.</p> <p>The complete instrument and accessories excluding consumables should be under warranty for period of 3 years</p>	1			5,000

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	including two years of AMC from the date of installation.			
16.	<p style="text-align: center;"><u>Hot Air Lab Oven</u></p> <p>(a) Double walled inside of non-rustable Stainless Steel/Aluminum duly anodized, outside of mild steel, finished with stove enamelled. 2.5 gap between the walls is filled with blanket of high efficiency super mineral wool</p> <p>(b) The door is fitted with chromium plated brass hinges with a spring and roller type latch. Three heating elements made from the best quality nickel chromium wire are used on refractory supports.</p> <p>(c) Temperature range 50 °C - 250 °C controlled by a thermostat with an accuracy of 2-3° C</p> <p>(d) Air circulation fan for uniformity of Temperature.</p> <p>(e) 3 core wire and plug for use on 220 Volts A/C</p> <p>(f) Dimensions 605x605x905 mm</p>			
17.	<p style="text-align: center;"><u>Low Temp. Reaction Bath with Magnetic Stirrer with annular vacuum insulation for excellent temperature retention & Timer</u></p> <p>(a) For auto start/stop operation</p> <p>(b) Temp. control range: -80°C to -0°C</p> <p>(c) Temp. control accuracy: within $\pm 1.0^\circ\text{C}$</p> <p>(d) Temp. control: P.I.D. control</p> <p>(e) Magnetic Stirrer: 450W</p> <p>(f) Temp. setting, display: Digital, Membrane key switch,</p> <p>(g) Magnetic Stirring/Rotation range: 100 ~800rpm</p> <p>(h) Rotation Setting & Monitoring : Digital</p> <p>(i) Operation Time: Auto start & stop timed</p> <p>(j) Safety features: Overheat protector, Over-load relay for compressor, Breaker for electrical leakage and excess current, Sensor fault, Independent over temperature protector</p> <p>(k) Refrigerator: CFC free, Air cooled, output 300W/350W</p> <p>(l) Bath dimension: $\phi 180 \times 140\text{D}$ mm, 3.5L</p> <p>(m) Range of vessel size/dia: 50 - 300ml/ around $\phi 90$</p> <p>(n) Stirring motor: Speed control motor, Output 15W</p> <p>(o) Max. applicable bottle size: 300ml</p> <p>(p) Power consumption: 10.3A, 1.03kVA</p> <p>(q) Electricity: 220VAC, 50/60Hz</p> <p>(r) It should come complete with lid w/variable opening shutter, clamp sets for standard & small flasks</p>	3		8,000
18.	<p style="text-align: center;"><u>Oil Free Diaphragm (PTFE) Vacuum pump</u></p> <p>(a) Control range: 1050-0.1 mbar, 775-0.1 Torr</p> <p>(b) Measuring range: 1080-0.1 mbar, 810- 0.1 Torr</p> <p>(c) Thermal response: 0.07 mbar/k</p> <p>(d) Ambient temperature range: 10-40 with LCD display</p> <p>(e) Power Rating: minimum 4 W or best</p> <p>(f) Maximum pumping speed: 2.0 M³/H</p> <p>(g) GB ultimate vacuum: 4 mbar and 2 mbar without GB</p> <p>(h) Power draw: 160 VA</p> <p>(i) Venting connection: Hose nozzle for hoss 6-10 mm</p>	4		20,000

	(j) Able to pump corrosive gases, Should have digital vacuum controller and catchpot/exhaust condenser (500 ml or better), Provide PTFE tubing, fully automatic with precise vacuum control (k) Warranty: 3 year minimum				
19	Lab Refrigerator 300-350 liters (a) It should have internal light facility, frost free, spill proof, strong and adjustable shelves in freezer and refrigerator. (b) It should also have: 0 to -20 degree tem. range (c) Doors with shelves 10 year compressor warranty	2			1,000
20	Ice Flaking machine (a) Capacity of Ice Flake: 80 Kg/day or better (b) Storage bin: ABS Plastic (c) Storage Capacity (Kg.) 25 Kg or more (d) Cooling Method: Air (e) Working temp.: below 30°C (f) Noise level: ≤50 dB (g) Water Supply: 3/4 inch BSP (h) Power Supply: 220V/50Hz (i) Fully Automatic microprocessor control (j) Compact Design and low maintenance (k) Stainless Steel construction (l) Continuous Ice Flakes Output, No cubes (m) CFC free compressor (n) Noiseless operation (o) Overload protection and Full bin cut off sensor (p) Low water level detection (q) Wheels for easy mobility	1			3,000
21	Monitor (a) Display size : 21.6-inch (54.8 cm) diagonal and viewable image (b) Display type : Thin-Film Transistor LCD active matrix (c) Input terminal : HDMI connector, VGA connector (d) Viewing angle : Horizontal & Vertical viewing angle: 160 degrees (e) Resolution (H x V) : 1680 x 1050 @ 60 Hz or better (f) Power source - AC/DC adapter : Input rating: 100 to 240V , Frequency: 50~60Hz	7			500
22	CONDUCTIVITY METER (a) Type: Automatic μ C Based with Temperature Compensation (b) Measuring Mode: Conductivity ,TDS Temperature (c) Conductivity: 0.1 μ S to 200mS (d) TDS: 0.1ppm to 220ppt (e) Accuracy: Conductivity \pm 1% of FS \pm 1 Digit (f) TDS: \pm 0.5% of \pm 1 %Digit (g) Display: 7 Digit 7 Segment LED (h) Accessories: Conductivity Cell with cell constant 1&0.1 Temp Probe stand & Clamp (i) Printer: Yes	3			1,500
23	DIGITAL POTENTIOMETER (a) Type: Manual	3			1,500

