

TENDER ENQUIRY DOCUMENT
FOR PURCHASE OF
MEDICAL EQUIPMENT

FOR AND ON BEHALF OF
EMPLOYEE STATE INSURANCE CORPORATION
UNDER THE ADMINISTRATIVE CONTROL OF
MINISTRY OF LABOUR AND EMPLOYMENT
GOVT. OF INDIA

HLL/PCD/ESIC-84/11-12



BY

HLL Lifecare Limited

(A GOVT. OF INDIA ENTERPRISE & Formerly HINDUSTAN LATEX LTD.)

Procurement & Consultancy Services Division

B-14A, Sector-62, Noida-201 307, Uttar Pradesh, India

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SECTION I**NOTICE INVITING TENDERS (NIT)****For Tender from****HLL LIFECARE LIMITED**

(A GOVERNMENT OF INDIA ENTERPRISE)

Procurement & Consultancy Services Division

B-14A, Sector-62, Noida-201 307, Uttar Pradesh, India

Ph: 0120-4071500; Fax: 0120-4071513

Email: pcd@lifecarehll.com**1. Tender Enquiry No. HLL/PCD/ESIC-84/11-12****Date: 17.12.2011**

Procurement & Consultancy Services Division of HLL Lifecare Limited (Formerly Hindustan Latex Limited) have been contracted by Director General of Employee State Insurance Corporation (ESIC) to procure Medical Equipment for various ESI Hospitals, invite sealed tenders from eligible and qualified tenderers for supply of following Medical Equipment for **ESI Medical College and Hospital, Faridabad, Haryana.**

Sl. #	Item Description	Department	Qty	EMD Amount (Rs.)
1	Computerised Traction – Cervical & lumbar	Physiotherapy	1	4,000
2	Electrical Traction Cervical	Physiotherapy	1	4,000
3	E.M.G. machine	Physiotherapy	1	9,800
4	Hot packs with Hydroculator	Physiotherapy	1	1,000
5	Interferential therapy unit	Physiotherapy	1	4,000
6	Microwave diathermy	Physiotherapy	1	20,000
7	Paraffin wax bath	Physiotherapy	1	1,000
8	Short wave diathermy 500 watts	Physiotherapy	1	4,000
9	Transcutaneous nerve stimulator	Physiotherapy	1	2,000
10	Ultrasound with diff. head (4 sizes)	Physiotherapy	1	4,000
11	Examination couch	Physiotherapy	1	4,000
12	Cycle Ergo Meter	Physiotherapy	1	2,000
13	Treadmill with Odometer indicating time, speed, duration	Physiotherapy	1	6,000
14	Short wave diathermy 250 watts	Physiotherapy	1	4,000
15	Lithium analyser	Psychiatry	1	40,000
16	Bio-feed back instruments set	Psychiatry	1	8,400
17	Thin layer chromatography for drug dependence therapy	Psychiatry	1	6,000
18	ECT with EEG Monitoring	Psychiatry	1	10,000

Sl. #	Item Description	Department	Qty	EMD Amount (Rs.)
19	Dental unit comprising of: a) Dental chair with overhead delivery system, Air rotor, Micromotor Light cure, Ultrasonic Scaler 3 tips, 3 way syringe and contra 8 straight Hand pieces (Air rotor) (b) Compressor	Dental	3	67,200
20	Intra oral camera	Dental	2	8,000
21	RVG (Radio visual graphy)	Dental	1	12,400
22	IOPA X- ray unit	Dental	2	3,000
23	Bleaching light	Dental	1	1,000
24	Autoclave	Dental	1	10,500
25	Impedence Audiometer	ENT	1	8,000
26	Cryosurgical unit	ENT	1	12,000
27	ENT operating microscope with zoom & 5 step magnification changer	ENT	3	150,000
28	ENT Examination chair	ENT	8	96,000
29	Mastoid drill (Micromotor) with hand piece	ENT	3	18,000
30	Puretone Audiometer	ENT	1	10,000
31	Combined A & B Scan	Ophthalmology	1	18,000
32	Fundus Camera with digital imaging system	Ophthalmology	1	40,000
33	Lensometer with printer	Ophthalmology	1	2,000
34	Operating Microscope with TV unit & camera	Ophthalmology	2	240,000
35	Perimeter	Ophthalmology	2	36,000
36	Phacoemulsifier machine	Ophthalmology	2	44,000
37	Slit lamp Biomicroscope	Ophthalmology	3	99,000
38	Yag Laser - double frequency	Ophthalmology	1	44,000
39	Yag Laser -Single frequency (diode/excimer)	Ophthalmology	1	28,000
40	Non contact Tonometer	Ophthalmology	3	24,000
41	Autokerato Refractometer	Ophthalmology	1	9,000
42	Cryo-surgery unit	Dermatology	1	13,000
43	Dark field Microscope	Dermatology	2	20,000
44	Electro-cautery machine	Dermatology	1	10,000

Sl. #	Item Description	Department	Qty	EMD Amount (Rs.)
45	Phototherapy unit	Dermatology	1	1,000
46	Platelet agitator & incubator	Blood Bank	1	5,000
47	Automated Plasma thawing system	Blood Bank	1	8,000
48	Automatic component preparation machine	Blood Bank	1	24,000
49	Blood transportation box (Mobile)	Blood Bank	1	1,000
50	Blood bank refrigerator	Blood Bank	4	32,000
51	Blood collection monitor/ Haemomixer /biomixer	Blood Bank	3	18,000
52	Cell washer	Blood Bank	1	14,000
53	Centrifuge machine	Blood Bank	4	16,000
54	Dielectric Tube Sealer	Blood Bank	3	12,000
55	Donors couch	Blood Bank	3	36,000
56	Plasma expressor -manual	Blood Bank	1	1,000
57	Refrigerated Water bath for Plasma thawing	Blood Bank	1	2,000
58	Automated 5 part differential Haematology analyser With Reticulocyte count	Pathology	1	56,000
59	Centrifuge machine	Pathology(2) Biochemistry(6)	8	32,000
60	Deep Freezer (-20 °c to -40 °c)	Pathology(1) Blood Bank(2) Biochemistry(1)	4	14,000
61	Incubator 37 ⁰ c electric	Pathology(2) Blood Bank(2) Microbiology(6)	10	16,000
62	Refrigerated centrifuge	Pathology(1) Blood Bank(1) Microbiology(1)	3	12,000
63	Rotary Microtomes	Pathology	3	48,000
64	Auto urine analyser	Pathology	1	9,000
65	Auto cell counter 3 part	Pathology	2	16,000
66	Autoclave electric	Pathology	4	40,000
67	Automated 3 part differential Haematology analyser	Pathology	1	10,000
68	Automatic slide staining machine	Pathology	2	48,000
69	Automatic ESR Analyzer	Pathology	1	16,000
70	Cryostat with accessories	Pathology	2	36,000

Sl. #	Item Description	Department	Qty	EMD Amount (Rs.)
71	Distilled water still plant glass	Biochemistry(3) Microbiology(3) Pathology(2) Blood Bank(2)	10	40,000
72	Fully Automated coagulation analyser	Pathology	1	14,000
73	Hot Air 50 °c Oven for sp. Staining	Pathology(4) Biochemistry(4) Microbiology(2) Blood Bank(2)	12	48,000
74	Micro haematocrit centrifuge	Pathology	2	14,000
75	Microscope Binocular with oil immersion, condenser, movable stage (High end)	Pathology(25) Biochemistry(2)	27	208,000
76	Water bath 57 °c	Pathology	4	24,000
77	Automatic Tissue Processor	Pathology	2	32,000
78	Automatic Tissue Embedding Station	Pathology	1	24,000
79	B.O.D. Incubator with CO2	Microbiology	1	10,000
80	Binocular Research Microscope	Microbiology	2	6,000
81	Bio safety cabinet	Microbiology	2	32,000
82	Centrifuge high power electrical	Microbiology	5	15,000
83	Deep freezer (-20 °c)	Microbiology	2	7,000
84	Deep freezer (-80 °c)	Microbiology(1) Blood Bank(2)	3	45,000
85	Elisa reader with washer & dispenser, printer (1each for all)	Microbiology	4	40,000
86	Incubator for Lab	Microbiology	2	8,000
87	Laminar Air Flow- Horizontal	Microbiology	2	10,000
88	Vertical Autoclave	Microbiology	2	32,000
89	Water Bath	Microbiology	7	14,000
90	Flash/ Horizontal Autoclave	Microbiology	2	22,000
91	Autoclave electric (2 nos. of each size) a) 12" x12"(All chamber) Single valve b) 12" x 12" (S.S. chamber) Single valve c) 12"x20" (S.S. chamber) Double valve	Biochemistry	6	60,000
92	Automated Densitometer with Electrophoresis	Biochemistry	1	12,000
93	Fully automatic Biochemistry analyser	Biochemistry	1	60,000
94	Fully automatic Chemiluminescent analyser	Biochemistry	1	30,000

Sl. #	Item Description	Department	Qty	EMD Amount (Rs.)
95	Semi-automatic Biochemistry analyser	Biochemistry	3	6,000
96	Spectrophotometer	Biochemistry	1	30,000
97	Blood Gas Analyzer (Electrolyte Analyzer)	Biochemistry(2) Medicine(2) Cas(1) ICU(1) ICCU(1)	7	112,000

2. Tender No.: HLL/PCD/ESIC-84/11-12

Sl No.	Description	Schedule
i.	Dates of sale of tender enquiry documents	20.12.2011 to 26.01.2012, in all working days, during 10:00am to 4:00pm
ii.	Place of sale of Tender Enquiry Documents	HLL Lifecare Limited Procurement & Consultancy Services Divn. B-14A, Sector-62, Noida -201 307
iii.	Cost of the Tender Enquiry Document	Rs. 3,000.00/ USD 75.00
iv.	Time and date of Pre-bid meeting	05.01.2012, 11:00am (IST)
v.	Closing date & time for receipt of Tender	27.01.2012, 2:00pm. (IST)
vi.	Time and date of opening of Techno-Commercial tenders	27.01.2012, 2:30pm. (IST)
vii.	Venue for Pre-bid Meeting & Techno-Commercial Tender Opening	Same as given in 2 (ii)

- Interested tenderers may obtain further information about this tender from the office of Head (P&CD), HLL Lifecare Ltd., Noida. Tender Enquiry Documents may be purchased on payment of non-refundable fee of Rs. 3,000.00/ USD 75.00 per set in the form of account payee Demand Draft/Pay Order/Cashier's Cheque/Banker's Cheque, drawn on a scheduled bank in India, in favour of "**HLL Lifecare Limited**" payable at New Delhi.
- If requested, the Tender Enquiry Documents will be mailed by Registered Post/Speed Post to the domestic tenderers and by international airmail to the foreign tenderers, for which extra expenditure per set will be Rs 100.00 for domestic post and USD 50.00 for international airmail. The tenderer is to add the applicable postage cost in the non-refundable fee mentioned in Para 3 above. However, HLL Lifecare Ltd. shall not be responsible for any postal loss/delay.
- Tenderer may also download the tender enquiry documents from the web site www.esic.nic.in or www.lifecarehll.com and submit its tender by utilizing the downloaded document, along with the required non-refundable fee as mentioned in Para 3 above.
- All prospective tenderers may attend the Pre Tender meeting. The venue, date and time indicated in the Para 2 above
- Tenderers shall ensure that their tenders, complete in all respects, are dropped in the Tender Box located at **HLL Lifecare Limited, Procurement and Consultancy Division, B-14A, Sector-62,**

Noida -201307, Uttar Pradesh on or before the closing date and time indicated in the Para 2 above, failing which the tenders will be treated as late tender and rejected. The tenders sent by post/ courier must reach the above said address on or before the closing date & time indicated in Para 2 above, failing which the tenders will be treated as late tender and rejected.

8. In the event of any of the above mentioned dates being declared as a holiday / closed day for the purchase organisation, the tenders will be sold/received/opened on the next working day at the appointed time.
9. The Tender Enquiry Documents are not transferable.
10. All Tenders must be accompanied by EMD as mentioned against each item. Tenders without EMD shall be rejected.

Head (P & CD)
HLL Lifecare Limited,
Procurement and Consultancy Division
B-14A, Sector -62, Noida -201307,
Uttar Pradesh.

SECTION - II**GENERAL INSTRUCTIONS TO TENDERERS (GIT)****CONTENTS**

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A. PREAMBLE

1. Definitions and Abbreviations

1.1 The following definitions and abbreviations, which have been used in these documents shall have the meanings as indicated below:

1.2. Definitions:

- (i) "Purchaser" means the organization purchasing goods and services as incorporated in the Tender Enquiry document.
- (ii) "Tender" means Bids / Quotation / Tender received from a Firm / Tenderer / Bidder.
- (iii) "Tenderer" means Bidder/ the Individual or Firm submitting Bids / Quotation / Tender
- (iii) "Supplier" means the individual or the firm supplying the goods and services as incorporated in the contract.
- (iv) "Goods" means the articles, material, commodities, livestock, furniture, fixtures, raw material, spares, instruments, machinery, equipment, medical equipment, industrial plant etc. which the supplier is required to supply to the purchaser under the contract.
- (v) "Services" means services allied and incidental to the supply of goods, such as transportation, installation, commissioning, provision of technical assistance, training, after sales service, maintenance service and other such obligations of the supplier covered under the contract.
- (vi) "Earnest Money Deposit" (EMD) means Bid Security/ monetary or financial guarantee to be furnished by a tenderer along with its tender.
- (vii) "Contract" means the written agreement entered into between the purchaser and/or consignee and the supplier, together with all the documents mentioned therein and including all attachments, annexure etc. therein.
- (viii) "Performance Security" means monetary or financial guarantee to be furnished by the successful tenderer for due performance of the contract placed on it. Performance Security is also known as Security Deposit.
- (ix) "Consignee" means the Hospital/Dispensaries/Institute/Medical College/ person to whom the goods are required to be delivered as specified in the Contract. If the goods are required to be delivered to a person as an interim consignee for the purpose of despatch to another person as provided in the Contract then that "another" person is the consignee, also known as ultimate consignee.
- (x) "Specification" means the document/standard that prescribes the requirement with which goods or service has to conform.
- (xi) "Inspection" means activities such as measuring, examining, testing, gauging one or more characteristics of the product or service and comparing the same with the specified requirement to determine conformity.
- (xii) "Day" means calendar day.

