राष्ट्रीय आयुर्वेद वेक्टर जनित रोग अनुसंधान संस्थान
केन्द्रीय आयुर्वेदीय विज्ञान अनुसंधान परिषद, आयुष मन्त्रालय, भारत सरकार
नई राजीव नगर, पायकापुरम, विजयवाडा-५२००१५(आ.प्र.)
National Ayurveda Research Institute for Vector Borne Diseases
Central Council for Research in Ayurvedic Sciences, Ministry of Ayush, Govt.of India
New Rajiv Nagar, Payakapuram, Vijayawada-520 015 (A.P.), India
Ph.No.0866-2402535, 2401358, Tele-Fax: 0866-2402144, Email: narivbd.vijayawada@gmail.com.

TENDER DOCUMENT FOR PROCUMENT OF LABORATORY EQUIPMENTS/ITEMS

AT
National Ayurveda Research Institute for Vector Borne Diseases
Vijayawada

Tender No.: 1/2015, Dated: 23.01.2015

Date of Issue of Tender Document : From 27th January 2015

Last Date of Submission of Tender: 10th February 2015 up to 2.00 p.m

Date & Time of opening Tender : 10th February 3.00 p.m

Cost of Tender Document : Rs. 500/- (Non-Refundable) by the way of cash/ Demand Draft in Favor of " National Ayurveda Research Institute for Vector Borne Diseases, Payable at Vijayawada

Earnest money Deposit : 3% of approximate cost of tender

Period of validity of approved rates: 6 months from the date of accepting the tenders or till the supply is completed

Place of opening of bids : Conference hall, 3rd floor National Ayurveda Research Institute for Vector Borne Diseases, New Rajiv nagar, Payakapuram, Vijayawada

NOTICE INVITING TENDERS

Tender No.: 1/2015, dated 23.01.2015

Assistant Director in-charge, National Ayurveda Research Institute for Vector Borne Diseases (NARIVBD), Vijayawada invites Sealed Tenders in two – bid system from Reputed Manufacturers and authorized dealers/Suppliers for procurement of laboratory equipments/items.

Detailed Description and Term & Conditions of Tender Document may be seen and downloaded from CCRAS website www.ccras.nic.in or may be obtained directly from the Administrative section , 3rd Floor, NARIVBD, New Rajiv nagar, Payakapuram, Vijayawada on any working day from 27th January 2015 to 9th February 2015 from 10.00 Hrs to 17.00 Hrs on Payment of Tender Document Cost of Rs. 500/-(Non Refundable) in the form of cash or DD, drawn from any Nationalized Bank in favor of National Ayurveda Research Institute for Vector Borne Diseases, Payable at Vijayawada. Last date of submission of tenders is 10th February 2015 (Up to 14.00Hrs) in the Tender Box kept in the Administrative section of the Institute.

This tender document has schedules and appendices as follows

Annexure - I : List of equipments with approximate cost and EMD

Annexure - II : Information to Bidders

Annexure - III : Details of Bidder

Annexure - IV: Bidder Form

Annexure - V : Terms and conditions of the contract

Annexure - VI: Price bid format

Annexure - VII: Technical specifications of equipments

Annexure – VIII – Check list

Assistant Director in-charge

Annexure - I

List of equipments with estimated cost and EMD:

S.No	Name of the Item	EMD In Rs
1	Fully Auto Biochemistry Analyzer -1	24,000/-
2	Elisa reader and washer-1	9,000/-
3	Cell Counter -3 PART-1	12,000/-
4	Binocular microscope - 1	4,500/-
5	12 lead ECG Machine - 1	4,500/-
6	X-ray machine 1	12,000/-
7	CR System (Digital)-1	24,000/-
8	UV-Vis Spectrometor-1	9,000/-
9	Horizontal Laminar Flow-1	3,750/-
10	Centrifuge-12 tubes-2	1500/-
11	Lab Refrigerator (360 liters) -1	2400/-
12	Urine Analyser-1	3000/-

Assistant Director in-charge

Annexure – II

Information to Bidders

1. The services required, bidding procedures, bid form, contract terms and instructions are prescribed in the bidding documents. The bidder is expected to examine all the instructions, forms, terms and conditions, specifications, schedule to tender, and other documents before quoting. Failure to furnish all information required or submission of bid substantially responsive to the bidding documents in every respect will be at the bidder's risk and may result in rejection of its bid.
2. The tenders should be addressed to the undersigned in a sealed cover superscripted "Tender for supply of equipment/instruments". Unsealed tenders or tender which is not in the prescribed form will be rejected out – rightly.
3. Intending tender should send their tenders so as to reach the office on due date and time given in document. Tender received after the specified date and time will not be accepted on any account. Authorized supplier will attached along with tender a valid and authorization letter of original manufacturer that the equipment will be maintained by them. Tenders with price variation clause and /or subject to any condition are liable to be rejected.
4. The Tenderer may quote for anyone or all the items mentioned in the list in accordance with the manual and mechanical capacity and feasibility, the details of specification are given in Annexure VII.
5. The prescribed Performa Annexure –IV addressed to the undersigned should be sent in a sealed envelope superscripting, "Tender for Supply of Equipment/Instrument" not later than 2: 00 PM on 10.02.2015. The received tenders will be opened on same day at 3:00 PM in the presence of the Tenderer/ representatives as may wish to be present.
6. The arrangements that will be made on the result of the tender will be governed by the terms and conditions enclosed (Annexure -V).
7. The competent authority have right to accept or reject the tender whole or its part. His decision in the matter shall be final and binding.
8. The Submission of a tender shall be taken to signify your acceptance of the stipulated terms and conditions..
9. Any failure to observe the prescribed procedure and any attempt to canvass for the work will disqualify the tender to participate in the tendering process
10. The tender will be in force till the completion of the supply, the decision of the competent authority of the institute (in all these matters) shall be final and binding on the parties. The Contract can be terminated by the Institute at any time by giving one month's notice in writing without assigning any reason