	(b) Measuring Mode and Range: Millivolt 0to ± 1999mV (c) Resolution: 1mV (d) Polarity: Automatic (e) Input Impedance: 1011 Ohm (f) Polarization: 10µA for Metal to Metal Electrode (g) Stirrer: In built stirrer with manual speed control (h) Extra Features: HOLD Facility Accessories: (a) Platinum Reference (b) Electrode Clamp (c) Electrode (d) Stirrer Magnet				
24	COLORIMETER (e) Type: Manual (f) Measuring Mode: %T and Abs Concentration (by factor) and K factor (g) Display: 2 line 16 Character LCD (h) Wavelength Range: 0.1ppm to 220ppt (i) Accuracy: With 8 Optical Filter(400-700nm) (j) Resolution: 0.1%T,0.001 Abs Upto 1.999Abs(OD) (k) Memory: Data can be stored in Memory (l) Printer Port: Yes Accessories: i) 4 Test Tubes ii) 2 Glass Cuvettes	3			1,500
25	PH METER (a) Type: Automatic µC Based (b) Measuring Mode: pH ,Milli Volt(mv), temperature (c) Accuracy: ±0.02PH, ±1 Digit (d) Standard Calibration: 3 point Calibration (e) Calibration Backup: Yes (f) Milli Volt(mv): ±1 mv (g) Accuracy: ±1 Digit (h) Display : 7 Digit 7 Segment LED (i) Printer: yes (j) Calibration Backup: yes (k) Data Backup: No Accessories : (a) PH Electrode Temp, (b) Probes Stand (c) Buffer Tablet	3			1,500
Total amount of EMD		--	--	--	

1. I have carefully read and understood all the terms and conditions of the tender and here by convey my acceptance of the same.
2. The information / documents furnished along with the above application are true and authentic to the best of my knowledge and belief. I / We, am / are well aware of the fact that furnishing of any false information / fabricated document would lead to rejection of my tender at any stage besides liabilities towards prosecution under appropriate law.
3. **Declaration:** I hereby certify that the information furnished above is true and correct to the best of my / our knowledge. I understand that in case any deviation is found in the above

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statement at any stage, I / we will be blacklisted and will not have any dealing with the University in future.

4. The firm is not a black listed firm, if found at later date, my tender can be rejected, even after awarded.

Signature with date & Seal of the agency :
Name of the applicant :
Designation :



FINANCIAL BID

Chapter-IV: Financial bid: To be utilized by the bidders for quoting their prices of equipment/instruments items wise along with specification and to submit to Central University Jammu along in separate sealed envelope.

Sl. No	Equipments	Qty. Req. (Approx)	Make & model	Basic Cost* (per Unit)	Total Cost*
1	<p style="text-align: center;">WORK STATION COMPUTER:</p> <p>Specifications CPU: Intel (R) Xeon (R) Processor E5-2650 v3/v4, 2.2 GHz or higher, 20 MB L3 cache or higher. Chip set and Motherboard: Intel C 602 chipset or better. In-build graphics card Memory: 32 GB DDR4 1600 Mhz or higher, expandable to 256 GB. Hard Disk Drive: 1x1000 GB SATA HDD at 7200 rpm upgradeable to 2 HDD or better. Storage Controller: SATA Controller RAID support 0 & 1. Keyboard : Standard Keyboard Mouse : Optical Scroll Mouse PCI Slots: 5 PCI/PCI Express including 2 PCI Express X 16 for Dual Graphics and TESLA Card support. Bays: Total 4 Bays (2 internal, 2 external) Ports : 5 USB 2.0, 2 USB 3.0, RJ-45, audio in, audio out, mic in. Cabinet : Mini tower Optical Drive : 8 X DVD writer or higher Networking features : Integrated 10/100/1000 Operating System : Linux OS Certifications : Red Hat or Suse Linux or Ubuntu Linux or Cent OS Applications: OEM certification for (a) Digital Content Creation (DCC), (b) Electronic Design Automation (EDA) and (c) Mechanical Computer Aided Design (MCAD) from OEM manufacturing Workstation shall be acceptable. Safety Certification : Power Supply : 230V +/- 10% single phase, 50 Hz AC Power Management : ACPI (Advanced Configuration and Power Management Interface) Bundle Software: System Health monitoring Tool available with H/W box. Security: Integrated panel lock or pad lock.</p>	03			
2.	<p style="text-align: center;">DESKTOP COMPUTER</p> <p>Specification Intel Core i5 with Microsoft windows 8 (or higher) OS & 8 GB RAM Specification: CPU: Intel Core i5-4570, 3.2 GHz, 6 MB Cache or its higher version. Chipset : Intel Q8 series Chipset : Intel Q8 series or better Memory: 8 GB 1600 MHz DDR3 RAM with 32 GB Expandability.</p>	20			