1.3 Abbreviations:

- (i) "T E Document" means Tender Enquiry Document
- (ii) "NIT" means Notice Inviting Tenders.
- (iii) "GIT" means General Instructions to Tenderers
- (iv) "SIT" means Special Instructions to Tenderers
- (v) "GCC" means General Conditions of Contract
- (vi) "SCC" means Special Conditions of Contract
- (vii) "DGS&D" means Directorate General of Supplies and Disposals
- (viii) "NSIC" means National Small Industries Corporation

- (ix) "PSU" means Public Sector Undertaking
- (x) "CPSU" means Central Public Sector Undertaking
- (xi) "LSI" means Large Scale Industry
- (xii) "SSI" means Small Scale Industry
- (xiii) "LC" means Letter of Credit
- (xiv) "DP" means Delivery Period
- (xv) "BG" means Bank Guarantee
- (xvi) "ED" means Excise Duty
- (xvii) "CD" means Custom Duty
- (xviii) "VAT" means Value Added Tax
- (xix) "CENVAT" means Central Value Added Tax
- (xx) "CST" means Central Sales Tax
- (xxi) "RR" means Railway Receipt
- (xxii) "BL" means Bill of Lading
- (xxiii) "FOB" means Free on Board
- (xxiv) "FCA" means Free Carrier
- (xxv) "FOR" means Free On Rail
- (xxvi) "CIF" means Cost, Insurance and Freight
- (xxvii) "CIP (Destinations)" means Carriage and Insurance Paid up to named port of destination. Additionally the Insurance (local transportation and storage) would be extended and borne by the Supplier from ware house to the consignee site for a period including 3 months beyond date of delivery.
- (xxviii) "DDP" means Delivery Duty Paid named place of destination (consignee site)
- (xxix) "INCOTERMS" means International Commercial Terms as on the date of Tender Opening
- (xxx) "ESIC" means Employee State Insurance Corporation.
- (xxxi) "DG" means Director General of ESIC under the administrative control of Ministry of Labour and Employment
- (xxxii) "CMC" means Comprehensive Maintenance Contract (labour, spare and preventive maintenance)
- (xxxiii) "RT" means Re-Tender.

2. Introduction

- 2.1 The Purchaser has issued these TE documents for purchase of goods and related services as mentioned in Section – VI – "List of Requirements", which also indicates, *interalia*, the required quantity, delivery schedule, terms and place of delivery.
- 2.2 This section (Section II - "General Instructions to Tenderers") provides the relevant information as well as instructions to assist the prospective tenderers in preparation and submission of tenders. It also includes the mode and procedure to be adopted by the purchaser for receipt and opening as well as scrutiny and evaluation of tenders and subsequent placement of contract.
- 2.3 The tenderers shall also read the Special Instructions to Tenderers (SIT) related to this purchase, as contained in Section III of these documents and follow the same accordingly. Whenever there is a conflict between the GIT and the SIT, the provisions contained in the SIT shall prevail over those in the GIT.
- 2.4 Before formulating the tender and submitting the same to the purchaser, the tenderer should read and examine all the terms, conditions, instructions, checklist etc. contained in the TE documents. Failure to provide and/or comply with the required information, instructions etc. incorporated in these TE documents may result in rejection of its tender.

3. Deleted

4. Language of Tender

- 4.1 The tender submitted by the tenderer and all subsequent correspondence and documents relating to the tender exchanged between the tenderer and the purchaser, shall be written in the English language, unless otherwise specified in the Tender Enquiry. However, the language of any printed literature furnished by the tenderer in connection with its tender may be written in any other language provided the same is accompanied by a notarised English translation and, for purposes of interpretation of the tender, the English translation shall prevail.
- 4.2 The tender submitted by the tenderer and all subsequent correspondence and documents relating to the tender exchanged between the tenderer and the purchaser, may also be written in the Hindi language, provided that the same are accompanied by notarised English translation, in which case, for purpose of interpretation of the tender etc, the English translations shall prevail.

5. Eligible Tenderers

This invitation for tenders is open to all suppliers who fulfil the eligibility criteria specified in these documents.

6. Eligible Goods and Services

All goods and related services to be supplied under the contract shall have their origin in India or any other country with which India has not banned trade relations. The term “origin” used in this clause means the place where the goods are mined, grown, produced, or manufactured or from where the related services are arranged and supplied.

7. Tendering Expense

The tenderer shall bear all costs and expenditure incurred and/or to be incurred by it in connection with its tender including preparation, mailing and submission of its tender and for subsequent processing the same. The purchaser will, in no case be responsible or liable for any such cost, expenditure etc regardless of the conduct or outcome of the tendering process.

B. TENDER ENQUIRY DOCUMENTS

8. Content of Tender Enquiry Documents

- 8.1 In addition to Section I – “Notice inviting Tender” (NIT), the TE documents include:

Section II	– General Instructions to Tenderers (GIT)
Section III	– Special Instructions to Tenderers (SIT)
Section IV	– General Conditions of Contract (GCC)
Section V	– Special Conditions of Contract (SCC)
Section VI	– List of Requirements
Section VII	– Technical Specifications
Section VIII	– Quality Control Requirements
Section IX	– Qualification Criteria
Section X	– Tender Form
Section XI	– Price Schedules
Section XII	– Questionnaire
Section XIII	– Deleted
Section XIV	– Manufacturer’s Authorisation Form
Section XV	– Bank Guarantee Form for Performance Security/CMC Security
Section XVI	– Contract Forms A & B
Section XVII	– Proforma of Consignee Receipt Certificate
Section XVIII	– Proforma of Final Acceptance Certificate by the consignee
Section XIX	– Details of Shipping arrangement for Liner Cargoes in respect of C&F/CIF/Turnkey/F.O.R. Contracts for Import

Section XX – Check List for the Tenderers
Section XXI – Consignee List

8.2 The relevant details of the required goods and services, the terms, conditions and procedure for tendering, tender evaluation, placement of contract, the applicable contract terms and, also, the standard formats to be used for this purpose are incorporated in the above-mentioned documents. The interested tenderers are expected to examine all such details before submission of the tender.

9. Deleted

10. Clarification of TE documents

A tenderer requiring any clarification or elucidation on any issue of the TE documents may take up the same with the purchaser in writing. The purchaser will respond to such request provided the purchaser receives the same minimum 1 (one) hour prior to the scheduled time of pre-bid meeting. Clarification for the same will be published on the websites as mentioned in para 5 of NIT (Section I) within 4 days after the prebid meeting.

C. PREPARATION OF TENDERS

11. Documents Comprising the Tender

11.1 The **Two Tender System**, i.e. “Techno – Commercial Tender” and “Price Tender” prepared by the tenderer shall comprise the following:

A) Techno – Commercial Tender (Un priced Tender)

- i) Earnest money furnished in accordance with GIT clause 19.
- ii) Tender Form as per Section X.
- iii) Documentary evidence, as necessary in terms of clauses 5 and 17 establishing that the tenderer is eligible to submit the tender and, also, qualified to perform the contract if its tender is accepted.
- iv) Tenderer/Agent who quotes for goods manufactured by other manufacturer shall furnish Manufacturer’s Authorisation in the prescribed format as per Section - XIV.
- v) Power of Attorney/Authorisation in favour of signatory of TE documents.
- vi) Documents and relevant details to establish in accordance with GIT clause 18 that the goods and the allied services to be supplied by the tenderer conform to the requirement of the TE documents.
- vii) Performance Statement as per section IX along with relevant copies of purchase orders and end users’ satisfaction certificate.
- viii) Price Schedule(s) as per Section XII filled up with all the details including Qty., Make, Model, Contry of origin, etc. of the goods offered with prices blank (without indicating any prices).
- ix) Certificate of Incorporation of the bidder.
- x) Checklist as per Section XX.
- xi) Statement of deviations parameter wise from tendered technical specifications, if any.

B) Price Tender:

The information given at clause no. 11.1 A)- viii) above should be reproduced with the prices indicated.

N.B.

1. All pages of the Tender should be page numbered and indexed.
2. It is the responsibility of tenderer to go through the TE document to ensure furnishing all required documents in addition to above, if any.

-
- 11.2 The authorized signatory of the tenderer must sign the tender duly stamped at appropriate places and initial all the remaining pages of the tender.
- 11.3 A tender, which does not fulfil any of the above requirements and/or gives evasive information/reply against any such requirement, shall be liable to be ignored and rejected.
- 11.4 Tender sent by fax/telex/cable/electronically shall be ignored.

12. Tender currencies

- 12.1 The tenderer supplying indigenous goods or already imported goods shall quote only in Indian Rupees.
- 12.2 For imported goods if supplied directly from abroad, prices shall be quoted in any freely convertible currencies say USD, Euro, GBP or Yen. As regards price(s) for allied services, if any required with the goods, the same shall be quoted in Indian Rupees only if such services are to be performed /undertaken in India. Commission for Indian Agent, if any and if payable shall be indicated in the space provided for in the price schedule and will be payable in Indian Rupees only.
- 12.3 Tenders, where prices are quoted in any other way shall be treated as non-responsive and rejected.

13 Tender Prices

- 13.1 The Tenderer shall indicate on the Price Schedule provided under Section XI all the specified components of prices shown therein including the unit prices and total tender prices of the goods and services it proposes to supply against the requirement. All the columns shown in the price schedule should be filled up as required. If any column does not apply to a tenderer, it should be clarified as "NA" by the tenderer.
- 13.2 The tenderer has the option to submit its quotation for any one or more item (s) in the List of Requirements. However, separate sealed cover to be used for each item for price bid.
- 13.3 The quoted prices for goods offered from within India and that for goods offered from abroad are to be indicated separately in the applicable Price Schedules attached under Section XI.

The price quoted by the tenderer for indigenous goods shall not be higher than the lowest price charged for the goods of the same nature, class or description to an individual/ firm/ organisation or department of Govt. of India.

For imported goods, the price quoted shall not be higher than the lowest price charged by the tenderer for the goods of the same nature, class or description to a purchaser, domestic or foreign or to any organisation or department of Govt. of India.

If it is found at any stage that the goods as stated have been supplied at a lower price, then that price, with due allowance for elapsed time will be applicable to the present case and the difference in cost would be refunded by the supplier to the purchaser, if the contract has already been concluded.

- 13.4 While filling up the columns of the Price Schedule, the following aspects should be noted for compliance:
- 13.4.1 **For domestic goods or goods of foreign origin located within India, the prices in the corresponding price schedule shall be entered separately in the following manner:**
- a) the price of the goods, quoted ex-factory/ ex-showroom/ ex-warehouse/ off-the-shelf, as applicable, including all taxes and duties like sales tax, CST VAT, CENVAT, Custom Duty,

Excise Duty etc. already paid or payable on the components and raw material used in the manufacture or assembly of the goods quoted ex-factory etc. or on the previously imported goods of foreign origin quoted ex-showroom etc;

- b) any sales or other taxes and any duties including excise duty, which will be payable on the finished goods in India if the contract is awarded;
- c) charges towards Packing & Forwarding, Inland Transportation, Insurance, Loading/Unloading and other local costs incidental to delivery of the goods to their final destination as specified in the List of Requirements and Price Schedule;
- d) the price of Incidental Services, as mentioned in List of Requirements and Price Schedule;
- e) the prices of Turnkey (if any), as mentioned in List of Requirements, Technical Specification and Price Schedule; and
- f) the price of CMC, as mentioned in List of Requirements, Technical Specification and Price Schedule.

13.4.2 For goods offered from abroad, the prices in the corresponding price schedule shall be entered separately in the following manner:

- a) the price of goods quoted FOB port of shipment, as indicated in the List of Requirements and Price Schedule;
- b) the amount of freight and insurance and price of goods quoted CIP port of entry in India as indicated in the List of Requirements and Price Schedule;
- c) the **price of goods quoted should be on DDP basis at consignee site in India** as indicated in the List of Requirements, Price Schedule and Consignee List;
- d) wherever applicable, the amount of custom duty with CDEC applicable on CIP value on the goods to be imported; ESIC will issue Customs Duty Exemption Certificate (CDEC) where applicable.
- e) the charges for Loading/Unloading, Inland transportation, Insurance and other local costs, Incidental cost to delivery of the goods from the port of entry in India to Consignee Site, as specified in the List of Requirements and Price Schedule;
- f) the charges for Incidental Services, as in the List of Requirements and Price Schedule;
- g) the prices of Turnkey (if any), as mentioned in List of Requirements, Technical Specification and Price Schedule; and
- h) the price of CMC, as mentioned in List of Requirements, Technical Specification and Price Schedule.

13.5 Additional information and instruction on Duties and Taxes:

13.5.1 If the Tenderer desires to ask for excise duty, sales tax/ VAT, Service Tax, Works Contract Tax etc. to be paid extra, the same must be specifically stated. In the absence of any such stipulation the price will be taken inclusive of such duties and taxes and no claim for the same will be entertained later.

13.5.2 Excise Duty:

- a) If reimbursement of excise duty is intended as extra over the quoted prices, the supplier must specifically say so also indicating the rate, quantum and nature of the duty applicable. In the absence of any such stipulation it will be presumed that the prices quoted are firm and final and no claim on account of excise duty will be entertained after the opening of tenders.
- b) If a Tenderer chooses to quote a price inclusive of excise duty and also desires to be reimbursed for variation, if any, in the excise duty during the time of supply, the tenderer must clearly mention the same and also indicate the rate and quantum of excise duty included in its price. Failure to indicate all such details in clear terms may result in rejection of that tender.

- c) Subject to sub clauses 13.5.2 (a) & (b) above, any change in excise duty upward/downward as a result of any statutory variation in excise duty taking place within contract terms shall be allowed to the extent of actual quantum of excise duty paid by the supplier. In case of downward revision in excise duty, the actual quantum of reduction of excise duty shall be reimbursed to the purchaser by the supplier. All such adjustments shall include all reliefs, exemptions, rebates, concession etc. if any obtained by the supplier.

13.5.3 Sales Tax:

If a tenderer asks for sales tax/ VAT, Service Tax and Works Contract Tax to be paid extra, the rate and nature of sales tax applicable should be shown separately. The sales tax / VAT, Service Tax and Works Contract Tax will be paid as per the rate at which it is liable to be assessed or has actually been assessed provided the transaction of sale is legally liable to sales tax / VAT, Service Tax and Works Contract Tax and is payable as per the terms of the contract. If any refund of Tax is received at a later date, the Supplier must return the amount forth-with to the purchaser.

13.5.4 Octroi Duty and Local Duties & Taxes:

Octroi duty, terminal tax and other levies of local bodies (like town body, municipal body etc.) if not exempted shall be reimbursed to the supplier on production of such proof of payment along with the final bill.

13.5.5 Customs Duty:

The tenderer shall quote the Customs duty wherever applicable, considering availability of CDEC. The applicable rates and amount of the Custom Duty and the corresponding Indian Customs Tariff number should be shown separately in the price schedule. In case of non-availability of CDEC, the supplier has to custom cleared the goods paying the applicable Custom Duty and any difference of duty from the applicable CDEC rate shall be reimbursed separately on production of such proof of payment alongwith the final bill.

- 13.6 For transportation of imported goods offered from abroad, relevant instructions as incorporated under GCC Clause 10 shall be followed.
- 13.7 For insurance of goods to be supplied, relevant instructions as provided under GCC Clause 11 shall be followed.
- 13.8 Unless otherwise specifically indicated in this TE document, the terms FCA, FOB, FAS, CIF, CIP, DDP etc. for imported goods offered from abroad, shall be governed by the rules & regulations prescribed in the current edition of INCOTERMS, published by the International Chamber of Commerce, Paris
- 13.9 The need for indication of all such price components by the tenderers, as required in this clause (viz., GIT clause 13) is for the purpose of comparison of the tenders by the purchaser and will no way restrict the purchaser's right to award the contract on the selected tenderer on any of the terms offered.