11. SUBBMISSION OF BIDS

Sealing and Marking of Bids

The bidder must submit bid in two sealed envelopes as mentioned below:

Envelop No. 1:- Called "Technical Bid Envelop" containing:-

a) Earnest money deposit: The bids submitted without the EMD will be summarily rejected. No request as to submission of EMD at a later date will be entertained.

b) Documents established Bidders eligibility (Technical Bid)

The following documents should be submitted along with the Technical Bid in the Sequence mentioned below: Each Page will be duly signed and serially numbered. Corrections or overwriting duly attested.

i) Copy of valid Regional/State Sales Tax/IN registration certificate (Copy of the same to be attached)

ii) Details of Permanent Account Number(Copy of the same to be attached)

iii) Income Tax Clearance Certificate duly countersigned by ITO.

iv) A Valid Letter of authorization from the manufacturer to participate in this tender.

v) Detailed compliance statement for the item quoted with a clear 'complied' or 'Not Complied 'as per the specification.

vi) List of major spare parts to be submitted.

vii) Copy of CE/FDA approvals for the quoted products.

Envelop No 2: Called "Financial Bid Envelop" which shall contain duly filled prescribed Bid Form (Price Bid as per Annexure VII) containing the rates offered. Both the Technical Bid and Financial Bid Envelops shall be sealed separately and shall clearly indicate Envelop No.1 – Technical Bid "and Envelop No.2- Financial Bid "respectively. Both the sealed envelopes shall be kept in single envelop superscripting and shall be addressed to the Assistant Director In charge, National Ayurveda Research Institute for Vector Borne Diseases, New Rajiv Nagar, Payakapuram, Vijayawada – 520015 (A.P.).

Please write the Tender Notice No. on each Envelop and seal all the envelopes.

Annexure - III

Details of Bidder

S.No.	Required Details	
1	Name of the Bidder	
2	Address of the Bidder	
3	Contact No.	
4	Fax No.	
5	Mobile No.	
6	E mail	
7	Name of Authorized Signatory	
8	Sales Tax/CST No	
9	Income Tax No /PAN/ TIN/ GIR No.	
10	Details of latest income tax Returns certificate	
11	Year of Establishment of Bidder along with authorization letter from manufacturer stating that they will guarantee the after sales support	
12	Name and address of Banker along with AC.No. and IFSC code attested by the banker	
13	EMD Details DD No and date, Amount in rupees and Name of Bank	

Annexure - IV

BIDDER FORM

Name of Firm …….

Address ……..

……

To,

The Assistant Director in-charge
National Ayurveda Research Institute for Vector Borne Diseases
New Rajiv Nagar, Payakapuram
Vijayawada

Sub: Tender for supply of Laboratory Equipments/instrument

Sir,

I/We here by tender to undertake the supply of equipments/instruments under the annexed general conditions of contract, the whole of the items referred to and described in the attached specifications and schedule., or any portion thereof as may be decided by the the authority of the Institute as the case may be, at the rates quoted against each. The materials will be delivered within the time and at places specified.

1. Subject: Name of the item for which tender is given:
   Tender No. /

2. Full Name of the Tenderer ……
   ……..

3. Consignee Officer/ Institute Name : Assistant Director-in-charge, National Ayurveda Research Institute for Vector Borne Diseases, Vijayawada.

4. Amount of Tender document Rs. …….. have been deposited in Cash(TR NO Dated) D.D. No. …… dated …….

5. Income tax/Sales tax certificate enclosed- Yes/No

6. D.D. No. …….. dated ……. for Rs. …….. towards EMD drawn in favor of Assistant Director-in-charge, payable at Vijayawada has been deposited.

7. I/We abide by the Terms/Conditions as enclosed with Tender/Document and will not violate in any case.

Place Name of the Firm with Seal

Date Signature of the Tender

Annexure - V

TENDER NO. ……..

TENDER CONDITIONS

1. Sealed quotations are invited. The approximate cost or the item/items will be Rs. ……. The EMD @ …….. of the approximate cost of item Rs. …… is required to be deposited through D.D.drawn in favor of Assistant Director-in-charge, National Ayurveda Research Institute for Vector Borne Diseases payable at Vijayawada. Cheque/F.D.R. for this Amount is not acceptable. Without depositing proper EMD amount the tender will not be considered at all.

