### Technical Specification for "Autoclave: Steam Sterilizer with minimum 220 liter capacity"

- 1. Design: High Pressure High Vacuum Horizontal Cylindrical Sterilizer single door, automatic, suitable for operation on electricity.
- 2. Electric load: 20KW.
- 3. Capacity: minimum 200 liters.
- 4. The unit will have
  - a) Chamber and door plate made of stainless steel 316 quality,
  - b) Back plate and steam generator of stainless-steel argon-arc welded with tubular mild steel stand.
  - c) The jacket would be made of boiler quality steel.
- 5. The unit also would be incorporated with water ring vacuum pump to create vacuum of 24" when the temperature of cooling water to the pump is less than 30°C for total evacuation of the air from the chamber, thus allowing complete sterilization of the load in shortest possible time
- 6. Steam working pressure 2.1 Kg/cm<sup>2</sup> corresponding to working temperature of 134°C.
- 7. The Sterilizer would be incorporated with the following mountings and fittings:
  - a) Automatic with pre-selected programs and variable program
  - b) Self-sterilizing vacuum drier
  - c) One spring loaded safety valve and one vacuum breaker.
  - d) Chamber discharge line would consist of one plug screen, one swing check valve, one steam trap.
  - e) Automatic self-locking device The door would have automatic locking device when it is under pressure.
  - f) Stainless steel electric steam generator fitted with 3nos. 6KW heaters each, one low water protection and one automatic pressure controller, one air break contactor with on/off switch indicating lamps, gauge glass assembly for the steam generator would have 2nos. automatic shut off valves. The heaters would be mounted on a thick stainless steel plate.
  - g) The jacket would be insulated with glass wool and covered with stainless steel cover.
- 8. The sterilizer will be provided with SPECIAL type of COPPER SENSOR and other related accessories for boiler by which you can save the ELECTRIC and WATER consumption drastically and by which you can save the overall cycle time.
- 9. The unit would be provided with High Pressure Feed Water Pump for filling of water into the steam generator when under pressure with interconnecting piping etc.
- 10. The Heart of the system is PLC based microprocessor with the facility of HMI (Human-Machine-Interface) which is incorporated with the sterilizer.
- 11. The digital display at front panel will show the following parameters:
  - i. Chamber temperature
  - ii. Cycle no.
  - iii. Batch no.
  - iv. Time & Date
  - v. Alarm indicator
  - vi. Error display
  - vii. Low water indicator

- 12. Printer Printer that will automatically and continuously monitor and record dates, time of day, load, identification no. and operating parameters i.e., temperature and residence time, throughout the length of the autoclave cycles.
- 13. The unit would be manufactured as per ISI specifications and also would bear ISI certification Mark IS:3829(Part-II), ISO: 13485: 2016, CE certified.

#### Eligibility Criteria

- Bidder should be Manufacturer/ Authorized Partner/ Reseller of the manufacturer and a Letter of Authorization from manufacturer for the same and specific to the tender should also be enclosed. The bidder should also be the Authorized Service Provider.
- Bidder should be financially sound to execute the order. Certificate to this effect should be
  issued by any nationalized/ scheduled bank showing its annual turnover of at least 25Lakhs
  each in the last three financial years.
- The Bidder shall provide the Registration number of the firm along with the LST/ CST/ WCT No. and the PAN Number issued by the concerned authorities.
- The bidder should enclose similar orders provided to various reputed Government Institutes/Research labs/ICAR/CSIR institutes throughout India in the last 5 years.
- Separate technical and price bid should be uploaded.
- Technical Bid must contain a Technical Compliance sheet.
- Technical compliance sheet must have the page number of a published catalogue/operating manual/manufacture website as proof for compliance with the instrument and accessories for each technical point. Relevant copies of catalogue/operating manual/manufacture website pages that have been listed as proof should be attached.
- All vendors are requested to attach original technical literature/ catalogue in support of the mentioned specifications & highlight the above features. The same features should be available in the company website.
- Price Bids should contain the prices, terms of delivery, sales, payment terms etc.
- The bidder must not be blacklisted by Delhi University. A Certificate or undertaking to this
  effect must be submitted.

#### No Commitment to Accept Lowest or Any Tender

- Demonstration of the equipment will be required if needed.
- University of Delhi shall be under no obligation to accept the lowest or any other offer received in response to this tender notice and shall be entitled to reject any or all offers. University of Delhi will not be obliged to meet and have discussions with any vendor, and or to listen to any representations.

### Warranty /Comprehensive Maintenance

- Machine should be warranted for minimum 12 months from the date of installation.
- Warranty up to 5 years on the machine from date of installation after expiry of standard warranty should be quoted, year wise under optional items in the price bid.
- Installation and commissioning to be completed up to the satisfaction level of the technical purchase committee followed by training and handling by the bidders

# **Machines under buy back:**

### Autoclave: steam sterilizers with minimum 200-liter capacity

• Number of machines: 1-5

# **Price quotation**

- F.O.R. UDSC price only in INR to be quoted which includes transportation charges to site of installation. IGST/CDEC will be provided.
- Buyback price discount should be quoted separately.

- A performance bank guarantee for the entire duration of the warranty period must be submitted at the time of installation.
- Payment will be made against successful installation.

• Validity of the quotation should be till 10<sup>th</sup> December 2021.

Published Date: 23-10-2021 (10:00 Hrs)

Bid Document Download Start Date: 23-10-2021 (12:00 Hrs)

Bid Submission Start Date: 23-10-2021 (13:00 Hrs) Bid Submission End Date: 12-11-2021 (17:00 Hrs)

Bid Opening Date: 13-11-2021 (10:00 Hrs)

All the relevant documents related to tender can be found on CPPP portal

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