14. Indian Agent

- 14.1 If a foreign tenderer has engaged an agent in India in connection with its tender, the foreign tenderer, in addition to indicating Indian agent's commission, if any, in a manner described under GIT sub clause 12.2 above, shall also furnish the following information:
- a) The complete name and address of the Indian Agent and its permanent income tax account number as allotted by the Indian Income Tax authority.
 - b) The details of the services to be rendered by the agent for the subject requirement.
 - c) Details of Service outlets in India, nearest to the consignee(s), to render services during Warranty and CMC period.

15. Firm Price

- 15.1 Unless otherwise specified in the SIT, prices quoted by the tenderer shall remain firm and fixed during the currency of the contract and not subject to variation on any account.
- 15.2 However, as regards taxes and duties, if any, chargeable on the goods and payable, the conditions stipulated in GIT clause 13 will apply.

16. Deleted**17 Documents Establishing Tenderer's Eligibility and Qualifications**

- 17.1 Pursuant to GIT clause 11, the tenderer shall furnish, as part of its tender, relevant details and documents establishing its eligibility to quote and its qualifications to perform the contract if its tender is accepted.
- 17.2 The documentary evidence needed to establish the tenderer's qualifications shall fulfil the following requirements:
- a) in case the tenderer offers to supply goods, which are manufactured by some other firm, the tenderer has been duly authorised by the goods manufacturer to quote for and supply the goods to the purchaser. The tenderer shall submit the manufacturer's authorization letter to this effect as per the standard form provided under **Section XIV** in this document.
 - b) the tenderer has the required financial, technical and production capability necessary to perform the contract and, further, it meets the qualification criteria incorporated in the Section IX in these documents.
 - c) in case the tenderer is not doing business in India, it is duly represented by an agent stationed in India fully equipped and able to carry out the required contractual functions and duties of the supplier including after sale service, maintenance & repair etc. of the goods in question, stocking of spare parts and fast moving components and other obligations, if any, specified in the conditions of contract and/or technical specifications.
 - d) in case the tenderer is an Indian agent/authorized representative quoting on behalf of a foreign manufacturer for the **restricted item**, the Indian agent/authorized representative is already enlisted under the Compulsory Enlistment Scheme of Ministry of Finance, Govt. of India, operated through Directorate General of Supplies & Disposals (DGS&D), New Delhi.

18. Documents establishing Good's Conformity to TE document.

- 18.1 The tenderer shall provide in its tender the required as well as the relevant documents like technical data, literature, drawings etc. to establish that the goods and services offered in the tender fully conform to the goods and services specified by the purchaser in the TE documents. For this purpose the tenderer shall also provide a clause-by-clause commentary on the technical specifications and other technical details incorporated by the purchaser in the TE documents to establish technical responsiveness of the goods and services offered in its tender.
- 18.2 In case there is any variation and/or deviation between the goods & services prescribed by the purchaser and that offered by the tenderer, the tenderer shall list out the same in a chart form without ambiguity and provide the same along with its tender.
- 18.3 If a tenderer furnishes wrong and/or misleading data, statement(s) etc. about technical acceptability of the goods and services offered by it, its tender will be liable to be ignored and rejected in addition to other remedies available to the purchaser in this regard.

19. Earnest Money Deposit (EMD)

- 19.1 Pursuant to GIT clauses 8.1 and 11.1(A) the tenderer shall furnish along with its tender, earnest money for amount as shown in the List of Requirements. The earnest money is required to

protect the purchaser against the risk of the tenderer's unwarranted conduct as amplified under sub-clause 19.7 below.

19.2 Deleted

19.3 The earnest money shall be denominated in Indian Rupees or equivalent currencies as per GIT clause 12.2. **The earnest money shall not be accepted in any other form except the following:**

- i. Account Payee Demand Draft or
- ii. Banker's cheque

19.4 The demand draft or banker's cheque shall be drawn on any commercial bank in India or country of the tenderer, in favour of the "HLL Lifecare Limited" payable at New Delhi.

19.5 Deleted.

19.6 Unsuccessful tenderers' earnest money will be returned to them without any interest, after expiry of the tender validity period, but not later than thirty days after conclusion of the resultant contract. Successful tenderer's earnest money will be returned without any interest, after receipt of performance security from that tenderer.

19.7 Earnest Money is required to protect the purchaser against the risk of the Tenderer's conduct, which would warrant the forfeiture of the EMD. Earnest money of a tenderer will be forfeited, if the tenderer withdraws or amends its tender or impairs or derogates from the tender in any respect within the period of validity of its tender or if it comes to notice that the information/documents furnished in its tender is incorrect, false, misleading or forged without prejudice to other rights of the purchaser. The successful tenderer's earnest money will be forfeited without prejudice to other rights of Purchaser if it fails to furnish the required performance security within the specified period.

20. Tender Validity

20.1 If not mentioned otherwise in the SIT, the tenders shall remain valid for acceptance for a period of **120 days (One hundred and twenty days)** after the date of opening of techno-commercial tenders prescribed in the TE document. Any tender valid for a shorter period shall be treated as unresponsive and rejected.

20.2 In exceptional cases, the tenderers may be requested by the purchaser to extend the validity of their tenders up to a specified period. Such request(s) and responses thereto shall be conveyed by surface mail or by fax/ email followed by surface mail. The tenderers, who agree to extend the tender validity, are to extend the same without any change or modification of their original tender and they are also to extend the validity period of the EMD accordingly. A tenderer, however, may not agree to extend its tender validity without forfeiting its EMD.

20.3 In case the day up to which the tenders are to remain valid falls on/ subsequently declared a holiday or closed day for the purchaser, the tender validity shall automatically be extended up to the next working day.

21. Signing and Sealing of Tender

21.1 The tenderers shall submit their tenders as per the instructions contained in GIT Clause 11.

21.2 Unless otherwise mentioned in the SIT, a tenderer shall submit two copies of its tender marking them as "Original" and "Duplicate". Duplicate tenders may contain all pages including Technical Literature/Catalogues as in Original tenders.

21.3 The original and duplicate copies of the tender shall either be typed or written in indelible ink and the same shall be signed by the tenderer or by a person(s) who has been duly authorized to bind the tenderer to the contract. The letter of authorization shall be by a written power of attorney, which shall also be furnished along with the tender.

21.4 All the copies of the tender shall be duly signed at the appropriate places as indicated in the TE documents and all other pages of the tender including printed literature, if any shall be initialled

- by the same person(s) signing the tender. The tender shall not contain any erasure or overwriting, except as necessary to correct any error made by the tenderer and, if there is any such correction; the same shall be initialled by the person(s) signing the tender.
- 21.5 The tenderer is to seal the original and copy of the tender in separate envelopes, duly marking the same as “Original”, “Duplicate” and so on and writing the address of the purchaser and the tender reference number on the envelopes. The sentence “NOT TO BE OPENED” before _____ (The tenderer is to put the date & time of tender opening) are to be written on these envelopes. The inner envelopes are then to be put in a bigger outer envelope along with envelope containing EMD, which will also be duly sealed, marked etc. as above. If the outer envelope is not sealed and marked properly as above, the purchaser will not assume any responsibility for its misplacement, premature opening, late opening etc.
- 21.6 TE document seeks quotation following **two Tender System**, in two parts. First part will be known as **‘Techno - Commercial Tender’**, and the second part **‘Price Tender’** as specified in clause 11 of GIT. Tenderer shall seal **‘Techno - Commercial Tender (along with envelope containing EMD)’** and **‘Price Tender’** separately and covers will be suitably super scribed. Both these sealed covers shall be put in a bigger cover and sealed and procedure prescribed in Paras 21.1 to 21.5 followed.

D. SUBMISSION OF TENDERS

22. Submission of Tenders

- 22.1 Unless otherwise specified, the tenderers are to deposit the tenders in the tender box kept for this purpose at **HLL Lifecare Limited, Procurement and Consultancy Division, B-14A, Sector - 62, Noida -201307, Uttar Pradesh**. In case of bulky tender, which can not be put into tender box, the same shall be submitted by the tenderer by hand to **Head (P&CD)** or his nominee, **HLL Lifecare Limited, Procurement and Consultancy Division, B-14A, Sector -62, Noida - 201307, Uttar Pradesh**. The officer receiving the tender will give the tenderer an official receipt duly signed with date and time.
- 22.2 The tenderers must ensure that they deposit their tenders not later than the closing time and date specified for submission of tenders. It is the responsibility of the tenderer to ensure that their Tenders whether sent by post or by courier or by person, are dropped in the Tender Box by the specified clearing date and time. In the event of the specified date for submission of tender falls on / is subsequently declared a holiday or closed day for the purchaser, the tenders will be received up to the appointed time on the next working day.

23. Late Tender

- 23.1 A tender, which is received after the specified date and time for receipt of tenders will be treated as “late” tender and will be ignored.

24. Alteration and Withdrawal of Tender

- 24.1 The tenderer, after submitting its tender, is permitted to alter / modify its tender so long as such alterations / modifications are received duly signed, sealed and marked like the original tender, within the deadline for submission of tenders. Alterations / modifications to tenders received after the prescribed deadline will not be considered.
- 24.2 No tender should be withdrawn after the deadline for submission of tender and before expiry of the tender validity period. If a tenderer withdraws the tender during this period, it will result in forfeiture of the earnest money furnished by the tenderer in its tender.

E. TENDER OPENING

25. Opening of Tenders

- 25.1 The purchaser will open the tenders at the specified date and time and at the specified place as indicated in the NIT.

In case the specified date of tender opening falls on / is subsequently declared a holiday or closed day for the purchaser, the tenders will be opened at the appointed time and place on the next working day.

- 25.2 **Authorized representatives of the tenderers**, who have submitted tenders on time **may attend the tender opening** provided they bring with them **letters of authority from the corresponding tenderers**.

The tender opening official(s) will prepare a list of the representatives attending the tender opening. The list will contain the representatives' names & signatures and corresponding tenderers' names and addresses.

- 25.3 **Two-Tender system as mentioned in para 21.6 above will be as follows**. The **Techno-Commercial Tenders** are to be opened in the first instance, at the prescribed time and date as indicated in NIT. These Tenders shall be scrutinized and evaluated by the competent committee/ authority with reference to parameters prescribed in the TE document. During the Techno - Commercial Tender opening, the tender opening official(s) will read the salient features of the tenders like brief description of the goods offered, delivery period, Earnest Money Deposit and any other special features of the tenders, as deemed fit by the tender opening official(s). Thereafter, in the second stage, the Price Tenders of only the Techno-Commercially acceptable offers shall be opened at a latter date which will be notified to such tenderers. The prices, special discount if any of the goods offered etc., as deemed fit by tender opening official(s) will be read out.

F. SCRUTINY AND EVALUATION OF TENDERS

26. Basic Principle

- 26.1 Tenders will be evaluated on the basis of the terms & conditions already incorporated in the TE document, based on which tenders have been received and the terms, conditions etc. mentioned by the tenderers in their tenders. No new condition will be brought in while scrutinizing and evaluating the tenders.

27. Preliminary Scrutiny of Tenders

- 27.1 The Purchaser will examine the Tenders to determine whether they are complete, whether any computational errors have been made, whether required sureties have been furnished, whether the documents have been properly signed stamped and whether the Tenders are generally in order.
- 27.2 Deleted.
- 27.3 Deleted
- 27.4 The tenders will be scrutinized to determine whether they are complete and meet the essential and important requirements, conditions etc. as prescribed in the TE document. The tenders, which do not meet the basic requirements, are liable to be treated as non – responsive and will be summarily ignored.
- 27.5 The following are some of the important aspects, for which a tender shall be declared non-responsive and will be summarily ignored;

- (i) Tender form as per Section X (signed and stamped) not enclosed
- (ii) Tender is unsigned.
- (iii) Tender validity is shorter than the required period.
- (iv) Required EMD have not been provided.
- (v) Tenderer has quoted for goods manufactured by other manufacturer(s) without the required Manufacturer's Authorisation as per Format given in Section XIV.
- (vi) Tenderer has not agreed to give the required performance security.
- (vii) Goods offered are not meeting the tender enquiry specification.
- (viii) Tenderer has not agreed to other essential condition(s) specially incorporated in the tender enquiry like terms of payment, liquidated damages clause, warranty clause, DDP clause, Delivery period clause, dispute resolution mechanism applicable law.
- (ix) Poor/ unsatisfactory past performance.
- (x) Tenderers who stand deregistered/banned/blacklisted by any Govt. Authorities.
- (xi) Tenderer is not eligible as per GIT Clauses 5.1 & 17.1.
- (xii) Tenderer has not quoted for the entire quantity as specified in the List of Requirements for the quoted item (s).

28. Deleted

29 Discrepancies in Prices

- 29.1 If, in the price structure quoted by a tenderer, there is discrepancy between the unit price and the total price (which is obtained by multiplying the unit price by the quantity), the unit price shall prevail and the total price corrected accordingly, unless the purchaser feels that the tenderer has made a mistake in placing the decimal point in the unit price, in which case the total price as quoted shall prevail over the unit price and the unit price corrected accordingly.
- 29.2 If there is an error in a total price, which has been worked out through addition and/or subtraction of subtotals, the subtotals shall prevail and the total corrected; and
- 29.3 If there is a discrepancy between the amount expressed in words and figures, the amount in words shall prevail, subject to sub clause 29.1 and 29.2 above.

30. Discrepancy between original and copies of Tender

In case any discrepancy is observed between the text etc. of the original copy and that in the other copies of the same tender set, the text etc. of the original copy shall prevail.

31. Qualification Criteria

Tenders of the tenderers, who do not meet the required Qualification Criteria prescribed in Section IX, will be treated as non-responsive and will not be considered further.

32. Conversion of tender currencies to Indian Rupees

In case the TE document permits the tenderers to quote their prices in different currencies, all such quoted prices of the responsive tenderers will be converted to a single currency viz., Indian Rupees for the purpose of equitable comparison and evaluation, as per the exchange rates established by the Reserve Bank of India for similar transactions, **as on the date of 'Price Tender' opening.**

33. Deleted

34. Comparison of Tenders

- 34.1 Unless mentioned otherwise in Section – III – Special Instructions to Tenderers and Section – VI – List of Requirements, the comparison of the responsive tenders shall be carried out on **Delivery Duty Paid (DDP)** consignee site basis. The quoted turnkey prices and CMC prices will also be added for comparison/ranking purpose for evaluation.

35. Additional Factors and Parameters for Evaluation and Ranking of Responsive Tenders

35.1 Further to GIT Clause 34 above, the purchaser's evaluation of a tender will include and take into account the following:

- i) In the case of goods manufactured in India or goods of foreign origin already located in India, sales tax & other similar taxes and excise duty & other similar duties, Customs Duties, Service Tax, Works Contract Tax etc which will be contractually payable (to the tenderer), on the goods if a contract is awarded on the tenderer; and
- ii) in the case of goods of foreign origin offered from abroad, customs duty and other similar import duties/taxes, which will be contractually payable (to the tenderer) on the goods if the contract is awarded on the tenderer.

35.2 The purchaser's evaluation of tender will also take into account the additional factors, if any, incorporated in SIT in the manner and to the extent indicated therein.