	<p>Hard Disk Drive : 500 GB 7200 rpm or higher Monitor: 47 cm or larger(18.5 inch or larger) TFT/LED Digital Colour Monitor TCO-05 certified Keyboard : 104 keys, standard. Mouse: Optical with USB interface. Bays: 4 Nos. or above. Ports : 6 USB Ports or more (at least 2 USB with 3.0),1 Display port/VGA port, audio ports for microphone and headphone in front. k. Cabinet: Mini Tower/Tower. DVD ROM Drive : 8X or better DVD RW Drive Networking facility : 10/100/1000 on board integrated Network Port with remote booting facility remote system installation, remote wake up, TPM enabled 1.2 chip using any standard management software Operating System : Windows 8 Professional or higher preloaded, as specified, with Media and Documentation and Certificate of Authenticity OS Certifications: Windows 8 Pro. OS / Linux certification Power Management: Screen Blanking, Hard Disk and System Idle Mode in Power On, Set up Password, Power supply SMPS Surge protected. Preloaded Antivirus : Microsoft Security Essentials Software</p>				
3.	<p style="text-align: center;">UPS : 2000VA, 230V</p> <p>Specifications:</p> <p>(a) Size & Dimension: 432mm x 85mm x 483mm (H x W x D) Output Power: 2K Watts / 2.0 kVA (b) Wave Form: Sine Wave (c) UPS Type: Line Interactive Segment: Office (d) Nominal Input Voltage of UPS: 230 V (e) Features: Audible alarms, Automatic internal bypass, Intelligent battery management, LED status indicators, Scalable runtime, Temperature-compensated battery charging. (f) Efficiency at Full Load : 88.0 % (g) Bypass: Built-in Bypass (h) Max Configurable Power (Watts) : 1.4 KWatts / 2.0 kVA (i) Nominal Output Voltage: 230V (j) Output Voltage Note : Configurable for 220 : 230 or 240 nominal output voltage (k) Typical recharge time: 3hour(s) (l) Expected Battery Life (years): 3 – 5 (m) Control panel: LED status display with load and battery bar-graphs and On Line : On Battery : Replace Battery : Overload and Bypass Indicators (n) Standard warranty:2 years repair or replace, optional on-site warranties available, optional extended warranties available</p>	7			
4.	<p style="text-align: center;">DESKTOP COMPUTER (I7)</p> <p>Specifications:</p> <p>Processor Make: Intel, Hard Disk: 1000 GB, Power Supply: 300 Watt, Internal Bays: 1 No, Cabinet: Tower, USB Port 2.0: 1 No, Type of RAM: DDR 3, RAM Speed: 1600 MHz , Power Efficiency: 85 %, External Bays: 1 No, USB Port 3.0: 2 No. or more, Processor: Intel® Core™ i7-7600 Processor, 2.4 GHz, 4MB cache or higher, Chipset: Intel H110, Graphics Type:</p>	5			