   The Tender can be deposited in this Institute on or before dated 10.02.2015 up to 14.00 hrs . Received Tenders will be opened on dated 10.02.2015 at 15.00 hrs (3.00 PM) in presence of representative /suppliers

2. The Tender document can be obtained from the Accounts Sections, NARIVD, Vijayawada on any working day between 10.00 AM to 5.00 PM by making payment Rs. 500 /- each in cash. The downloaded tender form cost Rs500 /- each in the shape of D.D. drawn in favour of Assistant Director-in-charge, National Ayurveda Research Institute for Vector Borne Diseases, payable at Vijayawada along with EMD amount, D.D. will have to be deposited separately. Failling which tender form will not be accepted.
3. Only real manufacturer or Authorized dealers possessing facilities of service and to change the spare parts etc. need to apply for which a certificate of the real manufacturer or authorized dealership is to be enclosed. Failling which tender will be cancelled.

4. Rate should be quoted by downloading the Form from the website or obtaining it from the institute as per specification and specification of the machine/item.

5. Tender document should be completed by ball pen and signed on each page by the Tenderer of the machine / item . Overwriting/Cutting etc. should be well attested by Tenderer.

6. The Institute reserve the right to forfeit the EMD in case of making any change by the tenderer in rates or/and in the conditions. In the event of any deviation in any of the conditions the loss occurred to this Institute will be made good by forfeiting security deposit and EMD so deposited by the Tenderer. In case the loss sustained is not made good by forfeiting security deposit/EMD the same can also be made good from any of the movable or immovable property of the Tenderer.

7. The rate should be quoted very clearly on the basis of measurement, number mark and make etc. including payment of all kinds of duties/taxes etc. The delivery has to be made to the Institute FOR. In case the tax/duty is required to be paid separately it should be indicated very clearly to arrive at the actual cost.

8. The Tenderer has to enclose with Tender, copy of PAN card/Income tax and Sales tax clearance certificate duly self attested. In the absence of same, the tender is liable to be rejected.

9. The goods/material has to be supplied within the stipulated period and time as indicated in the Purchase order. The institute will not be compelled to take delivery of the goods/material after expiry of the time limit and security deposit will be forfeited.

10. Delayed supply can be accepted by imposing 10% penalty of the cost of the equipment / item. The supplier cannot compel the Assistant Director-in-charge, NARIVBD, Vijayawada to reduce or ignore it as it will depend on the condition and decision taken by the Assistant Director-in-charge

11. Institute is not abide to purchase the goods even if the rates are minimum.

12. The Tenderer will be responsible for all kinds of breakage/pilferage etc. occurred to the machines / material during the course of supply of goods.

13. Assistant Director-in-charge, NARIVBD, Vijayawada reserves the right to accept or reject the tender partially or in totally without assigning any reason, thereof.

14. The rates are to be quoted as FINAL. No discount is to be shown separately.

15. Based on requirement the limits of purchase can be increased/decreased No argument in this connection from the Tenderer will be entertained. The payment will be made to successful Tenderer after deduction of 5% security amount from the bill and the same will be refunded after guarantee period.

16. EMD will be refunded to successful Tenderer after satisfactorily supply/installation and deducting 5% Security deposit from the bill.

17. The tender can be rejected for non performing satisfactorily /non supply of material.

18. Necessary TDS as per rules will be deducted from the bill presented by Tenderer for which photocopy of PAN card should be enclosed with tender document.

19. The quoted rates shall remain valid for a period not less than 180 days after the deadline fixed for submission of quotation.

20. Payment will be made after delivery of the goods/equipments and satisfactory installation of the equipment i.e. 30 days with in their acceptance through cheque/E-payment.

21. Notwithstanding the above, Assistant Director-in-Charge, NARIVBD, VIJAYAWADA reserves the right to accept or reject any quotation and to cancel the bidding process and reject all the quotations at any time and stage prior to awarding purchase order.

22. In order to make in E-payment the following information to be given in the quotation letter

    1. Name of the organization/supplier with full address.

    2. Name of Bank, Branch code with full address

    3. Account number and type of account

    4. IFSC Code (Indian Financial System Code)

    All kinds of disputes arising from either side sharing the course of supply/ transaction will be resolved in Vijayawada judicial territory

Assistant Director-in-charge

Annexure - VI

Price Bid Format

S.No	Name of equipment	Ex.Factory/ Ex.show room cost	Custom duty & Excise duty	CST against Form-D	Packing & Forwarding transportation	Incidental service	Total unit price	Quantity	Total Price