35.3 Deleted

36. Tenderer's capability to perform the contract

36.1 The purchaser, through the above process of tender scrutiny and tender evaluation will determine to its satisfaction whether the tenderer, whose tender has been determined as the lowest evaluated responsive tender is eligible, qualified and capable in all respects to perform the contract satisfactorily. If, there is more than one item in the List of Requirements, then, such determination will be made separately for each item.

36.2 The above-mentioned determination will, inter alia, take into account the tenderer's financial, technical and production capabilities for satisfying all the requirements of the purchaser as incorporated in the TE document. Such determination will be based upon scrutiny and examination of all relevant data and details submitted by the tenderer in its tender as well as such other allied information as deemed appropriate by the purchaser.

37. Contacting the Purchaser

37.1 From the time of submission of tender to the time of awarding the contract, if a tenderer needs to contact the purchaser for any reason relating to this tender enquiry and / or its tender, it should do so only in writing.

37.2 In case a tenderer attempts to influence the purchaser in the purchaser's decision on scrutiny, comparison & evaluation of tenders and awarding the contract, the tender of the tenderer shall be liable for rejection in addition to appropriate administrative actions being taken against that tenderer, as deemed fit by the purchaser.

G. AWARD OF CONTRACT**38. Purchaser's Right to accept any tender and to reject any or all tenders**

The purchaser reserves the right to accept in part or in full any tender or reject any or more tender(s) without assigning any reason or to cancel the tendering process and reject all tenders at any time prior to award of contract, without incurring any liability, whatsoever to the affected tenderer or tenderers.

39. Award Criteria

Subject to GIT clause 38 above, the contract will be awarded to the lowest evaluated responsive tenderer decided by the purchaser in terms of GIT Clause 36.

40. Variation of Quantities at the Time of Award/ Currency of Contract

- 40.1 At the time of awarding the contract, the purchaser reserves the right to increase or decrease by up to twenty five (25) per cent, the quantity of goods and services mentioned in the schedule (s) in the "List of Requirements" without any change in the unit price and other terms & conditions quoted by the tenderer.
- 40.2 If the quantity has not been increased at the time of the awarding the contract, the purchaser reserves the right to increase by up to twenty five (25) per cent, the quantity of goods and services mentioned in the contract without any change in the unit price and other terms & conditions mentioned in the contract, during the currency of the contract or within one-year from the date of Notification of Award.

41. Notification of Award

- 41.1 Before expiry of the tender validity period, the purchaser will notify the successful tenderer(s) in writing, by registered / speed post or by fax/ telex/cable (to be confirmed by registered / speed post) that its tender for goods & services, which have been selected by the purchaser, has been accepted, also briefly indicating therein the essential details like description, specification and quantity of the goods & services and corresponding prices accepted. The successful tenderer must furnish to the purchaser the required performance security within twenty-one (21) days from the date of dispatch of this notification, failing which the EMD will be forfeited and the award will be cancelled. Relevant details about the performance security have been provided under GCC Clause 5 under Section IV.
- 41.2 The Notification of Award shall constitute the conclusion of the Contract.

42. Issue of Contract

- 42.1 Promptly after notification of award, the Purchaser/Consignee will mail the contract form (as per Section XVI) duly completed and signed, in duplicate, to the successful tenderer by registered / speed post.
- 42.2 Within twenty one days from the date of the contract, the successful tenderer shall return the original copy of the contract, duly signed and dated, to the Purchaser by registered / speed post.
- 42.3 The Purchaser reserves the right to issue the Notification of Award consignee wise.

43. Non-receipt of Performance Security and Contract by the Purchaser/Consignee

Failure of the successful tenderer in providing performance security and / or returning contract copy duly signed in terms of GIT clauses 41 and 42 above shall make the tenderer liable for forfeiture of its EMD and, also, for further actions by the Purchaser/Consignee against it as per the clause 24 of GCC – Termination of default.

44. Return of E M D

The earnest money of the successful tenderer and the unsuccessful tenderers will be returned to them without any interest, whatsoever, in terms of GIT Clause 19.6.

45. Publication of Tender Result

The name and address of the successful tenderer(s) receiving the contract(s) will be mentioned in the notice board/bulletin/web site of the purchaser.

46. Corrupt or Fraudulent Practices

It is required by all concerned to observe the highest standard of ethics during the procurement and execution of such contracts. In pursuance of this policy, the Purchaser: -

- (a) defines, for the purposes of this provision, the terms set forth below as follows:
 - (i) “corrupt practice” means the offering, giving, receiving or soliciting of any thing of value to influence the action of a public official in the procurement process or in contract execution; and
 - (ii) “fraudulent practice” means a misrepresentation of facts in order to influence a procurement process or the execution of a contract to the detriment of the Purchaser, and includes collusive practice among Tenderers (prior to or after Tender submission) designed to establish Tender prices at artificial non-competitive levels and to deprive the Purchaser of the benefits of free and open competition;
- (b) will reject a proposal for award if it determines that the Tenderer recommended for award has engaged in corrupt or fraudulent practices in competing for the contract in question;
- (c) will declare a firm ineligible, either indefinitely or for a stated period of time, to be awarded a contract by the purchaser if it at any time determines that the firm has engaged in corrupt or fraudulent practices in competing for, or in executing the contract.

SECTION - III
SPECIAL INSTRUCTIONS TO TENDERERS
(SIT)

The following Special Instructions to Tenderers will apply for this purchase. These special instructions will modify/substitute/supplement the corresponding General Instructions to Tenderers (GIT) incorporated in Section II. The corresponding GIT clause numbers have also been indicated in the text below:

In case of any conflict between the provision in the GIT and that in the SIT, the provision contained in the SIT shall prevail.

SECTION - IV**GENERAL CONDITIONS OF CONTRACT (GCC)****TABLE OF CLAUSES**

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GENERAL CONDITIONS OF CONTRACT (GCC)

1. Application

The General Conditions of Contract incorporated in this section shall be applicable for this purchase to the extent the same are not superseded by the Special Conditions of Contract prescribed under Section V, List of requirements under Section VI and Technical Specification under Section VII of this document.

2. Use of contract documents and information

2.1 The supplier shall not, without the purchaser's prior written consent, disclose the contract or any provision thereof including any specification, drawing, sample or any information furnished by or on behalf of the purchaser in connection therewith, to any person other than the person(s) employed by the supplier in the performance of the contract emanating from this TE document. Further, any such disclosure to any such employed person shall be made in confidence and only so far as necessary for the purposes of such performance for this contract.

2.2 Further, the supplier shall not, without the purchaser's prior written consent, make use of any document or information mentioned in GCC sub-clause 2.1 above except for the sole purpose of performing this contract.

2.3 Except the contract issued to the supplier, each and every other document mentioned in GCC sub-clause 2.1 above shall remain the property of the purchaser and, if advised by the purchaser, all copies of all such documents shall be returned to the purchaser on completion of the supplier's performance and obligations under this contract.

3. Patent Rights

The supplier shall, at all times, indemnify and keep indemnified the purchaser, free of cost, against all claims which may arise in respect of goods & services to be provided by the supplier under the contract for infringement of any intellectual property rights or any other right protected by patent, registration of designs or trademarks. In the event of any such claim in respect of alleged breach of patent, registered designs, trade marks etc. being made against the purchaser, the purchaser shall notify the supplier of the same and the supplier shall, at his own expenses take care of the same for settlement without any liability to the purchaser.

4. Country of Origin

4.1 All goods and services to be supplied and provided for the contract shall have the origin in India or in the countries with which the Government of India has trade relations.

4.2 The word "origin" incorporated in this clause means the place from where the goods are mined, cultivated, grown, manufactured, produced or processed or from where the services are arranged.

4.3 The country of origin may be specified in the Price Schedule

5. Performance Security

5.1 Within twenty-one (21) days from date of the issue of notification of award by the Purchaser/Consignee, the supplier, shall furnish performance security to the Purchaser/Consignee for an amount equal to ten percent (10%) of the total value of the contract, **valid up to sixty (60) days after the date of completion of all contractual obligations by the supplier, including the warranty obligations.**

5.2 The Performance security shall be denominated in Indian Rupees or in the currency of the contract as detailed below:

- a) It shall be in any one of the forms namely Account Payee Demand Draft drawn from any Scheduled bank in India or Bank Guarantee issued by a Scheduled bank in India, in the

prescribed form as provided in section XV of this document in favour of the Purchaser/Consignee.

- b) In the case of Bank Guarantee furnished from banks outside India (i.e. foreign Banks), it should be authenticated and countersigned by any nationalised bank in India by way of back-to-back counter guarantee.
- 5.3 In the event of any failure /default of the supplier with or without any quantifiable loss to the government including furnishing of consignee wise Bank Guarantee for CMC security as per Proforma in Section XV, the amount of the performance security is liable to be forfeited. The Administration Department may do the needful to cover any failure/default of the supplier with or without any quantifiable loss to the Government.
- 5.4 In the event of any amendment issued to the contract, the supplier shall, within twenty-one (21) days of issue of the amendment, furnish the corresponding amendment to the Performance Security (as necessary), rendering the same valid in all respects in terms of the contract, as amended.
- 5.5 The supplier shall enter into Comprehensive Maintenance Contract as per the 'Contract Form - B' in Section XVI with respective consignees, 3 (three) months prior to the completion of Warranty Period. The CMC will commence from the date of expiry of the Warranty Period.
- 5.6 Subject to GCC sub – clause 5.3 above, the Purchaser/Consignee will release the Performance Security without any interest to the supplier on completion of the supplier's all contractual obligations including the warranty obligations & after receipt of Consignee wise bank guarantee for CMC security in favour of Head of the Hospital/ Institute/ Medical College of the consignee as per the format in Section XV.

6. Technical Specifications and Standards

- 6.1 The Goods & Services to be provided by the supplier under this contract shall conform to the technical specifications and quality control parameters mentioned in 'Technical Specification' and 'Quality Control Requirements' under Sections VII and VIII of this document.

7. Packing and Marking

- 7.1 The packing for the goods to be provided by the supplier should be strong and durable enough to withstand, without limitation, the entire journey during transit including transshipment (if any), rough handling, open storage etc. without any damage, deterioration etc. As and if necessary, the size, weights and volumes of the packing cases shall also take into consideration, the remoteness of the final destination of the goods and availability or otherwise of transport and handling facilities at all points during transit up to final destination as per the contract.
- 7.2 The quality of packing, the manner of marking within & outside the packages and provision of accompanying documentation shall strictly comply with the requirements as provided in Technical Specifications and Quality Control Requirements under Sections VII and VIII and in SCC under Section V. In case the packing requirements are amended due to issue of any amendment to the contract, the same shall also be taken care of by the supplier accordingly.
- 7.3 Packing instructions:

Unless otherwise mentioned in the Technical Specification and Quality Control Requirements under Sections VII and VIII and in SCC under Section V, the supplier shall make separate packages for each consignee (in case there is more than one consignee mentioned in the contract) and mark each package on three sides with the following with indelible paint of proper quality:

- a. contract number and date
- b. brief description of goods including quantity
- c. packing list reference number

- d. country of origin of goods
- e. consignee's name and full address and
- f. supplier's name and address

8. Inspection, Testing and Quality Control

- 8.1 The purchaser and/or its nominated representative(s) will, without any extra cost to the purchaser, inspect and/or test the ordered goods and the related services to confirm their conformity to the contract specifications and other quality control details incorporated in the contract. The purchaser shall inform the supplier in advance, in writing, the purchaser's programme for such inspection and, also the identity of the officials to be deputed for this purpose. The cost towards the transportation, boarding & lodging will be borne by the purchaser and/or its nominated representative(s).
- 8.2 The Technical Specification and Quality Control Requirements incorporated in the contract shall specify what inspections and tests are to be carried out and, also, where and how they are to be conducted. If such inspections and tests are conducted in the premises of the supplier or its subcontractor(s), all reasonable facilities and assistance, including access to relevant drawings, design details and production data, shall be furnished by the supplier to the purchaser's inspector at no charge to the purchaser.
- 8.3 If during such inspections and tests the contracted goods fail to conform to the required specifications and standards, the purchaser's inspector may reject them and the supplier shall either replace the rejected goods or make all alterations necessary to meet the specifications and standards, as required, free of cost to the purchaser and resubmit the same to the purchaser's inspector for conducting the inspections and tests again.
- 8.4 In case the contract stipulates pre-despatch inspection of the ordered goods at supplier's premises, the supplier shall put up the goods for such inspection to the purchaser's inspector well ahead of the contractual delivery period, so that the purchaser's inspector is able to complete the inspection within the contractual delivery period.
- 8.5 If the supplier tenders the goods to the purchaser's inspector for inspection at the last moment without providing reasonable time to the inspector for completing the inspection within the contractual delivery period, the inspector may carry out the inspection and complete the formality beyond the contractual delivery period at the risk and expense of the supplier. The fact that the goods have been inspected after the contractual delivery period will not have the effect of keeping the contract alive and this will be without any prejudice to the legal rights and remedies available to the purchaser under the terms & conditions of the contract.
- 8.6 The purchaser's/consignee's contractual right to inspect, test and, if necessary, reject the goods after the goods' arrival at the final destination shall have no bearing of the fact that the goods have previously been inspected and cleared by purchaser's inspector during pre-despatch inspection mentioned above.
- 8.7 Goods accepted by the purchaser/consignee and/or its inspector at initial inspection and in final inspection in terms of the contract shall in no way dilute purchaser's/consignee's right to reject the same later, if found deficient in terms of the warranty clause of the contract, as incorporated under GCC Clause 15.
- 8.8 Principal/ Foreign supplier shall also have the equipment inspected by recognised/ reputed agency like SGS, Lloyd or equivalent (acceptable to the purchaser) prior to despatch at the supplier's cost and furnish necessary certificate from the said agency in support of their claim.

9. Terms of Delivery

Goods shall be delivered by the supplier in accordance with the terms of delivery specified in the contract.

10. Transportation of Goods**10.1 Instructions for transportation of imported goods offered from abroad:**

The supplier shall not arrange part-shipments and/or transshipment without the express/prior written consent of the purchaser. The supplier is required under the contract to deliver the goods under DDP at consignee site; the shipment shall be made by Indian flag vessel or by vessels belonging to the conference lines in which India is a member country through India's forwarding agents/coordinators. In case the forwarding agent/coordinators are unable to provide timely adequate space in Indian flag vessel or by vessels belonging to the conference lines, the supplier shall arrange shipment through any available vessel to adhere to the delivery schedule given in the contract.

In case of airlifting of imported goods offered from abroad, the same will be done only through the National Carrier i.e. Air India wherever applicable. In case the National Carrier is not available, any other airlines available for early delivery may be arranged.

Goods will be custom cleared by the supplier/ Indian agent and transported to the consignee's site as per the contract terms.

Instructions for transportation of domestic goods including goods already imported by the supplier under its own arrangement:

In case no instruction is provided in this regard in the SCC, the supplier will arrange transportation of the ordered goods as per its own procedure.

The goods shall be custom cleared by the Supplier/ Indian Agent and transported to the consignee's site as per contract terms. The supplier shall be responsible for safe and timely delivery of ordered goods under his own arrangement.