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	<p>Integrated, Graphics: 2, Operating System (Pre-Loaded): Windows 10 Home Single Language, RAM Size: 8 GB, RAM Expandability: 16 GB, DIMM Slots: 2 No, Optical Drive: 1 No, Network Connectivity: 10/100/1000 on board Integrated Gigabit Port, Expansion Slots (PCI): 1 No, Expansion Slots (PCIe X 1): 1 No, Expansion Slots (PCIe X 16): 1 No, Serial Port: Available, Parallel Port: Available, Monitor Resolution: 1280x1024 PIXELS, Keyboard: Standard, Mouse: Optical, Speakers: Yes, ROHS Compliance: Yes, Warranty: atleast one year, Monitor Size:18.5 INCHES or higher, Processor Generation: 7th , VGA: Available, HDMI: Available, Display Port: Available, DVI-D: Available, DVI-I: Available, Monitor Certification: TCO 5.0</p>				
5.	<p align="center"><u>UPS : 700VA 230V</u></p> <p>Specification</p> <p>(a) Output power capacity: 420Watts / 700VA (b) Max Configurable Power (Watts): 420Watts / 700VA (c) Nominal Output Voltage: 230V (d) Recharge Time: 6 Hr (s) (e) Wave Form: Sine Wave (f) UPS Type: Line Interactive (g) Segment: Home (h) Nominal Input voltage of UPS: 230 (i) Input Frequency: 47.63Hz (j) Battery type: Maintenance-free sealed Lead-Acid battery with suspended electrolyte : leakproof (k) Typical recharge time: ~ 6 hour(s) (l) Expected Battery Life (years): 2 - 4 (m) Standard warranty: 2 years repair or replace (n) Nominal Input Voltage: 230V (o) Interface Port(s): USB</p>	25			
6.	<p align="center"><u>SERVER Computer -I</u></p> <p>Specifications:</p> <p>Processor Make: Intel, No. Of Processor: Two, Processor Core: Eight, Mounting Arrangement: Tower, CPU Configuration Or Higher: E5-2620 v4, 2.1 GHz with 20 MB L3 cache memory or higher, Chipset Or Better Compatible With CPU: Intel C600, Motherboard (OEM & Better Compatible With CPU): yes, PCI Slots (Express Gen 3.0 Min.): 6 Nos., Memory (min.): 16 GB ECC 2133 MHz DDR4 RAM, DDR4 RAM Upgradata (Minimum): 512 GB, DIMM Slots (Minimum): 4 Nos, Hard Disk Drive (or Higher): 3 X 600 GB, Hard Disk Drive RPM With SAS (hot Plug Or Better): 10000 rpm, RAID Controller Caches (Minimum): 1000 MB, RAID Controller: SAS RAID Controller, RAID Controller Ports: 6G, Video Controller (support VGA Or Above Resolution): Yes, In-build graphics card: Yes, Keyboard: Standard 102 No. of Keys, Mouse, Optical Bays (min. 2 Internal Or More Hot Plug): 5, USB Ports (version 2.0/3.0): 4, Certifications, Compliance & Support By Windows, Red Hat Or Novell: yes, DVD ROM (or Better): 8x or better, Networking: Dual LAN (10/100/1000) Network Card With Asset Feature Tracking & Security Management, Remote Wake Up: yes, Power Management: Screen blanking, hard disk & system idle mode in power on, set up password, power</p>	2			

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	supply surge protected, Redundant Power Supply: yes, Redundant Fan: yes, Server Scalability To Be Achieved Within The Box & Without Adding Nodes Or Blades: yes, Declare Max. Power Consumption Of The System: 800 Watts, Server Main Supply: 230V, ±10%,50 Hz, RoHS Compliance: yes				
7.	<p align="center"><u>SERVER Computer -II</u></p> <p>Specifications: Processor Make: Intel, No. of Processor: Two, Processor Core: 12, Mounting Arrangement: Tower, CPU Configuration Or Higher: E5-2650 v4, 2.2 GHz with 30 MB L3 cache memory, <i>105 watt or equivalent rolled over next generation processor or higher</i>, Chipset Or Better Compatible With CPU: Intel C600, Motherboard (OEM & Better Compatible With CPU): yes, PCI Slots (Express Gen 3.0 Min.): <i>4 Nos.</i>, Memory (min.): <i>64 GB ECC 1600</i> MHz DDR4 RAM, DDR4 RAM Upgrade (Minimum): 512 GB, DIMM Slots (Minimum): 4 Nos, Hard Disk Drive (or Higher): 3 X 600 GB, Hard Disk Drive RPM With SAS (hot Plug Or Better): 10000 rpm, RAID Controller Caches (Minimum): 512 MB, RAID Controller: RAID 5, RAID Controller Ports: 4, Video Controller (support VGA Or Above Resolution): Yes, In-build graphics card: Yes, Keyboard: Standard 101 No. of Keys, Mouse, Optical Bays (min. 2 Internal Or More Hot Plug): 4, USB Ports (version 2.0/3.0): 3, Certifications, Compliance & Support By Windows, Red Hat Or Novell: yes, DVD ROM (or Better): 8x or better, Networking: Dual LAN (10/100/1000) Network Card With Asset Feature Tracking & Security Management, Remote Wake Up: yes, Power Management: Screen blanking, hard disk & system idle mode in power on, set up password, power supply surge protected, Redundant Power Supply: yes, Redundant Fan: yes, Server Scalability To Be Achieved Within The Box & Without Adding Nodes Or Blades: yes, Test Report No., Date Of Test Report Covering Verification Of All Features & Functional Parameters & Environmental Tests Sequence: 1022, Declare SPEC Int_rate_base 2006 & Specfp_rate_2006 For 1,2,4,8 Processor As Applicable: SPEC INT_RATE_BASE 2006 - 56.9,SPEC FP_INT_59.6, Declare Max. Power Consumption Of The System: 500 Watts, Details Of Benchmark Indices With Software & Diagnostic Software Used To Test Server: BENCHMARK - SPEC CPU 2006, Server Main Supply: 230V, ±10%,50 Hz, RoHS Compliance: yes</p>	2			
8.	<p align="center"><u>Magnetic Stirrer</u></p> <p>(a) ceramic heating plate (b) Simultaneous digital display of target and actual temperatures via LCD display (c) Directly connection for a PT 1000 temperature sensor enabling a precise temperature control (included in delivery) (d) Elevated control panel for protection against leaking liquids. Pt100 external sensor with 1.5 meter (e) Hot Top indicator >> hot surface warning to prevent burns (f) Control accuracy in medium +/- 0,5 K (in combination with PT 1000) (g) Number of stirring positions: 1 (h) Speed range: 100-1500 rpm</p>	20			