Name of the Bidder

Signature with Date

Seal

Annexure - VII

Specification for Fully Automated Biochemistry Analyzer

Sl. No	Name of Equipment	Specification	Remarks
1	**Fully Automated Biochemistry Analyzer** **Quantity-01**	➢ It should be automated, discrete, bench of random access clinical chemistry analyzer capable of performing biochemistry and immunoutubidimetry assays. ➢ The throughput should be at least 200 test/hr photometric test and 360/hr with ISE (Optional) ➢ It should have more than 45 on line chemistries. ➢ It should have minimum 95 photometric test and minimum 40 calculations items. ➢ It should be accept linear, Non-linear, Multi point calibration. ➢ Sample disk should accept minimum 37 samples at a time including 5 stat position more than 8 position should be available for blanks, control, standards and ISE solution in addition to sample position. ➢ It should accept 5ml, 7ml, 10ml and sample cups for keeping samples. ➢ Sample pipetting should be between 2-60 µl with increment of 0.2 µl ➢ The reagent tray should be cooled and should accept more than 45 reagent bottles. It should accept both 20ml and 50ml bottles. ➢ System should be capable of performing 2 Reagent chemistries. ➢ It should have barcode reader for both reagents and samples (optional). ➢ Reagent pipetting should be between 50-300 µl in steps of 1 µl. ➢ The reaction cuvettes should be more than 40 and made above disposable glass cuvettes ➢ The minimum reaction volume should be 180 µl -500 µl ➢ It should have on board washing of the probe. ➢ Photometer should consist of 8 filters. 340, 405, 450,505,546,578, 630 and 670nm. It should be capable for doing monochromatic and bichromatic measurements. ➢ Light source should be halogen Tungsten lamp. ➢ Absorbance should be 0.0-4.0 Abs. ➢ It should have extensive Q.C. program should show daily and monthly levy Jennings chart and should also have westgard rules. ➢ It should have facility of auto re run, auto dilution of sample facility, skipping of dirty cuvettes. ➢ Instrument should be run through computer. ➢ It should be supported by companies on roll service engineers based in Vijayawada City, A.P. ➢ Should have three year warranty .. ➢ Should be provided demonized water plant.	

		➢ Should be provided computer with printer (window 2008, SP2/SP3, RAM 4GB, HD 500GB & above Laser printer, LED Monitor) ➢ Should be provided capable online UPS. ➢ System should be US FDA Approved ➢ Company will provide reagents free to run 1-1kit pack all parameter .	

Specification of ELISA Reader and Washer

Sl. No	Name of Equipment	Specification	Remarks
2	**ELISA Reader and Washer** **Quantity-01**	**ELISA Reader** ELISA Reader is required to read the colour density known as Optical density (OD) in Enzyme Linked Immunosorbent Assay plates. ➢ Should have 96 wells and should have reading capability of 1 to 96 wells individually. ➢ Should provide accurate, reproducible and fast measurments ➢ Should have a linear measurement range of 0 to 3.000 Abs. ➢ Should have both single and dual wavelength reading option with facility for kinetic measurement ➢ Should have wavelength range from 400 to 750nm ➢ Machine should be supplied with 5 standard filters i.e.405, 450, 492,530,&620 nm and also have 3 ➢ open positions for future additions. ➢ Should have a photometric accuracy of ±3% or better. ➢ Should have a resolution of 0.001Abs and minimum resolution of 0.0001 O.D ➢ Should have in built variable speed plate shaking capability with selectable speed and time. ➢ Should have easy access 8 position filter wheel. ➢ Should have automatic calibration before each reading. ➢ Should have at least 6 second reading speed. ➢ Should have facility for storage of calibration curves. ➢ Capable of doing multi standard tests and controls. ➢ Should have different types of blanking facility like air wise and well wise i.e. flexible blank mode setting. ➢ Should be capable of reading all types of microwell plates with transparent bottom U, V and flat type wells ➢ Should be capable of reading 8 or 12 well strip plates. ➢ Can read end point & kinetic reactions. ➢ Should use LED based maintenance free, long life- light source or halogen lamp. ➢ Should have external printer connectivity option. Compatible with USB- printer (new USB interface) & ergonomic handling.	

		➢ Advanced model will be preferred. ➢ Memory back-up option should be provided for data management. Storage of immediately preceding measurements. At least 15 user programmable tests permanently stored. ➢ Able to use RS:232:C serial interface. ➢ Should work with input 200-240VAC, 50 Hz supply. **ELISA WASHER** ➢ Should have capability to wash flat, U or V bottomed micro plates or 8 or 12 well strip plates. ➢ Should have 8 or 12 way manifold. ➢ Should have 25 wash program memory or more. ➢ Should have easily programmable washing time, volume and soaking time. ➢ Should have large choice of washing methods which can be combined for most complex washing sequences. ➢ Should have continuous operating cycle. ➢ Should have minimum 6 wash cycle. ➢ Should have residual volume less than 6µl and despensable wash volume 50-300µl /well. ➢ Should have in-built vacuum and dispensing pumps to ensure accurate and quite washing. ➢ Should have removable and autoclavable plate carrier ➢ Should have waste bottle with full bottle alarm or sufficient mechanism to avoid spillage and damage to equipment ➢ Should have solution based wash buffer intake ➢ Should work with input 200 to 240Vac 50 Hz supply. ➢ Should provide aerosol shield for user safety and dust cover for both machines. ➢ Should have safety certificate from a competent authority CE / IVD/ FDA (US) Environmental Factor. ➢ The unit shall be capable of being stored /operated continuously in ambient temperature of 0-50oC and relative humidity of 15-90 %. Standards and safety Should be certified by CE-IVD / FDA / ISI /ISO. ➢ Documentation- -User /Technical /Maintenance manual to be supplied. ➢ Certificate of calibration and inspection from the factory. ➢ List of equipments available for providing calibration & routine maintenance support as per manufacturer ➢ Documentation in service / technical manual. ➢ Log book with instructions for daily, weekly, monthly and quarterly maintenance checklist. ➢ Comprehensive training for lab staff and support services till familiarity with the systems	