11. Insurance:

Unless otherwise instructed in the SCC, the supplier shall make arrangements for insuring the goods against loss or damage incidental to manufacture or acquisition, transportation, storage and delivery in the following manner:

- i) in case of supply of domestic goods on Consignee site basis, the supplier shall be responsible till the entire stores contracted for arrival in good condition at destination. The transit risk in this respect shall be covered by the Supplier by getting the stores duly insured. The insurance cover shall be obtained by the Supplier and should be valid till 3 months after the receipt of goods by the Consignee.
- ii) in case of supply of the imported goods on DDP Basis, the supplier shall arrange and pay for marine/ air insurance making the consignee as beneficiary. The additional extended Insurance (local transportation and storage) would also be borne by the Supplier from the port of entry to the consignee site for a period including 3 months beyond date of delivery.

12. Spare parts

12.1 If specified in the List of Requirements and in the resultant contract, the supplier shall supply/provide any or all of the following materials, information etc. pertaining to spare parts manufactured and/or supplied by the supplier:

- a) The spare parts as selected by the Purchaser/Consignee to be purchased from the supplier, subject to the condition that such purchase of the spare parts shall not relieve the supplier of any contractual obligation including warranty obligations; and
- b) In case the production of the spare parts is discontinued:
 - i) Sufficient advance notice to the Purchaser/Consignee before such discontinuation to provide adequate time to the purchaser to purchase the required spare parts etc., and
 - ii) Immediately following such discontinuation, providing the Purchaser/Consignee, free of cost, the designs, drawings, layouts and specifications of the spare parts, as and if requested by the Purchaser/Consignee.

12.2 Supplier shall carry sufficient inventories to assure ex-stock supply of consumable spares for the goods so that the same are supplied to the Purchaser/Consignee promptly on receipt of order from the Purchaser/Consignee.

13. Incidental services

Subject to the stipulation, if any, in the SCC (Section – V), List of Requirements (Section – VI) and the Technical Specification (Section – VII), the supplier shall be required to perform the following services.

- i) Installation & commissioning, Supervision and Demonstration of the goods
- ii) Providing required jigs and tools for assembly, minor civil works required for the completion of the installation.
- iii) Training of Consignee's Doctors, Staff, operators etc. for operating and maintaining the goods
- iv) Supplying required number of operation & maintenance manual for the goods

14. Distribution of Dispatch Documents for Clearance/Receipt of Goods

The supplier shall send all the relevant despatch documents well in time to the Purchaser/Consignee

Unless otherwise specified in the SCC, the usual documents involved and the drill to be followed in general for this purpose are as follows.

- A) For Domestic Goods, including goods already imported by the supplier under its own arrangement

Within 24 hours of despatch, the supplier shall notify the purchaser, consignee, and others concerned if mentioned in the contract, the complete details of despatch and also supply the following documents to them by registered post / speed post (or as instructed in the contract):

- (i) Four copies of supplier's invoice showing contract number, goods description, quantity, unit price and total amount;
- (ii) Two copies of packing list identifying contents of each package;
- (iii) Inspection certificate issued by the nominated Inspection agency, if any.
- (iv) Certificate of origin;
- (v) Insurance Certificate as per GCC Clause 11.
- (vi) Manufacturers/Supplier's warranty certificate & In-house inspection certificate.

- B) For goods imported from abroad

Within 24 hours of despatch, the supplier shall notify the purchaser, consignee, and others concerned if mentioned in the contract, the complete details of despatch and also supply the following documents to them by airmail/ registered post / speed post (or as instructed in the contract).

- (i) Four copies of supplier's invoice showing contract number, goods description, quantity, unit price and total amount;
- (ii) Original and four copies of the negotiable clean, on-board Bill of Lading/Airway bill, marked freight pre paid and four copies of non-negotiable Bill of Lading/Airway bill;
- (iii) Four Copies of packing list identifying contents of each package;
- (iv) Insurance Certificate as per GCC Clause 11.
- (v) Manufacturer's/Supplier's warranty certificate;
- (vi) Inspection Certificate for the despatched equipments issued by recognized/ reputed agency like SGS, Lloyd or equivalent (acceptable to the purchaser) prior to despatch
- (vii) Manufacturer's own factory inspection report;
- (viii) Certificate of origin
- (ix) Port of Loading;
- (x) Port of Discharge and
- (xi) Expected date of arrival.

15. Warranty

- 15.1 The supplier warrants comprehensively that the goods supplied under the contract is new, unused and incorporate all recent improvements in design and materials unless prescribed otherwise by the purchaser in the contract. The supplier further warrants that the goods supplied under the contract shall have no defect arising from design, materials or workmanship or from any act or omission of the supplier that may develop under normal use of the supplied goods under the conditions prevailing in India.
- 15.2 This **warranty shall remain valid for 2(Two) years** in general, after the goods or any portion thereof as the case may be, have been delivered to the final destination and installed and commissioned at the final destination and accepted by the Purchaser/Consignee in terms of the contract, **unless specified otherwise in the SCC**.
- a. No conditional warranty like mishandling, manufacturing defects etc. will be acceptable.
 - b. Warranty as well as Comprehensive Maintenance contract will be inclusive of all accessories and Turnkey work and it will also cover the following items:-
 - i. X-ray and CT tubes and high-tension cables.
 - ii. Helium replacement
 - iii. Any kind of motor
 - iv. Plastic & Glass parts
 - v. All kinds of sensors including oxygen sensors
 - vi. All kinds of coils, probes and transducers including ECG cable, BP transducers, SpO2 Probes, Ultrasound and Color Doppler Transducers/probes, BP Cuffs, Defibrillator internal paddles, chart recorders, ventilator reusable patient circuits, servo humidifier with chamber, electrodes and probes for blood gas analyser, MRI coils.
 - vii. All kinds of flat panel sensors and cassettes for Digital Radiography & Computer Radiography systems and patients handling trolleys, etc.
 - viii. Printers and imagers including laser and thermal printers with all parts.
 - ix. UPS including the replacement of Batteries.
 - x. Air-conditioners
 - c. Replacement and repair will be under taken for the defective goods.

- d. Proper marking has to be made for all spares for identification like printing of installation and repair dates.
- 15.3 In case of any claim arising out of this warranty, the Purchaser/Consignee shall promptly notify the same in writing to the supplier. The period of the warranty will be as per G.C.C clause number 15.2 above irrespective of any other period mentioned elsewhere in the bidding documents.
- 15.4 Upon receipt of such notice, the supplier shall, within 8 hours on a 24(hrs) X 7 (days) X 365 (days) basis respond to take action to repair or replace the defective goods or parts thereof, free of cost, at the ultimate destination. The supplier shall take over the replaced parts/goods after providing their replacements and no claim, whatsoever shall lie on the purchaser for such replaced parts/goods thereafter. The penalty clause for non-rectification will be applicable as per tender conditions
- 15.5 In the event of any rectification of a defect or replacement of any defective goods during the warranty period, the **warranty for the rectified/replaced goods shall be extended to a further period as mentioned under clause 15.2** from the date such rectified / replaced goods starts functioning to the satisfaction of the purchaser.
- 15.6 If the supplier, having been notified, fails to respond to take action to repair or replace the defect(s) within 8 hours on a 24(hrs) X 7 (days) X 365 (days) basis, the purchaser may proceed to take such remedial action(s) as deemed fit by the purchaser, at the risk and expense of the supplier and without prejudice to other contractual rights and remedies, which the purchaser may have against the supplier.
- 15.7 During Warranty period, the supplier is required to visit at each consignee's site at least once in 6 months commencing from the date of the installation for preventive maintenance of the goods
- 15.8 The Purchaser/Consignee reserve the rights to enter into **Annual Comprehensive Maintenance Contract** between Consignee and the Supplier for the period as mentioned in General Points for Technical Specifications, **Section VII (para-4)**, after the completion of warranty period.
- 15.9 The supplier along with its Indian Agent and the CMC provider shall ensure continued supply of the spare parts for the machines and equipments supplied by them to the purchaser for **10 years** from the date of installation and handing over.
- 15.10 The Supplier along with its Indian Agent and the CMC Provider shall always accord most favoured client status to the Purchaser vis-à-vis its other Clients/Purchasers of its equipments/machines/goods etc. and shall always give the most competitive price for its machines/equipments supplied to the Purchaser/Consignee.

16. Assignment

- 16.1 The Supplier shall not assign, either in whole or in part, its contractual duties, responsibilities and obligations to perform the contract, except with the Purchaser's prior written permission.

17. Sub Contracts

- 17.1 The Supplier shall notify the Purchaser in writing of all sub contracts awarded under the contract if not already specified in its tender. Such notification, in its original tender or later, shall not relieve the Supplier from any of its liability or obligation under the terms and conditions of the contract.
- 17.2 Sub contract shall be only for bought out items and sub-assemblies.
- 17.3 Sub contracts shall also comply with the provisions of GCC Clause 4 ("Country of Origin").

18. Modification of contract

- 18.1 If necessary, the purchaser may, by a written order given to the supplier at any time during the currency of the contract, amend the contract by making alterations and modifications within the general scope of contract in any one or more of the following:
- a) Specifications, drawings, designs etc. where goods to be supplied under the contract are to be specially manufactured for the purchaser,

- b) Mode of packing,
- c) Incidental services to be provided by the supplier
- d) Mode of despatch,
- e) Place of delivery, and
- f) Any other area(s) of the contract, as felt necessary by the purchaser depending on the merits of the case.

18.2 In the event of any such modification/alteration causing increase or decrease in the cost of goods and services to be supplied and provided, or in the time required by the supplier to perform any obligation under the contract, an equitable adjustment shall be made in the contract price and/or contract delivery schedule, as the case may be, and the contract amended accordingly. If the supplier doesn't agree to the adjustment made by the Purchaser/Consignee, the supplier shall convey its views to the Purchaser/Consignee within twenty-one days from the date of the supplier's receipt of the Purchaser's/Consignee's amendment / modification of the contract.

19. Prices

19.1 Prices to be charged by the supplier for supply of goods and provision of services in terms of the contract shall not vary from the corresponding prices quoted by the supplier in its tender and incorporated in the contract except for any price adjustment authorised in the SCC.

20. Taxes and Duties

- 20.1 Supplier shall be entirely responsible for all taxes, duties, fees, levies etc. incurred until delivery of the contracted goods to the purchaser.
- 20.2 Further instruction, if any, shall be as provided in the SCC.

21. Terms and Mode of Payment

21.1 Payment Terms

Payment shall be made subject to recoveries, if any, by way of liquidated damages or any other charges as per terms & conditions of contract in the following manner.

A) Payment for Domestic Goods Or Foreign Origin Located Within India.

Payment shall be made in Indian Rupees as specified in the contract in the following manner:

a) On delivery:

- (i) 90 % payment of the contract price shall be paid within 24 hours on receipt of goods in good condition and upon the submission of the following documents complete in all respects. Bills shall be returned un-paid in case of any discrepancy. Delay in payment on account of above shall rest with the supplier.
- (ii) Four copies of supplier's invoice showing contract number, goods description, quantity, unit price and total amount;
- (iii) Consignee Receipt Certificate as per Section XVII in original issued by the authorized representative of the consignee;
- (iv) Two copies of packing list identifying contents of each package;
- (v) Inspection certificate issued by the nominated Inspection agency, if any;
- (vi) Insurance Certificate as per GCC Clause 11;
- (vii) Certificate of origin.

b) On Acceptance:

Balance 10 % payment would be made against 'Final Acceptance Certificate' as per Section XVIII of goods to be issued by the consignees subject to recoveries, if any, either

on account of non-rectification of defects/deficiencies not attended by the Supplier or otherwise.

B) Payment for Imported Goods:

Payment for foreign currency portion shall be made in the currency as specified in the contract in the following manner:

a) On delivery:

Ninety (90) % of the net CIP price (CIP price less Indian Agency commission) of the goods shipped shall be paid through irrevocable, non-transferable Letter of Credit (LC) opened in favour of the supplier in a bank in his country and upon submission of documents specified hereunder:

- (i) Four copies of supplier's invoice showing contract number, goods description, quantity, unit price and total amount;
- (ii) Original and four copies of the negotiable clean, on-board Bill of Lading/ Airway bill , marked freight pre paid and four copies of non-negotiable Bill of Lading/Airway bill;
- (iii) Four Copies of packing list identifying contents of each package;
- (iv) Insurance Certificate as per GCC Clause 11 and documents also to be submitted for payment of LC confirming that dispatch documents has already been sent within 24 hours to all concerned as per the contract;
- (v) Manufacturer's/Supplier's warranty certificate;
- (vi) Manufacturer's own factory inspection report and
- (vii) Certificate of origin by the chamber of commerce of the concerned country;
- (viii) Inspection Certificate for the despatched equipments issued by recognized/ reputed agency like SGS, Lloyd or equivalent (acceptable to the purchaser) prior to despatch.
- (ix) Consignee Receipt Certificate as per Section XVII in original issued by the authorized representative of the consignee

b) On Acceptance:

Balance payment of 10 % of net CIP price of goods would be made against 'Final Acceptance Certificate' as per Section XVIII to be issued by the consignees through irrevocable, non-transferable Letter of Credit (LC) opened in favour of the Foreign Principal in a bank in his country, subject to recoveries, if any.

- c) Payment of custom duty amount with Custom Duty Exemption Certificate (CDEC), if applicable, customs clearance and handling charges, loading/ unloading, inland transportation, incidental costs till consignee site & incidental services (including installation & commissioning, supervision, demonstration and training) will be paid in Indian Rupees to the Indian agent at actual not exceeding the quoted rates after 100 % payment to the foreign principal.**

d) Payment of Indian Agency Commission:

Indian Agency commission will be paid to the manufacturer's agent in the local currency for an amount in Indian rupees indicated in the relevant Price Schedule (as per prevailing rate of exchange ruling on the date of Contract) and shall not be subject to further escalation / exchange variation. Payment shall be made after 100% payment to the Foreign Principal.

C) Payment of Turnkey, if any:

Turnkey payment will be made to the manufacturer's agent in Indian rupees indicated in the relevant Price Schedule (as per prevailing rate of exchange ruling on the date of Contract) and

shall not be subject to further escalation / exchange variation. Payment shall be made to the Indian Agent after 100 % payment to the Foreign Principal.

D) Payment for Annual Comprehensive Maintenance Contract (CMC) Charges:

The consignee will enter into CMC with the supplier at the rates as stipulated in the contract. The payment of CMC will be made on six monthly basis after satisfactory completion of said period, duly certified by the consignee on receipt of bank guarantee for an amount equivalent to 2.5 % of the cost of the equipment as per contract in the prescribed format given in Section XV valid till 2 months after expiry of entire CMC period.