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	(i) Heating temperature range:50-500 ⁰ C				
9.	<p style="text-align: center;"><u>Rotary Evaporator</u></p> <p>Rotary evaporator with latest technology built-up having following specifications:</p> <p>(a) Vertical condenser (b) Rotation speed: 20-280 rpm (c) Heating bath range: 20-180 deg. C with digital display, display: Numbers (d) Heating power: 1300-1400 W with a regulation precision of +/- 2 deg C. (e) Bath volume: 3-5 Liters, bath should be made up of stainless steel material, and should be insulated. (f) Evaporation flask: 50 mL-4 Liters (g) Operating voltage: 100-240 V (h) PTFE composite material should be resistant to chemicals for longer life. (i) All glass material should be stress relieved and made of Borosilicate 3.3 glass. (j) Motorized quick action jack for up-down movements (option should be there for lifting the flask in case of power failure. It should be automatically lifted and should control rotation/vacuum)</p>	4			
10.	<p style="text-align: center;"><u>Vacuum Pump</u></p> <p>(a) 100% oil-free pumping ensures pure transfer, evacuation and compression (b) KNF stabilization system, allows high suction speed even in the low vacuum range (c) Version for slightly aggressive or corrosive gases and vapors (d) Maintenance-free, environmentally friendly and gastight (leakage rate approx. 6 x 10⁻³ mbar x l/s, not tested in serial production).</p>	4			
11.	<p style="text-align: center;"><u>Chiller</u></p> <p>The chiller with latest technology built-up having following specifications:</p> <p>(a) Temperature range: -10 to 40 deg. C with digital display (b) Coolant: R 134a (c) Pump capacity: 3 l/min, 0.6 bar (d) Cooling capacity: 800 W at 15 deg C (e) Ambient temperature: 15 to 40 deg C</p>	4			
12.	<p style="text-align: center;"><u>Microwave synthesizer</u></p> <p>a) Working volume: 10 ml (or less) to 120 ml (or more). At least 50 numbers of 10 ml (or higher) vessel, 10 number of 30ml vessel and 5 number of 120 ml (or more) vessel (for large scale reaction) should be provided with the instrument. The system should have facility to use different sizes of reaction vessels in microwave and the minimum reaction volume is atleast 0.5 ml. 100 numbers of snap caps should be provided if required. Different size of 100 numbers of magnetic stirring bars should be provided to perform reactions under stirring condition. b) Maximum operating pressure: 35 bar or higher with full pressure control. c) Temperature: 260 °C or higher.</p>	1			

	<p>d) Power: Focused power output of 300 watts or higher.</p> <p>e) Option for reaction at reflux condition: The system should be capable of performing reaction at reflux condition using open vessel (particularly for large scale reaction and under inert atmosphere) as well as reaction under pressurized condition in small sized vessel. Two numbers of necessary condensers (for refluxing condition) and set-up (minimum 2 no.) for using inert gases should be provided with the system.</p> <p>f) Necessary accessories needed to clean the instrument in case of spillage should be quoted. The system should have proper facility for the user to clean the cavity in case of spillage.</p> <p>g) System should be equipped with pressure sensor. Automatic control of temperature and pressure by the programmed cycles. Auto cut option at high pressure.</p> <p>h) In-built magnetic stirring facility should be there in order to perform reaction under stirring condition.</p> <p>i) System should be equipped/provided with necessary software in order to control/adjust the power delivery.</p> <p>j) The system should be equipped with display option and keypad containing operating parameters. In addition to its stand-alone functioning capability, the system must have the option to be connected to the PC.</p> <p>k) Temperature controller: The system should have proper temperature monitor-controller.</p> <p>l) System should be modular and should have option for future upgradation such as peptide synthesizer, cryostat etc.</p> <p>m) Warranty: The system should carry three years comprehensive onsite warranty including all parts. The supplier should certify that the spares will be available at least for 4-5 year in future. Certificate for atleast 5 successful installation in India in last 2 years.</p> <p>n) All other necessary accessories should invariably be quoted for smooth functioning of the instruments.</p> <p>o) The system should be certified as capable of performing all types of common organic reactions.</p> <p>p) Power supply: 220-240V/ 50-60 Hz.</p> <p>q) The system should be capable of heating non-polar solvents or should be quoted with necessary accessories for heating non-polar solvents.</p> <p>r) Cooling of reaction vessels /vials by compressed air. Air compressor should be quoted (if needed) in order to provide cooling facility.</p> <p>s) The system should have Teflon spill cap tolerable at high temperature (up to 150 °C).</p> <p>t) The supplier will have to take care of onsite installation, demonstration and Training.</p> <p>u) Compatible PC/Laptop along with printer should be provided with the instrument in order to monitor reactions through PC/Laptop.</p>				
13	<p style="text-align: center;">Sonicator Probe-Type</p> <p>(a) The instrument should be versatile and should have the flexibility to cater for variable reaction volumes, variable</p>	1			

amplitude and pulse modes.