Specification of Cell Counter

Sl. No	Name of Equipment	Specification	Remarks
3	**Hematology Analyzer (Fully Automated) 3 Part** **Quantity-01**	Specifications for Automated 3- Part Differential Hematology Analyzer ➢ The instrument should be fully automated 3-part differential hematology analyzer offering automatic start-up, shutdown and sample-analysis. ➢ The instrument should be equipped with a hand held barcode reader. ➢ The system throughput should be 60 samples per hour in all analysis modes. ➢ The instrument should report minimum 20 Parameters in both Whole Blood and Prediluted Mode including, WBC, RBC, HGB, HCT, MCV, MCH, MCHC, PLT, LYM%, MXD%, NEUT%, LYM#, MXD#, NEUT#, RDW-SD, RDW-CV, PDW, MPV, PCT, P-LCR ➢ The system reproducibility should meet bellow requirements in Whole ➢ blood analysis mode. o Parameter CV (variation coefficient) o WBC 3.5% or less o RBC 2.0% or less o HGB 1.5% or less o HCT 2.0% or less o PLT 6.0% or less ➢ The instrument should have Cyanide free SLS-Hb /colorimetric method for the hemoglobin measurement. ➢ The instrument should be equipped with SRV (Sample Rotor valve) mechanism for precise alequoting of samples and dilutions. ➢ The sample volume for the complete differential blood count should not exceed 50µl in whole blood mode and 20µl in Prediluted mode. ➢ The system should have large color touch screen with intuitive graphic icons. ➢ The system should have both internal printer as well inbuilt port to print report on an external Dot Matrix/ Color printer. ➢ The instrument should have COMPREHENSIVE INFORMATION PROCESSING SYSTEM with: ➢ Data storage of 35,000 sample results including histograms ➢ Quality control 60 plots , for 6 files ➢ Online QC function with LAN port connectivity ➢ Facility to input Control information (lot number, expiry date, assay values) using a barcode reader. ➢ The system should offer following inbuilt Interface options: ➢ LAN (Ethernet for host computer/ Remote Service Access) ➢ Bar code reader (handheld) ➢ Serial port (for host computer/RS-232C)	

		➢ Graphic printer (option) ➢ Preferably to ensure economy as well as an effective reagent inventory management, the number of reagent types required to be connected to operate the system should not exceed 2 (excluding calibrators, controls and ancillary reagents that are not required for each sample analysis). ➢ To ensure reliability of reported results, Controls and calibrators required for the system should be manufactured by same Manufacturer of the instrument and should be available locally in the state (product brochure/ data sheet of controls and calibrators along with details of local distributor in the State should be provided). ➢ Manufacturer of the instrument should have a local office/ representative employee in India (details of Manufacturer office in India / representative employee in India in India should be provided). ➢ The company supplying the instrument should have installed at least 100 automated 3- part differential analyzers of same model/ make in India and at least 25 of same model/ make preferably in our state (list of 100 installations across India along 25 installations within the state should be provided). ➢ The company supplying the instrument should have a good track record in government / defense institutions and excellent service and distributor network across the our State (list of government / defense installations along with details of Local offices in State, local distributors and local engineering support staff in State should be provided). ➢ Should have three years warranty . ➢ Latest windows based software compatible LIS ➢ Company will provide reagents free to run 1500 test . ➢ System should be US FDA Approved for CBC. ➢ Should be provided Computer with printer. ➢ Appropriate compatible online UPS & printer should be provided with Analyzer	

Specifications for Binocular Microscope

Sl. No	Name of Equipment	Specification	Remarks
4	**Binocular Microscope with camera attachment** **Quantity-01**	**Binocular Microscope** Technical specification for Diagnostic Binocular microscope Head : Eyepiece – Wide field, 10X, with pointer, removable from eyepiece tube, Binocular view with 30° incline. Humidity and climate protection coating Eyepiece tube: 2- with variable diopter adjustment, Mechanical tube length: approx.160mm, 360° rotatable onto nosepiece Nosepiece – Reversed 4 hole nosepiece, 360° angle rotation onto the handle Body/Handle: Aluminium metal single cast, rust-free coating Objective lens : 4X, 10X, 40X(S), 100X(S) Infinitely corrected, parfocal, parcentric DIN PLAN achromatic optics with antifungal properties Humidity and climate protection coating Only imported lens are acceptable Mechanical stage: Built-in low positioned scratch-resistant mechanical stage with stage clips, with vernier calipers –X &Y axis and with right hand control. Stage lock-screw required. Condenser lens: Type – Abbe condenser, N.A. – 1.25 dry type Aperture iris diaphragm – built-in Filter holder with removable blue filter. Focusing: Coaxial coarse and fine adjustment (each graduation calibrated to 0.002mm) Stage height movement by roller guide (rock & pinion) Upper limit stopper Tension adjustable on coarse focus adjustment knob Illumination: Built in transmitted Kohler illumination. Bright LED illumination (with battery) 220-240V 0.85/0.45A 50Hz Power operation 100-240 V, 50-60 Hz, Universal voltage, SMPS circuit for constant voltage Adjustable light intensity regulator, detachable power cord ISO 9001 certification Camera attachment for photo documentation Warranty period – 3 years Demonstration of the microscope prior to selection is compulsory, failing which the product will not be considered. Regular and emergency service facilities should be available. Accessories : Microscope box (Temperature and humidity change resistant) Dust cover.	