- 21.2 The supplier shall not claim any interest on payments under the contract.
- 21.3 Where there is a statutory requirement for tax deduction at source, such deduction towards income tax and other tax as applicable will be made from the bills payable to the Supplier at rates as notified from time to time.
- 21.4 Irrevocable & non-transferable LC shall be opened by ESIC/ Purchaser. However, if the supplier requests specifically to open confirmed LC, the extra charges would be borne by the supplier. If LC is required to be extended and/or amended for reasons not attributable to the purchaser/consignee, the charges thereof shall be borne by the supplier.
- 21.5 The payment shall be made in the currency / currencies authorised in the contract.
- 21.6 The supplier shall send its claim for payment in writing, when contractually due, along with relevant documents etc., duly signed with date, to the purchaser.
- 21.7 While claiming payment, the supplier is also to certify in the bill that the payment being claimed is strictly in terms of the contract and all the obligations on the part of the supplier for claiming that payment has been fulfilled as required under the contract.
- 21.8 While claiming reimbursement of duties, taxes etc. (like sales tax, excise duty, custom duty) from the Purchaser/Consignee, as and if permitted under the contract, the supplier shall also certify that, in case it gets any refund out of such taxes and duties from the concerned authorities at a later date, it (the supplier) shall refund to the Purchaser/Consignee forthwith.
- 21.9 In case where the supplier is not in a position to submit its bill for the balance payment for want of receipted copies of Inspection Note from the consignee and the consignee has not complained about the non-receipt, shortage, or defects in the supplies made, balance amount will be paid by the paying authority without consignee's receipt certificate after three months from the date of the preceding part payment for the goods in question, subject to the following conditions:
- (a) The supplier will make good any defect or deficiency that the consignee (s) may report within six months from the date of despatch of goods.
 - (b) Delay in supplies, if any, has been regularized.
 - (c) The contract price where it is subject to variation has been finalized.
 - (d) The supplier furnishes the following undertakings:

“I/We, _____ certify that I/We have not received back the Inspection Note duly receipted by the consignee or any communication from the purchaser or the consignee about non-receipt, shortage or defects in the goods supplied. I/We _____ agree to make good any defect or deficiency that the consignee may report within three months from the date of receipt of this balance payment.

22. Delay in the supplier's performance

- 22.1 The supplier shall deliver the goods and perform the services under the contract within the time schedule specified by the Purchaser/Consignee in the List of Requirements and as incorporated in the contract.

- 22.2 Subject to the provision under GCC clause 26, any unexcused delay by the supplier in maintaining its contractual obligations towards delivery of goods and performance of services shall render the supplier liable to any or all of the following sanctions:
- (i) imposition of liquidated damages,
 - (ii) forfeiture of its performance security and
 - (iii) termination of the contract for default.
- 22.3 If at any time during the currency of the contract, the supplier encounters conditions hindering timely delivery of the goods and performance of services, the supplier shall promptly inform the Purchaser/Consignee in writing about the same and its likely duration and make a request to the Purchaser/Consignee for extension of the delivery schedule accordingly. On receiving the supplier's communication, the Purchaser/Consignee shall examine the situation as soon as possible and, at its discretion, may agree to extend the delivery schedule, with or without liquidated damages for completion of supplier's contractual obligations by issuing an amendment to the contract.
- 22.4 When the period of delivery is extended due to unexcused delay by the supplier, the amendment letter extending the delivery period shall, inter alia contain the following conditions:
- (a) The Purchaser/Consignee shall recover from the supplier, under the provisions of the clause 23 of the General Conditions of Contract, liquidated damages on the goods and services, which the Supplier has failed to deliver within the delivery period stipulated in the contract.
 - (b) That no increase in price on account of any ground, whatsoever, including any stipulation in the contract for increase in price on any other ground and, also including statutory increase in or fresh imposition of customs duty, excise duty, sales tax/ VAT, Service Tax and Works Contract Tax or on account of any other tax or duty which may be levied in respect of the goods and services specified in the contract, which takes place after the date of delivery stipulated in the contract shall be admissible on such of the said goods and services as are delivered and performed after the date of the delivery stipulated in the contract.
 - (c) But nevertheless, the Purchaser/Consignee shall be entitled to the benefit of any decrease in price on account of reduction in or remission of customs duty, excise duty, sales tax/ VAT, Service Tax and Works Contract Tax or any other duty or tax or levy or on account of any other grounds, which takes place after the expiry of the date of delivery stipulated in the contract.
- 22.5 The supplier shall not dispatch the goods after expiry of the delivery period. The supplier is required to apply to the Purchaser/Consignee for extension of delivery period and obtain the same before despatch. In case the supplier dispatches the goods without obtaining an extension, it would be doing so at its own risk and no claim for payment for such supply and / or any other expense related to such supply shall lie against the purchaser.

23. Liquidated damages

- 23.1 Subject to GCC clause 26, if the supplier fails to deliver any or all of the goods or fails to perform the services within the time frame(s) incorporated in the contract, the Purchaser/Consignee shall, without prejudice to other rights and remedies available to the Purchaser/Consignee under the contract, deduct from the contract price, as liquidated damages, a sum equivalent to 0.5% per week of delay or part thereof on delayed supply of goods and/or services until actual delivery or performance subject to a maximum of 10% of the contract price. Once the maximum is reached Purchaser/Consignee may consider termination of the contract as per GCC 24.

During the above-mentioned delayed period of supply and / or performance, the conditions incorporated under GCC sub-clause 22.4 above shall also apply.

24. Termination for default

- 24.1 The Purchaser/Consignee, without prejudice to any other contractual rights and remedies available to it (the Purchaser/Consignee), may, by written notice of default sent to the supplier, terminate the contract in whole or in part, if the supplier fails to deliver any or all of the goods or fails to perform any other contractual obligation(s) within the time period specified in the contract, or within any extension thereof granted by the Purchaser/Consignee pursuant to GCC sub-clauses 22.3 and 22.4.
- 24.2 In the event of the Purchaser/Consignee terminates the contract in whole or in part, pursuant to GCC sub-clause 24.1 above, the Purchaser/Consignee may procure goods and/or services similar to those cancelled, with such terms and conditions and in such manner as it deems fit and the supplier shall be liable to the Purchaser/Consignee for the extra expenditure, if any, incurred by the Purchaser/Consignee for arranging such procurement.
- 24.3 Unless otherwise instructed by the Purchaser/Consignee, the supplier shall continue to perform the contract to the extent not terminated.

25. Termination for insolvency

- 25.1 If the supplier becomes bankrupt or otherwise insolvent, the purchaser reserves the right to terminate the contract at any time, by serving written notice to the supplier without any compensation, whatsoever, to the supplier, subject to further condition that such termination will not prejudice or affect the rights and remedies which have accrued and / or will accrue thereafter to the Purchaser/Consignee.

26. Force Majeure

- 26.1 Notwithstanding the provisions contained in GCC clauses 22, 23 and 24, the supplier shall not be liable for imposition of any such sanction so long the delay and/or failure of the supplier in fulfilling its obligations under the contract is the result of an event of Force Majeure.
- 26.2 For purposes of this clause, Force Majeure means an event beyond the control of the supplier and not involving the supplier's fault or negligence and which is not foreseeable and not brought about at the instance of, the party claiming to be affected by such event and which has caused the non – performance or delay in performance. Such events may include, but are not restricted to, acts of the Purchaser/Consignee either in its sovereign or contractual capacity, wars or revolutions, hostility, acts of public enemy, civil commotion, sabotage, fires, floods, explosions, epidemics, quarantine restrictions, strikes excluding by its employees, lockouts excluding by its management, and freight embargoes.
- 26.3 If a Force Majeure situation arises, the supplier shall promptly notify the Purchaser/Consignee in writing of such conditions and the cause thereof within twenty-one days of occurrence of such event. Unless otherwise directed by the Purchaser/Consignee in writing, the supplier shall continue to perform its obligations under the contract as far as reasonably practical, and shall seek all reasonable alternative means for performance not prevented by the Force Majeure event.
- 26.4 If the performance in whole or in part or any obligation under this contract is prevented or delayed by any reason of Force Majeure for a period exceeding sixty days, either party may at its option terminate the contract without any financial repercussion on either side.
- 26.5 In case due to a Force Majeure event the Purchaser/Consignee is unable to fulfil its contractual commitment and responsibility, the Purchaser/Consignee will notify the supplier accordingly and subsequent actions taken on similar lines described in above sub-paragraphs.

27. Termination for convenience

- 27.1 The Purchaser/Consignee reserves the right to terminate the contract, in whole or in part for its (Purchaser's/Consignee's) convenience, by serving written notice on the supplier at any time during the currency of the contract. The notice shall specify that the termination is for the convenience of the Purchaser/Consignee. The notice shall also indicate interalia, the extent to

which the supplier's performance under the contract is terminated, and the date with effect from which such termination will become effective.

27.2 The goods and services that are complete and ready in terms of the contract for delivery and performance within thirty days after the supplier's receipt of the notice of termination shall be accepted by the Purchaser/Consignee following the contract terms, conditions and prices. For the remaining goods and services, the Purchaser/Consignee may decide:

- a) To get any portion of the balance completed and delivered at the contract terms, conditions and prices; and / or
- b) To cancel the remaining portion of the goods and services and compensate the supplier by paying an agreed amount for the cost incurred by the supplier towards the remaining portion of the goods and services.

28. Governing language

28.1 The contract shall be written in English language following the provision as contained in GIT clause 4. All correspondence and other documents pertaining to the contract, which the parties exchange, shall also be written accordingly in that language.

29. Notices

29.1 Notice, if any, relating to the contract given by one party to the other, shall be sent in writing or by cable or telex or facsimile and confirmed in writing. The procedure will also provide the sender of the notice, the proof of receipt of the notice by the receiver. The addresses of the parties for exchanging such notices will be the addresses as incorporated in the contract.

29.2 The effective date of a notice shall be either the date when delivered to the recipient or the effective date specifically mentioned in the notice, whichever is later.

30. Resolution of disputes

30.1 If dispute or difference of any kind shall arise between the Purchaser/Consignee and the supplier in connection with or relating to the contract, the parties shall make every effort to resolve the same amicably by mutual consultations. The jurisdiction for the settlement of disputes will be at New Delhi, India.

30.2 If the parties fail to resolve their dispute or difference by such mutual consultation within twenty-one days of its occurrence, then, unless otherwise provided in the SCC, either the Purchaser/Consignee or the supplier may give notice to the other party of its intention to commence arbitration, as hereinafter provided the applicable arbitration procedure will be as per the Arbitration and Conciliation Act, 1996 of India. In the case of a dispute or difference arising between the Purchaser/Consignee and a domestic Supplier relating to any matter arising out of or connected with the contract, such dispute or difference shall be referred to the sole arbitration of an officer, appointed to be the arbitrator by the Director General of ESIC. The award of the arbitrator shall be final and binding on the parties to the contract subject to the provision that the Arbitrator shall give reasoned award in case the value of claim in reference exceeds Rupees One Lac (Rs. 1,00,000/-)

30.3 Venue of Arbitration: The venue of arbitration shall be New Delhi, India.

31. Applicable Law

The contract shall be governed by and interpreted in accordance with the laws of India for the time being in force.

32. General/ Miscellaneous Clauses

32.1 Nothing contained in this Contract shall be constructed as establishing or creating between the parties, i.e. the Supplier/its Indian Agent/CMC Provider on the one side and the Purchaser on the other side, a relationship of master and servant or principal and agent.

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- 32.2 Any failure on the part of any Party to exercise right or power under this Contract shall not operate as waiver thereof.
- 32.3 The Supplier shall notify the Purchaser/Consignee of any material change would impact on performance of its obligations under this Contract.
- 32.4 Each member/constituent of the Supplier/its Indian Agent/CMC Provider, in case of consortium shall be **jointly and severally liable** to and responsible for all obligations towards the Purchaser/Consignee for performance of contract/services including that of its Associates/Sub Contractors under the Contract.
- 32.5 The Supplier/its Indian Agent/CMC Provider shall at all times, indemnify and keep indemnified the Purchaser against all claims/damages etc. for any infringement of any Intellectual Property Rights (IPR) while providing its services under CMC or the Contract.
- 32.6 The Supplier/its Agent/CMC Provider shall, at all times, indemnify and keep indemnified the Purchaser/Consignee against any claims in respect of any damages or compensation payable in consequences of any accident or injury sustained or suffered by its employees or agents or by any other third party resulting from or by any action, omission or operation conducted by or on behalf of the supplier/its associate/affiliate etc.
- 32.7 All claims regarding indemnity shall survive the termination or expiry of the contract

SECTION – V**SPECIAL CONDITIONS OF CONTRACT (SCC)**

The following Special Conditions of Contract (SCC) will apply for this purchase. The corresponding clauses of General Conditions of Contract (GCC) relating to the SCC stipulations have also been incorporated below.

These Special Conditions will modify/substitute/supplement the corresponding (GCC) clauses. Whenever there is any conflict between the provision in the GCC and that in the SCC, the provision contained in the SCC shall prevail.

For GCC Clause No. 15.8:

After completion of Warranty period Annual Comprehensive Maintenance Contract (CMC) to be quoted as mentioned in General Technical specifications Section VII (Para-4) for all the items except for items at sl. no. 4, 7, 8, 9, 11, 12, 14, 23, 45, 49, 56 & 57.