- (b) Ultrasonic Power rating: 695 Watts or more.
- (c) Frequency: 20 kHz or more.
- (d) Operation: should be microprocessor based.
- (e) Amplitude control: from 10% or less to 100 % in increments of 1% or less.
- (f) Pulse mode: with pulse duration of 1 second or less to 9 hours or more in increments of 1 s or less.
- (g) Timer: Programmable timer up to 10 hours or more.
- (h) Programmability: Should be programmable to run multiple programs in sequence. 10 programming sequences or more.
- (i) Display: Real time digital display for total energy output, timer etc.
- (j) Protection: Should have overload protection.
- (k) Certification: All parts and the assembly thereof should be CE compliant.
- (l) Auto tuning: Instrument should constantly monitor frequency changes (if any) in the converter and tip assembly and automatically tune frequency. Should have touch screen control.

Accessories

- (a) Sound Proof Box made up of corrosion resistant durable materials, with transparent windows to see the reaction.
- (b) Jack stand to be used inside the sound proof box.
- (c) High intensity horn with a threaded end for processing 10 ml or less to 250 ml or more.
- (d) Microtip made of inert and durable materials such as titanium, sapphire etc. for processing volumes of 200 μ l or less and 5 ml or more.
- (e) All necessary accessories such as wrenches, power cables, converter cables etc. should be quoted.

Optional accessories

- (a) Temperature probe and feedback control using temperature probe.
- (b) Microtip made of inert and durable materials such as titanium for volumes of 5 ml or less to 50 ml or more.
- (c) Microtip made of inert and durable materials such as titanium for 25 ml or less to 500 ml or more.
- (d) Microtip made of inert and durable materials such as titanium for 200 μ l or less to 5 ml or more.
- (e) Microtip made of inert and durable materials such as titanium for 50 ml or less to 1000 ml or more.
- (f) Available Input power: 220 V one phase/three Phase, 50 Hz.
- (g) The quoted system should be certified as complete for carrying out the following experiments:
- (h) Cell disruption, dispersing materials including nanomaterials such as carbon nanotubes, metal nanoparticles etc. Preparation of nanoparticles using ultrasonic cavitation. All necessary accessories must be included in the quotation.
- (i) Three year on-site extended warranty on all parts.
- (j) AMC should be quoted as optional.

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14.	<p style="text-align: center;">Melting point Apparatus</p> <ul style="list-style-type: none"> (a) Temperature range: ambient to 360 °C or more (b) Temperature resolution: 0.1 °C or less. (c) Temperature accuracy: ± 0.5 at 20 °C or better, and ± 1 at 360 °C or better. (d) Ramping Rate: 0.5 °C to 10 °C or better. (e) Cool down time 360°C to 50 °C in approx. 10 minutes or better. (f) Supply voltage, current and frequency: compatible to Indian conditions. (g) Display: Digital. (h) Language: English. (i) No. of samples: 3 or more simultaneously. (j) All other necessary accessories should be quoted. (k) The equipment should have CE compliance. (l) Three year onsite extended warranty. (m) AMC should be quoted as optional. 	3			
15	<p style="text-align: center;">Autoclave Specifications</p> <ul style="list-style-type: none"> (a) Capacity: 120-160L (b) Model: Fully Automatic (c) Chamber type: Front Loading (d) Timer: 0-10hr (e) Pressure: 2.0 Kg/ cm² at 130 ° C (f) Pressure gauge: 0-4 Kg/ cm² (g) Temperature accuracy: ± 0.5 ° C (h) Sterilization Temperature: Ambient 10 ° C -120 ° C (i) Sterilization time range: 0-9hours (j) Pressure resistance: Chamber pressure should resist 60 psi for safety (k) Material exterior: Epoxy resin powder coated steel (l) Display and program: LED/LCD to indicate working status of temp. & pressure (m) Pre-programmed cycle for liquid, solid, porous load and Vacuum leak and Bowie dick cycle (n) Alarms: Automatic shutdown with beep reminding after sterilization and recycle of operation is completed (o) Lid closing/opening: Pedal free system for lid closing (p) Safety features: Over temperature, Low level water limit, over current, auto release against over pressure (q) Safety valve for 20 psi with an extra safety valve for 25 psi, emergency cut-off switch (r) Door should not open if the chamber is pressurized (s) Baskets: 3 nos. Of baskets (Mesh/Perforated) (t) Operating voltage: 230 ±10VAC, 50 Hz <p style="text-align: center;">Other Important Requirements</p> <p>A control lockout to prevent a cycle starts when the door is not closed and locked. Steam pressure lock to prevent operator from opening if pressure exists in the chamber. After reaching normal temperature, door should be opened by a single switch mode, preferably Water auto fill for steam generation. Internal memory for documentation of ~500 sterilization cycles. Local Service Support should be within 72 hours of report.</p> <p style="text-align: center;">Additional features/accessories if any that can potentially increase the productivity and safety of the instrument should be</p>	1			