Specifications for 12 lead ECG Machine

Sl. No	Name of Equipment	Specification	Remarks
5	**12 lead ECG Machine** **Quantity-01**	➢ 12 channels with interpretation is required for recording and analyzing the waveforms with special software. ➢ The ECG machine should be able to acquire all 12 Leads simultaneously and interpret them. ➢ Should acquire simultaneous 12 lead ECG for both adult and paediatric patients ➢ Should have real time colour display of ECG waveforms with signal qualify indication for each lead ➢ Should have Artifact, AC and low and high pass frequency filters. ➢ Should have a storage memory of minimum 30 ECGs ➢ Should have full screen preview of ECG report for quality assessment checks prior to print. ➢ Should have interpretation facility of the amplitudes, durations and morphologies of ECG waveforms and associated rhythm for adult and paediatric patient. ➢ Should have alphanumeric keyboard for patient data entry,virtual or hard keys. ➢ Should have High Resolution (200 dpix500dpi on 25 mm/sec speed) digital array A4 size printer using thermal sensitive paper. ➢ Should have report formats of 3x4; 6x2, Rhythm for up to selected leads, 12 lead extended measurement, 1 minute of continuous waveform data for 1 selected lead. ➢ Should have battery capacity of at least 30 ECG or 30 minutes of continous rhythm recording on single charge. ➢ Should be able to be connected to HHIS/LAN/Wireless LAN (Optional) ➢ Should have battery capacity of at least 30 ECGs or 30 minutes of continuous rhythm recording on single charge. ➢ Should display ECG on LCD/TFT display of 640x480 pixel resolution. ➢ USB support (optional) for storage on external portable memories. System Configuration accessories spares and consumables ➢ ECG Machine 12 leads with interpretation -01 ➢ Patient Cable -02 ➢ Chest Electrodes Adult (set of Six) - 02 sets ➢ Limb Electrodes (set of 4) – 02 sets ➢ Thermal paper A4 size for 500 patients	

		Environment factors ➢ The unit shall be capable of operating continuously in ambient temperature of 10-40 degree C and relative humidity of 15-90%. ➢ The unit shall be capable of being stored continuously in ambient temperature of 0-50degree C and relative humidity of 15-90%. ➢ Shall meet IEC-60601-1-2:2001 (or equivalent BIS) General requirements of safety of electromagnetic compatibility. Power Supply ➢ Power input to be 220-240 V AC, 50 Hz fitted with Indian plug ➢ Resettable over current breaker shall be fitted for protection. Standards and safety ➢ Should be FDA or CE approved product ➢ Electrical safety conforms to standards for electrical safety IEC -60601-1 General ➢ Requirements and IEC-60601-2-25 safety of Eletrocardiograms. (OR EQUIVALENT BIS standard) Documentation ➢ User manual in English. ➢ Service Manual in English. ➢ List of important spare part and accessories with their part number. ➢ Certificate of calibration and inspection from factory. ➢ Logbook with instruction for daily, weekly, monthly and quarterly maintenance ➢ checklist. ➢ The job description of the hospital technician and company service engineer should be clearly spelt out.	

Specification for 300 MA Digital X-ray Machine

Sl. No	Name of Equipment	Specification	Remarks
6	**300 MA X-Ray Machine** **Quantity-01**	➢ 300 MA & 125 KV, General purpose , full wave rectified diagnostic X Ray equipment for single tube operation , suitable for radiography of standing , sitting or recumbent patients as well as over couch &chest radiography with hand operated 5 position table. ➢ Radiographic voltage from 36 KV to 125 KV in 25 steps. electronic timer,exposure time min-10 ms to Max 5 secs.in 25 steps. ➢ LED display of MAS,MA & KV parameters. ➢ Immediate computation & display of MAS on control panel. ➢ Rapid braking of rotating anode(increases tube life) ➢ Space charge compensation ➢ Static balancer 50 KVA ➢ X RAY TUBE BEL DRA 1 125/20/40 Rotating anode X Ray tube. 1 pair of HT cables,8 m long. OTHER REQUIREMENTS: ➢ The company should be ISO certified ➢ The unit should be approved by AERB ➢ The company should have proven track record in GOVT.sector. ➢ Company should have well equipped service center in Vijayawada. ➢ Company should give in writing to provide services or break down calls within 48 hours Warranty: ➢ Warranty 2 (Two) Years. ➢ AMC/CMC 3 (Three) Years	