	<p>quoted as optional items.</p> <p>The complete instrument and accessories excluding consumables should be under warranty for period of 3 years including two years of AMC from the date of installation.</p>				
16.	<p><u>Hot Air Lab Oven</u></p> <p>(a) Double walled inside of non-rustable Stainless Steel/Aluminum duly anodized, outside of mild steel, finished with stove enamelled. 2.5 gap between the walls is filled with blanket of high efficiency super mineral wool</p> <p>(b) The door is fitted with chromium plated brass hinges with a spring and roller type latch. Three heating elements made from the best quality nickel chromium wire are used on refractory supports.</p> <p>(c) Temperature range 50 °C - 250 °C controlled by a thermostat with an accuracy of 2-3° C</p> <p>(d) Air circulation fan for uniformity of Temperature.</p> <p>(e) 3 core wire and plug for use on 220 Volts A/C</p> <p>(f) Dimensions 605x605x905 mm</p>				
17.	<p><u>Low Temp. Reaction Bath with Magnetic Stirrer with annular vacuum insulation for excellent temperature retention & Timer</u></p> <p>(a) For auto start/stop operation</p> <p>(b) Temp. control range: -80°C to -0°C</p> <p>(c) Temp. control accuracy: within $\pm 1.0^\circ\text{C}$</p> <p>(d) Temp. control: P.I.D. control</p> <p>(e) Magnetic Stirrer: 450W</p> <p>(f) Temp. setting, display: Digital, Membrane key switch,</p> <p>(g) Magnetic Stirring/Rotation range: 100 ~800rpm</p> <p>(h) Rotation Setting & Monitoring : Digital</p> <p>(i) Operation Time: Auto start & stop timed</p> <p>(j) Safety features: Overheat protector, Over-load relay for compressor, Breaker for electrical leakage and excess current, Sensor fault, Independent over temperature protector</p> <p>(k) Refrigerator: CFC free, Air cooled, output 300W/350W</p> <p>(l) Bath dimension: $\phi 180 \times 140\text{D}$ mm, 3.5L</p> <p>(m) Range of vessel size/dia: 50 - 300ml/ around $\phi 90$</p> <p>(n) Stirring motor: Speed control motor, Output 15W</p> <p>(o) Max. applicable bottle size: 300ml</p> <p>(p) Power consumption: 10.3A, 1.03kVA</p> <p>(q) Electricity: 220VAC, 50/60Hz</p> <p>(r) It should come complete with lid w/variable opening shutter, clamp sets for standard & small flasks</p>	3			
18.	<p><u>Oil Free Diaphragm (PTFE) Vacuum pump</u></p> <p>(a) Control range: 1050-0.1 mbar, 775-0.1 Torr</p> <p>(b) Measuring range: 1080-0.1 mbar, 810- 0.1 Torr</p> <p>(c) Thermal response: 0.07 mbar/k</p> <p>(d) Ambient temperature range: 10-40 with LCD display</p> <p>(e) Power Rating: minimum 4 W or best</p> <p>(f) Maximum pumping speed: 2.0 M³/H</p> <p>(g) GB ultimate vacuum: 4 mbar and 2 mbar without GB</p> <p>(h) Power draw: 160 VA</p>	4			