Specification for Digital Computed Radiography(CR) System

Sl. No	Name of Equipment	Specification	Remarks
7	**Computed Radiography(CR) System** **Quantity-01**	Technical Requirements – CR system configuration shall include: Imaging plates (IP) , Image reader system CR workstations, RIS interface Remote ID and Preview stations Accessories and consumables Laser Imager	
		CR Compatible imaging plates Following sizes are required – 35cm x 43 cm - 4 35cm x 35 cm - 2 24cm x 30 cm - 2 18cm x 24 cm - 1 15cm x 30 cm - 1	
		Image reader shall meet the Functional requirements : Various image – processing protocols available for the respective regions of body IP processing rate should be 60 plates / hour. Mechanism for Re-routing the newly acquired images to the preconfigured CR work station. Capability of retrieving (Service Intervention) at least last 10 scanned images, as part of contingency plan. Capability for quick check of the image and exam data of at least the last 4 Imaging Plates scanned at the X-ray room. Protocol for verifying the connectivity status of configured image destinations. Spatial resolution of the digital image shall preferably be 2k x 2k x 12 bits for optional resolution.	
		Identification and Preview System Functional Requirements: a) Capability of interfacing to HL7, Proprietary, DICOM Work list or user defined Windows/Linux based interface protocols to HIS/RIS. b) Please specify whether you have tested interfacing with HL7 – DICOM Bridge. c) Mechanism for retrieving Demographics of at least last 10 patients identified on a particular Identification Terminal. d) Customizable Graphic User Interface (GUI) in Identification station with facility of selecting DICOM print & storage destination. e) Indication of Over Exposure on the preview module. f) Mechanism for User release from Preview terminal in case of	

		Auto- routing Images to Pre-defined DICOM Destinations. g) Customizable Graphic User Interface (GUI) for Preview terminal. h) Solution for storing patient demographic data for multiple exams in RIS/non RIS environment. i) It should be possible to put a custom configurable data field in the demographic information of the patient linked with the image. Software System should include the following Software applications: Please list all the optional software(s) which are available with you for enhancing the workflow and service in the Digital Radiology environment for the following. Advanced Processing Software Application Software Connecting Software Visual Output Software Quality Monitoring Software. The system should include the following SW applications as standard: Full Leg/Full spine image processing. Quality control software Software, which enables to see in the preview terminal the deviation from normal exposure and with the details of the deviation on the CR workstation. Software masking of the collimation areas. Special attention should be placed on pediatric applications. Software for storing images on any DICOM 3 (or newer versions) compliant stations. Software for printing on any DICOM printer	
		CR Workstation System configuration requirements: Accept images from CR Reader without any loss of data Capable of Archiving & Printing selected images to a standard DICOM destination. Storing images in the local disk for pre-defined period. Mechanism for accepting New images when the local disk is full Should include 21” antiglare flicker free TFT/LCD color monitor Should include 21” Monochrome antiglare flicker free Medical Grade TFT/LCD Monitor with at least 2k x 2k resolution. CD/DVD Burner 80 GB or more on board storage System Functional requirements: Support DICOM work list or user defined Windows based interface to HIS/RIS. Mechanism for retrieving Demographics of atleast last 10	

		patient identified on that Terminal. Customizable Graphic User Interface with facility of selecting DICOM print & storage destination. Indication of Over Exposure on the preview module.	
		Mechanism for User release in case of Auto-routing Images to Pre-defined DICOM Destinations. Functional requirement for CR workstations: Built in routine for using predefined image processing parameters for image quality enhancement. Mechanism for storing the Patient image based on name, date, exam, etc. Capability of storing user defined image processing parameters. Capability of overwriting predefined image parameter with user-defined parameters & storing these two images separately. Correcting typographically in Patient Demographic module, in case the RIS connection was down and annually data entry was done. Capability of changing W/1, Flipping, Rotating, Zooming, Collimating Annotating incoming image. Auto-routing incoming image to predefined DICOM Store (SCP storage) or Print Destination (SCP Print Destination) Mechanism for printing Multiple Images in one film, with the possibility of slide and True Size printing. Capability of storing to CD Systems should be able to converse with other DICOM systems – such as MR work station / CT workstation / DSA lab / DR work station.	
		Laser Imager System Configuration requirements: Print Images CR Workstation Capable of Printing Images in DICOM 3.9 format Mechanism to print images 14x17, 11x14, 8x10 film sizes simultaneously. Resolution should be 500 dpi or more. Capable of handling mammography plates.	
		Functional requirement for Laser Imager: a) Capable of Printing images in High quality b) Mechanism for printing images in 14x17, 14x11, 10x8 film sizes. c) Mechanism for Printing Multiple Images in one film, with the possibility of slide printing.	
		Warranty for 3 years	

Specifications for UV Spectrophotometer

Sl. No	Name of Equipment	Specification	Remark
8	**UV-Vis Spectrophotometer** **Quantity-01**	Should be Double beam 1200L/mm optical system, two chambers quartz tubes fixed wave length range should 190-1100nm Fixed or variable slits Easily operative Online software application. Should be ESB data output parallel port for printing Auto sitting wave length 3 years Warranty.	

Specifications for Horizontal Laminar Flow Cabinet

Sl. No	Name of Equipment	Specification	Remarks
9	**Horizontal Laminar Flow Cabinet** **Quantity-01**	➢ Equipment shall be made of 0.8 gauge stainless steel 304 grade, of size 6x2x2 feet approximately with heavy duty lockable castor wheels. ➢ Filters shall be Mini pleat HEPA filter to block 0.3 µ & larger particles at an efficiency of upto 99.99% and washable pre filter to block coarse particles in the range of 1015 µM ➢ Work Table shall be made of SS 304 grade. ➢ Lighting shall be diffused white light. ➢ Pressure gauge shall be Magnehelic guage Dwyer. ➢ Should have Germicidal Ultra-violet Lamps. ➢ Should have cocks for LPG / Vacuum ➢ Front door shall be Vertically sliding Toughened Glass door with continous variable height adjustment provided by imported Drylin Guide Rail to prevent shakes. ➢ Motor-blower shall be designed for continous operation. ➢ Should have Air-flow 110 to 130 feet per min. ➢ Cleanliness level shall be better than Class 100. ➢ Should conduct onsite Testing & certification post-installation. ➢ Should operate on mains 220-240Vac, 50 Hz single phase.	