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	<ul style="list-style-type: none"> (i) Venting connection: Hose nozzle for hose 6-10 mm (j) Able to pump corrosive gases, Should have digital vacuum controller and catchpot/exhaust condenser (500 ml or better), Provide PTFE tubing, fully automatic with precise vacuum control (k) Warranty: 3 year minimum 				
19	<p style="text-align: center;"><u>Lab Refrigerator 300-350 liters</u></p> <ul style="list-style-type: none"> (a) It should have internal light facility, frost free, spill proof, strong and adjustable shelves in freezer and refrigerator. (b) It should also have: 0 to -20 degree tem. range (c) Doors with shelves 10 year compressor warranty 	2			
20	<p style="text-align: center;"><u>Ice Flaking machine</u></p> <ul style="list-style-type: none"> (a) Capacity of Ice Flake: 80 Kg/day or better (b) Storage bin: ABS Plastic (c) Storage Capacity (Kg.) 25 Kg or more (d) Cooling Method: Air (e) Working temp.: below 30°C (f) Noise level: ≤50 dB (g) Water Supply: 3/4 inch BSP (h) Power Supply: 220V/50Hz (i) Fully Automatic microprocessor control (j) Compact Design and low maintenance (k) Stainless Steel construction (l) Continuous Ice Flakes Output, No cubes (m) CFC free compressor (n) Noiseless operation (o) Overload protection and Full bin cut off sensor (p) Low water level detection (q) Wheels for easy mobility 	1			
21	<p style="text-align: center;"><u>Monitor</u></p> <ul style="list-style-type: none"> (a) Display size : 21.6-inch (54.8 cm) diagonal or larger and viewable image (b) Display type : Thin-Film Transistor LCD active matrix (c) Input terminal : HDMI connector, VGA connector (d) Viewing angle : Horizontal & Vertical viewing angle: 160 degrees (e) Resolution (H x V) : 1680 x 1050 @ 60 Hz or better (f) Power source - AC/DC adapter : Input rating: 100 to 240V , Frequency: 50-60Hz 	7			
22	<p style="text-align: center;"><u>CONDUCTIVITY METER</u></p> <ul style="list-style-type: none"> (a) Type: Automatic μC Based with Temperature Compensation (b) Measuring Mode: Conductivity ,TDS Temperature (c) Conductivity: 0.1μS to 200mS (d) TDS: 0.1ppm to 220ppt (e) Accuracy: Conductivity\pm1% of FS \pm1 Digit (f) TDS: \pm0.5% of \pm1 %Digit (g) Display: 7 Digit 7 Segment LED (h) Accessories: Conductivity Cell with cell constant 1&0.1 Temp Probe stand & Clamp (i) Printer: Yes 	3			
23	<p style="text-align: center;"><u>DIGITAL POTENTIOMETER</u></p>	3			

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	<p>(a) Type: Manual (b) Measuring Mode and Range: Millivolt 0to \pm 1999mV (c) Resolution: 1mV (d) Polarity: Automatic (e) Input Impedance: 1011 Ohm (f) Polarization: 10μA for Metal to Metal Electrode (g) Stirrer: In built stirrer with manual speed control (h) Extra Features: HOLD Facility Accessories: (i) Platinum Reference (j) Electrode Clamp (k) Electrode (l) Stirrer Magnet</p>				
24	<p style="text-align: center;">COLORIMETER</p> <p>(a) Type: Manual (b) Measuring Mode: %T and Abs Concentration (by factor) and K factor (c) Display: 2 line 16 Character LCD (d) Wavelength Range: 0.1ppm to 220ppt (e) Accuracy: With 8 Optical Filter(400-700nm) (f) Resolution: 0.1%T,0.001 Abs Upto 1.999Abs(OD) (g) Memory: Data can be stored in Memory (h) Printer Port: Yes Accessories: iii) 4 Test Tubes iv) 2 Glass Cuvettes</p>	3			
25	<p style="text-align: center;">PH METER</p> <p>(a) Type: Automatic μC Based (b) Measuring Mode: pH ,Milli Volt(mv), temperature (c) Accuracy: \pm0.02PH, \pm1 Digit (d) Standard Calibration: 3 point Calibration (e) Calibration Backup: Yes (f) Milli Volt(mv): \pm1 mv (g) Accuracy: \pm1 Digit (h) Display : 7 Digit 7 Segment LED (i) Printer: yes (j) Calibration Backup: yes (k) Data Backup: No Accessories : (a) PH Electrode Temp, (b) Probes Stand (c) Buffer Tablet</p>	3			
26	<p>Add: Tax(es)</p> <p>VAT @.....</p> <p>Service Tax@.....</p> <p>Any other Tax (please Specify)@..</p>				
	Total Amount	--	--	--	

* The University will provide Custom duty and Central Excise duty exemption certificate in terms of Government notification No 51/96-Customs dated 23-07-1996 and 10/97-Central Excise

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*dated 1-03-1997 respectively. Further, the University will also provide Certificate under SRO 129 of 2012, if applicable, for exemption of **State Entry tax** on scientific instruments.*

1. I have carefully read and understood all the terms and conditions of the tender and hereby convey my acceptance of the same.
2. The information / documents furnished along with the above application are true and authentic to the best of my knowledge and belief. I / We, am / are well aware of the fact that furnishing of any false information / fabricated document would lead to rejection of my tender at any stage besides liabilities towards prosecution under appropriate law.
3. **Declaration:** I hereby certify that the information furnished above is true and correct to the best of my / our knowledge. I understand that in case any deviation is found in the above statement at any stage, I / we will be blacklisted and will not have any dealing with the University in future.
4. The firm is not a black listed firm, if found at later date, my tender can be rejected, even after awarded.

Signature with date & Seal of the agency :

Name of the applicant :

Designation :

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