Specification of Centrifuge Machine

Sl. No	Name of Equipment	Specification	Remarks
10	**12 Tubes Centrifuge Machine** **Quantity-02**	➢ Table top, Multi purpose Laboratory Centrifuge ➢ 16 x 15 ml Swing Out Rotor Head with Metal carriers & tapered bottom Glass Tubes. ➢ Speed: Maximum 5,500 rpm (adjustable) Max. RCF 3950 X g. ➢ Speed control method:Automatic/Manual microprocessor controlled. ➢ Timer: 0 – 90 min with count down feature. ➢ Speed control: Fedher touch up / down arrow key type. ➢ Operation Keys: Fedher Touch Type. Memory Program: 20Nos. ➢ Display system: LCD display (16digit X 2 line) + ➢ Speed Safety control: Interlock Lid system during operation; Imbalance safety during rotation. ➢ Buzzer: ON after cycle operation. ➢ Brake: ON / OFF. ➢ Power supply: 240v, 50 Hz, singe phase ➢ Should have three years warranty.	

Specification of Laboratory Refrigerator

Sl. No	Name of Equipment	Specification	Remarks
11	**Laboratory Refrigerator 360 Littre** **Quantity-01**	➢ Refrigerator for duel use cooler cum freezer. ➢ Dual compartment machine configured as freezer in one and cooler in other. ➢ Two separate lids ensure independent access to freezer or cooler chamber. ➢ Easy to clean and maintain hygiene. ➢ Versatile wheels for easy movement and placement of unit. ➢ Cooling capacity 180 L and freezing capacity 180 L (approximately) ➢ Temp range cooler 0-10˚ C and temp range freezing < -18˚ C ➢ Dimension 1336 x 600 x 865 ➢ Should have thermostat and digital display. ➢ Should have three years warranty.	

Specification of Urine Analyzer

Sl. No	Name of Equipment	Specification	Remarks
12	**Urine Analyzer** **Quantity-01**	Technical Specifications for Urine Analyzer ➢ Tests Measured: 13 parameters: Leukocyte, Nitrite, Protein, Blood, Glucose, Ketone, Bilirubin, Urobilinogen, pH, Specific Gravity, Creatinine, Albumin-to-Creatinine Ratio, and Micro albumin. ➢ Throughput – minimum 50 samples per hour ➢ Onboard storage of minimum 500 results ➢ Sample Processing: Single or Batch mode sample processing ➢ Calibration & Measurement: Automatic Calibration with every strip & Automatic Measurement of Urine Colour & Clarity ➢ Test Measurement: Color change measured by reflectance photometry Dual readings at reactive and reference wavelengths Automatically adjusts for urine color ➢ Test Format: Dry Chemistry Regent Strips of 10 /13 Parameters. ➢ Sample ID Entry: Manual/ Bar code ➢ Equipment should have Internal Touch Screen / LED / LCD display, Barcode Reader, Thermal Printer. ➢ Equipment Should be supplied with latest model	

Annexure - VIII

CHECKLIST

Name of Tenderer:

S. NO	Activity	Yes/No/ NA	Page No. In TED	Remarks
1	Have you enclosed EMD of required amount for the quoted schedules?			
2	Have you enclosed clause-by-clause technical compliance statement for the quoted goods visà-vis the Technical specifications?			
3	In case of Technical deviations in the compliance statement, have you identified and marked the deviations?			
4	Have you kept validity of 180 days from the Techno Commercial Tender Opening date as per the TE document?			
5	Have you enclosed duly filled Tender Form as per format			
6	Have you enclosed Power of Attorney/ Authorisation in favour of the signatory?			
7	Have you submitted manufacturer's authorization			
8	Have you submitted the certificate of incorporation?			
9	In case of Indian Tenderer, have you furnished Income Tax Account No. as allotted by the Income Tax Department of Government of India?			
10	In case of Foreign Tenderer, have you furnished Income Tax Account No. of your Indian Agent as allotted by the Income Tax Department of Government of India?			
11	Have you intimated the name and full address of your Banker(s) along with your Account Number			
12	Have you furnished Annual Report (Balance Sheet and Profit & Loss Account) for last three years prior to the date of Tender opening?			
13	Have you submitted the Quality Control Requirements as per Proforma given the TE document?			
14	Have you accepted delivery period as per TE document?			
15	Have you accepted the terms of delivery as per' DDP at consignee site basis'?16 Have you accepted the warranty/CMC as per TE document?			
16	Have you accepted all terms and conditions of TE document?			
17	Have you fully accepted payment terms as per TE document?			
18	Have you submitted copy of the order(s) against the above end user certificate (s)?			