SECTION - VI
LIST OF REQUIREMENTS

Part I:

Sl. #	Item Description	Department	Qty
1	Computerised Traction – Cervical & lumbar	Physiotherapy	1
2	Electrical Traction Cervical	Physiotherapy	1
3	E.M.G. machine	Physiotherapy	1
4	Hot packs with Hydroculator	Physiotherapy	1
5	Interferential therapy unit	Physiotherapy	1
6	Microwave diathermy	Physiotherapy	1
7	Paraffin wax bath	Physiotherapy	1
8	Short wave diathermy 500 watts	Physiotherapy	1
9	Transcutaneous nerve stimulator	Physiotherapy	1
10	Ultrasound with diff. head (4 sizes)	Physiotherapy	1
11	Examination couch	Physiotherapy	1
12	Cycle Ergo Meter	Physiotherapy	1
13	Treadmill with Odometer indicating time, speed, duration	Physiotherapy	1
14	Short wave diathermy 250 watts	Physiotherapy	1
15	Lithium analyser	Psychiatry	1
16	Bio-feed back instruments set	Psychiatry	1
17	Thin layer chromatography for drug dependence therapy	Psychiatry	1
18	ECT with EEG Monitoring	Psychiatry	1
19	Dental unit comprising of: a) Dental chair with overhead delivery system, Air rotor, Micromotor Light cure, Ultrasonic Scaler 3 tips, 3 way syringe and contra 8 straight Hand pieces (Air rotor) (b) Compressor	Dental	3
20	Intra oral camera	Dental	2
21	RVG (Radio visual graphy)	Dental	1
22	IOPA X- ray unit	Dental	2
23	Bleaching light	Dental	1
24	Autoclave	Dental	1

25	Impedence Audiometer	ENT	1
26	Cryosurgical unit	ENT	1
27	ENT operating microscope with zoom & 5 step magnification changer	ENT	3
28	ENT Examination chair	ENT	8
29	Mastoid drill (Micromotor) with hand piece	ENT	3
30	Puretone Audiometer	ENT	1
31	Combined A & B Scan	Ophthalmology	1
32	Fundus Camera with digital imaging system	Ophthalmology	1
33	Lensometer with printer	Ophthalmology	1
34	Operating Microscope with TV unit & camera	Ophthalmology	2
35	Perimeter	Ophthalmology	2
36	Phacoemulsifier machine	Ophthalmology	2
37	Slit lamp Biomicroscope	Ophthalmology	3
38	Yag Laser - double frequency	Ophthalmology	1
39	Yag Laser -Single frequency (diode/excimer)	Ophthalmology	1
40	Non contact Tonometer	Ophthalmology	3
41	Autokerato Refractometer	Ophthalmology	1
42	Cryo-surgery unit	Dermatology	1
43	Dark field Microscope	Dermatology	2
44	Electro-cautery machine	Dermatology	1
45	Phototherapy unit	Dermatology	1
46	Platelet agitator & incubator	Blood Bank	1
47	Automated Plasma thawing system	Blood Bank	1
48	Automatic component preparation machine	Blood Bank	1
49	Blood transportation box (Mobile)	Blood Bank	1
50	Blood bank refrigerator	Blood Bank	4
51	Blood collection monitor/ Haemomixer /biomixer	Blood Bank	3
52	Cell washer	Blood Bank	1
53	Centrifuge machine	Blood Bank	4
54	Dielectric Tube Sealer	Blood Bank	3
55	Donors couch	Blood Bank	3
56	Plasma expessor -manual	Blood Bank	1

57	Refrigerated Water bath for Plasma thawing	Blood Bank	1
58	Automated 5 part differential Haematology analyser With Reticulocyte count	Pathology	1
59	Centrifuge machine	Pathology(2) Biochemistry(6)	8
60	Deep Freezer (-20 °c to -40 °c)	Pathology(1) Blood Bank(2) Biochemistry(1)	4
61	Incubator 37 °c electric	Pathology(2) Blood Bank(2) Microbiology(6)	10
62	Refrigerated centrifuge	Pathology(1) Blood Bank(1) Microbiology(1)	3
63	Rotary Microtomes	Pathology	3
64	Auto urine analyser	Pathology	1
65	Auto cell counter 3 part	Pathology	2
66	Autoclave electric	Pathology	4
67	Automated 3 part differential Haematology analyser	Pathology	1
68	Automatic slide staining machine	Pathology	2
69	Automatic ESR Analyzer	Pathology	1
70	Cryostat with accessories	Pathology	2
71	Distilled water still plant glass	Biochemistry(3) Microbiology(3) Pathology(2) Blood Bank(2)	10
72	Fully Automated coagulation analyser	Pathology	1
73	Hot Air 50 °c Oven for sp. Staining	Pathology(4) Biochemistry(4) Microbiology(2) Blood Bank(2)	12
74	Micro haematocrit centrifuge	Pathology	2
75	Microscope Binocular with oil immersion, condenser, movable stage (High end)	Pathology(25) Biochemistry(2)	27
76	Water bath 57 °c	Pathology	4
77	Automatic Tissue Processor	Pathology	2
78	Automatic Tissue Embedding Station	Pathology	1
79	B.O.D. Incubator with CO2	Microbiology	1
80	Binocular Research Microscope	Microbiology	2
81	Bio safety cabinet	Microbiology	2

82	Centrifuge high power electrical	Microbiology	5
83	Deep freezer (-20 °c)	Microbiology	2
84	Deep freezer (-80 °c)	Microbiology(1) Blood Bank(2)	3
85	Elisa reader with washer & dispenser, printer (1each for all)	Microbiology	4
86	Incubator for Lab	Microbiology	2
87	Laminar Air Flow- Horizontal	Microbiology	2
88	Vertical Autoclave	Microbiology	2
89	Water Bath	Microbiology	7
90	Flash/ Horizontal Autoclave	Microbiology	2
91	Autoclave electric (2 nos. of each size) a) 12" x12"(All chamber) Single valve b) 12" x 12" (S.S. chamber) Single valve c) 12"x20" (S.S. chamber) Double valve	Biochemistry	6
92	Automated Densitometer with Electrophoresis	Biochemistry	1
93	Fully automatic Biochemistry analyser	Biochemistry	1
94	Fully automatic Chemiluminescent analyser	Biochemistry	1
95	Semi-automatic Biochemistry analyser	Biochemistry	3
96	Spectrophotometer	Biochemistry	1
97	Blood Gas Analyzer (Electrolyte Analyzer)	Biochemistry(2) Medicine(2) Cas(1) ICU(1) ICCU(1)	7

Part II: Required Delivery Schedule:

a) For Indigenous goods or for imported goods if supplied from India:

Within **60 days** from date of Notification of Award to delivery at consignee site. The date of delivery will be the date of delivery at consignee site (Tenderers may quote earliest delivery period).

b) For Imported goods directly from abroad:

Within **90 days** from date of opening of L/C. The date of delivery will be the date of delivery at consignee site (Tenderers may quote earliest delivery period).

Part III: Scope of Incidental Services:

Installation & Commissioning, Supervision, Demonstration, Trial run and Training etc. as specified in GCC Clause 13. Installation & Commissioning shall be completed within 15 days of handing over the site of installation, complete in all respect by the consignee. The date of handing over of the site has to be intimated by the supplier to the purchaser. The delay on the part of the supplier to install and commission the equipment will attract the provisions as contained in the liquidated damage clause.

Part IV:

Turnkey (if any) as per details in Technical Specification. The tenderer shall also specify the time schedule for completion of Turnkey work.

Part V:

Annual Comprehensive Maintenance Contract (CMC) as per details in General Technical Specifications para 4.

Part VI:**Required Terms of Delivery and Destination.****a) For Indigenous goods or for imported goods if supplied from India:**

Delivery required at Consignee Site.

Insurance (local transportation and storage) would be borne by the Supplier from warehouse to the consignee site for a period including 3 months beyond date of delivery

b) For Imported goods directly from abroad:

The foreign tenderers are required to quote their rates on DDP at consignee's site basis giving break up of the price as per the Proforma prescribed in the Price Schedule.

Custom clearance, handling, unloading & loading and transportation to the consignee's site shall be the responsibility of the supplier/ Indian agent.

Insurance (local transportation and storage) would be extended and borne by the Supplier from warehouse to the consignee site for a period including 3 months beyond date of delivery.

c) Destination/Consignee details are given in Section XXI**Part VII:****Inspection:****a) For Indigenous goods or for imported goods if supplied from India:**

At consignee site by the respective In-charge of the Hospital or his authorised representative.

b) For Imported goods directly from abroad:

Pre-despatch inspection at manufacturer's premises as per GCC clause 8.8 and inspection after arrival in India at consignee site by the respective In-charge of the Hospital or his authorised representative.

Section – VII

Technical Specifications

Item Sl. No. 1

Computerized Traction-cervical & lumbar

1. Description of Function

Cervical and lumbar traction units are useful therapy in relieving back and neck pain by causing a gentle stretch to the muscles and joints.

2. Operational Requirements

Intermittent & static traction, Variable speed control, Patient safety switch, LED displays

3. Technical Specifications

Microprocessor based Unit with continuous and intermittent mode, adjustable traction force, and Hold time and traction speed in 10 steps.

Traction force adjustable up to 900N (1.5-9.0 Kg.)

Traction time setting between (0-60 Sec.)

LED display of speed and traction settings

Protective device for accidental over traction setting.

Remote control for adjustments

Power Supply 220V/50 Hz

Patient Safety Switch

4. Accessories

1. Cervical Head Holder with Bar, Lumbar Traction Belts with Bar, Main Cord & Pulley Doubler.
2. Head-Halter, Pelvic & Thoracic Belts

5. Power Supply

Power input to be 220-240VAC, 50Hz fitted with Indian plug

6. Environmental Factors

1. Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility or should comply with 89/366/EEC; EMC-directive.

7. Standards and safety

7.1 Should be FDA/ CE/ UL / BIS approved product

7.2 Manufacturer should have ISO certification for quality standards

Item Sl. No. 2**Electrical Traction cervical****1. Description of Function**

Cervical traction unit is useful in relieving neck pain by causing a gentle stretch to the muscles and joints.

2. Operational Requirements

Intermittent & static traction, Variable speed control, Patient safety switch, LED displays

Wall mounted unit

3. Technical Specifications

Weight - 4 -15 Kg each 1Kg step

Hold time 10,20,40,60,80 sec. with LED/LCD display

Rest time 1,5,10,15,20 sec. with LED/LCD Display

Digital treatment time 30 min. pre-settable (can be set between 1-99 min. optional)

Patient safety switch

4. System configuration, Accessories and spares

1. Spreader Bar

2. Head-Halter

3. Main Cord

4. Operating Manual

5. Adjustable Stool

5. Environmental Factors

5.1 Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility, or should comply with 89/366/EEC; EMC-directive.

6. Power supply

Power input to be 220-240VAC, 50Hz fitted with Indian plug

7. Standards and safety

7.1 Should be FDA/ CE/ UL / BIS approved product

7.2 Manufacturer should have ISO certification for quality standards.

Item Sl. No. 3**EMG machine****1 Description of Function**

1.1 Electromyographs detect, process, and record the electrical activity of the skeletal muscles .EP graphic recorders measure and document the brain's electrical response to visual, auditory, or somatosensory stimuli. Electromyograph test the functional ability of peripheral nerves by using

integral stimulators to measure nerve conduction velocity (NCV), the rate at which a nerve can carry a signal from the point of stimulus by an electrode to the muscle that it innervates.

2 Operational Requirements

2.1 EMG System complete with EP recorders and all software and hardware is required.

3 Technical Specifications

3.1 1) Minimum 4 channel system with optical isolation with Ethernet connection for connecting to either to desktop system or laptop system for portable use

2) Motor NCV with automatic marking

3) Sensory NCV with automatic marking

4) F wave with split screen display with automatic marking of F responses showing the Max F, Min F and % F values.

5) H reflex & Blink reflex

6) Repetitive nerve stimulation with repetition rate of 0.5 Hz to 50 Hz

7) Insertional/Spontaneous EMG recording for minimum 300 secs on hard disk or unlimited buffer storage

8) EMG replay of minimum 300 sec of stored data from hard disk with audio and store in AVI format for review on any Windows Media Player PC.

9) Sympathetic skin response

10) Somato sensory evoked potentials (Upper and lower Dermatomes)

11) RR Interval program with programs for stand/sit/supine position & Heart rate variability calculations

12) Auditory evoked potentials: BAER , AEP programs

13) The software should have facility to measure the Patient Hearing Threshold before running the BERA test.

14) The software should be capable of Grand averaging of the responses for better signal quality for BERA recordings.

15) Auditory headphones with clicks, bips and tones

16) Visual evoked potentials: Pattern reversal VEP

17) 17" or better VEP monitor for visual evoked potential

18) Common mode input impedance > 1000Mohm

19) Low filter to be varied from 0.05 Hz - 500Hz or Higher

20) High filter to be varied from 30Hz - 5KHz or Higher

21) Gain to be varied from 0.5 ms/div to 1000 ms/div

22) Constant current stimulator with current variable from 0 to 100mA with increments of 0.5mA and pulse duration to be varied from 50µs - 1000µs with 50 µs increments.

- 23) Software adjustable notch filter
- 24) The electrical stimulator should have controls for stimulus delivery, intensity, store, reverse polarity button and two programmable buttons preferred by user
- 25) The base unit of the system should provide all the controls for performing the test, switching to other test protocols and review of the test with control knobs for sensitivity, gain, marking cursors, pulse width etc. with In-built comprehensive nerve/muscle directory
- 26) Automatic report generation and grammatically frame the sentences and print in the report.
- 27) The software should be supplied with Normative data for computation and online comparison with test values
- 28) Software to have facility to quickly review the complete summary of the all the acquired traces and tabulate the results without need to go in each and every test protocol.
- 29) The software should have Live monitor window to view the raw signal of the data before acquiring or storing on the system.
- 30) The system should be supplied with branded Pentium Core 2 Dual Processor with minimum of 2.7 GHz, 512 MB RAM, 120 GB Hard Disk, 15" flat panel TFT /LCD monitor, DVD Writer, Laser Printer, UPS, Trolley & Electrode starter kit.
- 31) The system should have Quantitative EMG with Multi MUP, Interference pattern with online cloud plot, P300, Skin temperature probe.

4 System Configuration Accessories, spares and consumables

4.1 System as specified

4.2 The system should include: Branded PC with at least 15" TFT/LCD monitor, DVD-RW combo drive, laser printer, with latest WINDOWS operating system, Trolley, complete set of electrodes
Amplifier and up to 2 electrical stimulators
AEP click stimulator with headphones,
VEP stimulator 17" monitor

5. Power Supply

5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug

5.2 UPS of suitable rating with voltage regulation and spike protection for 60 minutes back up.

6 Standards & Safety

6.1 Should be FDA / CE/UL/ BIS approved product

6.2 Shall meet IEC 60601-2-040 Safety requirements - Part 2-040: Particular requirements for Electromyographs and Evoked Response Equipments

6.3 Manufacturer should have ISO certification for quality standards.

Item Sl. No. 4**Hot packs with Hydro collator****1. Description of Function**

A Hydrocollator unit is a heating unit used to heat up the hydrocollator pack. A hydrocollator pack is a silica gel filled pack that is soaked in hot water (in a hydrocollator unit) to provide prolonged moist heat. These hydrocollator packs are used to give heat therapy to the patients.

2. Operational Requirements

The unit should be able to run at least 8 hours/day with a temperature range from at least 50 deg to 60 deg centigrade or more.

3. Technical Specifications

(LARGE – 8 PACKS, SMALL – 4 PACKS)

Should be made of heavy gauze stainless steel sheet, double walled, and fully insulated in between.

Should be fitted with 2000 watts immersion heater, pilot light, and thermostat for heat control

Large – should have 8 steam packs (five standards, one half, one neck and one full back size).

Small – 4 small size packs

4. Environmental Factors

1. Shall meet IEC-606-1-1-2:2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility or should comply with 89/366/EEC,EMCdi

5. Power Supply

Power input to be 220-240 VAC, 50Hz fitted with Indian plug

6. Standards & safety

1. Should be FDA/ CE, UL/ BIS approved product.
2. Manufacturer should have ISO certification for quality standards.

Item Sl. No. 5**Interferential therapy unit****1. Description of Function**

Interferential therapy is basically a current therapy used in the treatment of circulatory disorders, range of motion, edema and muscle spasms. Interferential current is a form of electrical therapy that delivers currents to deep tissues through the use of kilohertz-carrier-frequency pulsed or sinusoidal currents to overcome the impedance offered by the skin. It is a deeper form of TENS.

2. Operational Requirements

A choice of two or four pole treatment and have a facility to enable the user to set the "beat"

frequency according to the condition being treated with rechargeable internal battery.

3. Technical Specifications

Should have low & medium frequencies current for electrotherapy

Treatment mode: 2 & 4 pole with dipole vector field with TENS

Galvanic, faradic MF surge & NME stimulation

Direct Base Frequency: 0 to 150 Hz

Intensity balance : Available

Timer : 0 to 99 minutes

Intensity control: 0 to 100 mA adjustable

Large programmable memory with preset programme

Carrier wave frequency adjustable between 2-10 KHz

Large LCD display for treatment parameter & option of CC/CV mode

With standard essential Accessories

4. Power Supply

Power input to be 220-240 VAC, 50Hz fitted with Indian plug

UPS of suitable rating with voltage regulation and spike protection for 60 minutes back up.

5. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards.

Item Sl. No. 6

Microwave therapy unit

1. Description of Function

Diathermy machine that uses microwave radiation as a source of heat for pain management

2. Operational Requirements

A device using electromagnetic energy in the frequency range of approx. 2456 MHz for therapeutic purposes. The unit includes electrodes, the generator, and all associated electronics, controls and enclosures.

3. Technical Specifications

A continuous and pulsed microwave therapy unit with following features;

Operating frequency : 2450 ±50 MHz

HF pulse output : 1.5 to 1.6 kw

HF output : 250w, 50w, 10w

Time adjustment : 0 to 30 min. With automatic shutoff

Should have an emergency control switch

Should have broad radiator range (hollow, long field and round field radiators)

Should automatically identify the radiator and adjust the device output.

5. Power Supply

Power input to be 220-240VAC, 50Hz fitted with Indian plug

6. Standards and Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards.

Item Sl. No. 7

Paraffin wax bath

1. Description of Function

Uses melted paraffin wax under moderate temperature for mobilization of stiff joints, scars and to relieve pain.

2. Operational Requirements

Large Size approx 22"x16"x12" and small size approx. 12"x12"x10"

3. Technical Specifications

Should be made of heavy gauge stainless steel sheet

Top should have anodized aluminum cover

Should be covered with laminated wood rim all around

Mounted on ball bearing rubber castors for easy mobility

Strip heaters of 2kw should be fitted at the bottom of the tank

Three levels of power control with thermostat of temperature from 30 to 110⁰ C .

Indicator lamps for mains and temperature

All standard accessories desired for proper functioning of the machine.

4. Power Supply

Power input to be 220-240 VAC, 50Hz fitted with Indian plug

5. Environmental Factors

1. Shall meet IEC-606-1-1-2:2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility or should comply with 89/366/EEC, EMCdirective

6. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 8**Short wave diathermy 500 watts****1. Description of Function**

Short Wave diathermy produces high frequency alternating current. The heat energy obtained from the wave is used for giving pain relief to the patient.

2. Operational Requirements

A device using electromagnetic energy in the shortwave frequency range (3-30 MHz) for therapeutic purposes

The unit includes electrodes, the shortwave generator, and all associated electronics, controls and enclosures.

3. Technical Specifications

Output of 400 to 500 Watt in continuous mode and 800 to 1100W in Pulse mode

Pulse repetition frequency of 20 to 200Hz adjustable in 10 steps.

LCD Screen Display of parameter.

Treatment timer with all standard accessories, condenser pad with cable

Disc electrodes with arms and cables.

Patient safety switch

4. Power Supply

1. Power input to be 220-240VAC, 50Hz fitted with Indian plug

5. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 9**Transcutaneous nerve stimulator****1. Description of Function**

T.E.N.S. (Transcutaneous Electrical Nerve Stimulation) units are widely used in hospitals for effective drug free pain relief. Use to treat shoulder pain, back/neck pain, aching joints, rheumatic pain, migraines /headaches, sports injuries, period pain etc.

2. Operational Requirements

TENS works by stimulating nerves close to the skin releasing endorphins (nature's anaesthetics) and helping to block the pain signals sent to the brain.

The TENS four Channel machine deliver the pulse rate, pulse width and treatment time.

3. Technical Specifications

It must have with following such as Faradic, Surge Faradic, Galvanic, Int Galvanic, Cont TENS &

Surge TEN

Waveforms: Biphasic

Frequency: Low: 1-20Hz

High: 80-120Hz

Pulse width: 50-800µsec

Amplitude or Intensity: 1-100mA

It must have timer from 0-99Minute

Stimulation modes: Conventional, Modulated, Pulsed-Burst, Strong-Low rate, Brief-intense, hyper stimulation

It must have LCD Display

It must have power off, Adjustable warning volume

It should be supplied with all necessary accessories

4. Power Supply

Power input to be 220-240VAC, 50Hz fitted with Indian plug

5. Environmental Factors

1. Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility

6. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 10

Ultrasound with diff.head (4 sizes)

1. Description of Function

Ultrasound uses a high frequency sound wave emitted from the sound head when electricity is passed through a quartz crystal. The sound waves cause the vibration of water molecules deep within tissue causing a heating effect. When the sound waves are pulsed, they cause a vibration of the tissue rather than heating. The stream of sound waves helps with nutrition exchange at the cellular level and healing. Ultrasound is helpful for ligament healing and clinically, for carpal tunnel syndrome, and muscle spasm

2. Operational Requirements

Microprocessor based, Continuous & Pulsed modes, adjustable digital timer, auto shut off with buzzer, easy to use & sturdy machine

3. Technical Specifications

Microcontroller Based model

Timer: This is a 60 min. count down digital timer used to set the treatment time by pressing switches labeled “F/equivalent” For fast reduction and “S/equivalent” for slow reduction. When display shows “Zero/equivalent” reading, the power output gets cut-off

With an audible buzzer sound to indicate completion of treatment

Treatment mode: Continuous/pulsed

Selector Switch: Feather touch keys are provided to select the mode of operation i.e. continuous, Pulse 1, Pulse 2, Pulse 3, or Pulse 4 which can be seen by the corresponding visual indication for each mode.

Power Output : 0-3 Watts per sq. cm.

Continuous Mode : 0-15 Watts

Pulse Mode : 0-21 Watts

Frequency : 1 MHz

It should be supplied with all necessary accessories

4. Power Supply

Power input to be 220-240VAC, 50Hz fitted with Indian plug

5. Environmental Factors

1. Shall meet IEC-606-1-1-2:2001(or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility or should comply with 89/366/EEC, EM C

6. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 11

Examination couch

1. Description of Function

Electric, variable height, three section table is suitable for all treatments, including manipulation.

2. Operational Requirements

- 1.High quality, functional and extremely durable physiotherapy tables
- 2.3 section electric physiotherapy couch with 45° positive and 65° negative inclination
- 3.Centre section elevates by 42° and 'leg' section can be raised into a 90° upright position
- 4.Height adjustable arm and shoulder sections

3. Technical Specifications

1.Three section bed with steel(grade 304)frame.

Length- 72-75 inches.

Height: 28-30 inches.

Width: 22-25 inches.

2. In case of electrical failure, can be operated mechanically.

3. Upholstered top with 4" thick, 40 density mattress.

4. Accessories

Thoracic spine belt

Lumbar spine belt

Head halter.

Spreader bar

Mains cable

Operating Manual

Adjustable stool

5. Power Supply

Power input to be 220-240 VAC, 50Hz fitted with Indian plug

6. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 12

Cycle Ergo meter

1. Description of Function

It is an active exercise unit.

2. Operational Requirements

Capacity to bear load should be approx 150kgs.

3. Technical Specifications

1. Tubular steel frame on properly balanced legs with four rubber tips

2. Fitted with one hard rubber tyre wheel, standard chain and a socket

3. Seat should be adjustable

4. Should be fitted with a ball bearing resistance roller which permits controlled movement in riding

5. Should supplied with all standard accessories

4. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 13**Treadmill with Odometer indicating time, speed, duration****1. Description of Function**

A treadmill that runs continuously in a circular pattern. It has multiple uses in Exercise training, adult fitness program and obesity control management

2. Operational Requirements

Soft Start / stop feature

Emergency stop switch

LED Displays

3. Technical Specifications

Rugged two level heavy duty Structure

Speed range 0-12 km/h

Elevation – 0-12 %

Walking area – 48x20 inches.

Ergonomically designed front and side handles

Emergency stop switch

Powder coated body.

User weight capacity 150 kg

Soft start/stop feature

Digital display of speed elevation

Display of stage number, stage time, distance covered, pace, calories/minute

Should supplied with all standard accessories

4. Power Supply

Power input to be 220-240 VAC, 50Hz fitted with Indian plug

5. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 14**Short wave diathermy 250watts****1. Description of Function**

Short Wave diathermy produces high frequency alternating current. The heat energy obtained from the wave is used for giving pain relief to the patient.

2. Operational Requirements

A device using electromagnetic energy in the shortwave frequency range (3-20 MHz or more) for

therapeutic purposes

The unit includes electrodes, the shortwave generator, and all associated electronics, controls and enclosures.

3. Technical Specifications

Output of 200 to 250 Watt in continuous mode and 400 to 500 in Pulse mode

Pulse repetition frequency of 20 to 200 Hz adjustable in 10 steps.

LCD Screen Display of parameter.

Treatment timer with all standard accessories, condenser pad with cable

Disc electrodes with arms and cables.

Patient safety switch

4. Power Supply

1. Power input to be 220-240VAC, 50Hz fitted with Indian plug

5. Standards & Safety

Should be FDA/ CE/UL / BIS approved product

Manufacturer should have ISO certification for quality standards

Item Sl. No. 15

Lithium Analyzer

1. For analysis of Electrolytes in serum, plasma, urine and body fluids
2. System should measure Na, K, Cl, Ca, Li

3.1	System should measure Na, K, Cl, Ca, Li
3.2	Facility for auto sampler tray for constant loading. Sample can be fed by capillary syringe or sample tube directly
3.3	Sample volume should be less than 100 micro-liters.
3.4	Auto Calibration Facility and provision for economy mode.
3.5	Quality control facility
3.6	Facility of flagging of abnormal results and user programmable ranges.
3.7	Stand by mode: user controlled and automatically controlled
3.8	Memory for last 100 messages.
3.9	Built in printer for printing the data.
3.10	RS 232 (standard serial port) should be available

4.1	ISE Analyser-01
-----	-----------------

4.2	Na, K, Ca, Li, Cl Electrodes- 02 each (1 standard and 1 spare)
-----	--

5.1	Power input to be 220-240VAC, 50Hz
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5.2	Suitable UPS with maintenance free batteries for minimum one-hour back-up should be supplied with the system
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6.1	Should be FDA or CE approved product
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Item Sl. No. 16

Bio-feedback Instruments sets

Biofeedback machine

Computerized Biofeedback for GSR, Temperature, Pulse Rate, Respiration, EMG, EEG Parameters.

Specifications

- Online Acquisition, Display and Storage for EEG, EMG, Respiration, GSR, Pulse and Temperature.
- Automatic Calculation of Individual Channel Amplitudes and rates.
- 3D Games on High Resolution secondary monitor for feedback
- User selectable audio feedback control
- User selectable volume control in 10 steps
- “Biotrainer” Relaxation Therapy System
- Neuro feedback/ Brain Feedback System
- Individual Feedback control
- System Containing at least 12 Different 3D Animations.
- Comprehensive Reporting and Trend Data Analysis.

Computer Hardware

COMPUTER: Last Computer processor with at least 3GB RAM CD/DVD R/W, 500 GB HDD, Keyboard, and Mouse.

MONITOR-1: LCD monitor 21” for test data.

MONITOR-2: LCD monitor 21” for animation pictures.

PRINTER: - Windows supporting inkjet colour Printer.

OPERATING SYSTEM: Windows XP/ Vista

Item Sl. No. 17**Thin Layer chromatography for drug dependence therapy****1. THIN LAYER CHROMATOGRAPHY****1 Description of Function**

- | | | | |
|-----|---|--|--|
| 1.1 | Instrumental Thin-Layer Chromatography (or Planar Chromatography) is a modern separation technique, established worldwide and distinguished by flexibility, reliability and cost efficiency | | |
|-----|---|--|--|

2 Operational Requirements

- | | | | |
|-----|--|--|--|
| 2.1 | Complete with IP/BP/USP standards having movable applicator with in-built thickness arrangement between 0.25 mm to 0.35 mm having following components as per Technical Specifications | | |
|-----|--|--|--|

3 Technical Specifications

- | | | | |
|-----|--|--|--|
| 3.1 | <p>Technical Specifications Thin Layer Chromatography System:</p> <ol style="list-style-type: none"> 1. Spreader (Applicator) made of anodized aluminum, with fixed thickness and width of 5 cm, 10 cm and 20 cm. 2. Perspex brass size 125 x 25 cm to support 5 glass plate of size 20 x 20cm and two plates of size 20x5 cm 3. Plate store rack aluminum for ten 20x20 plates 4. Spotting template Perspex 5. Developing tank with lid 6. TLC plate set 20x20 cm or 20x 10 cm 7. Micro-Pipette 5 microliter and 10 microliter 8. Scriber for making lines 9. Glass sprayer with rubber bellow 10. TLC plate store cabinet 11. Special drying cabinet with inspection window 12. Dessicator cabinet 13. U.V. Chromatography inspection cabinet with two U.V. tubes 254 and 365nm | | |
|-----|--|--|--|

4 System Configuration Accessories, spares and consumables

- | | | | |
|-----|---|--|--|
| 4.1 | All consumables required for installation and standardization of system to be given free of cost. | | |
|-----|---|--|--|

5 Power Supply: 230V +/- 10%, 50 Hz**6 Standards:**

- | | | | |
|-----|---|--|--|
| 7.1 | <ol style="list-style-type: none"> 1. Should be FDA/CE/ BIS approved product. 2. Manufacturer should have ISO certification for quality standards.. | | |
|-----|---|--|--|

Item Sl. No. 18**Electro Conclusive therapy with EEG monitoring****1. Description of Function:**

The main aim of Electroconvulsive Therapy is to cause a massive convulsion in the brain (a massive epileptic fit). This is achieved by giving the brain an electric shock using an ECT Machine. ECT machines are, basically, transformers which modify Mains Current so that it is transmitted to the patient's skull in timed pulses.

2. Operational Requirements

1. The unit should have Parameter Display on LCD/LED
2. Should have auto Stimulus Voltage
3. Should have Auto Impedance Check
4. Should provide Output Display in joules & milli coulombs and EEG-ECG Monitoring on Thermal paper

3. Technical Specifications

Technical data stimulus:

1. Bidirectional Square Wave
2. Current: 0.8 Amp Constant
3. Frequency Range: 70 Hz (Fixed)
4. Pulse Width: 1 ms (fixed)
5. Mode: Auto & Manual
6. Stimulus Duration in Auto mode: 0.1 to 5.9 sec. in step of 0.1 sec.
7. Cerebral Stimulation 0 to 40 volts

4. Accessories

Integrated or standalone compatible printer should be supplied.

All the accessories to make equipment functional as per specifications should be supplied.

5. Power Supply

1. Power input to be 220-240VAC, 50Hz fitted with Indian plug
2. UPS of suitable rating with voltage regulation and spike protection for 60 minutes back up

6. Standards & Safety

1. Should be FDA/CE/UL or BIS approved product.
2. Manufacturer should have ISO certification for quality standards.

Item Sl. No. 19**Dental Unit comprising of:**

A. Dental Chair with overhead delivery system, air rotor, micromotor light cure, ultrasonic scaler 4 tips, 3 way syringe and contra 8 straight hand pieces (air rotor) - (to be quoted separately)

1 Description of Function

1.1 Dental Chair is the dental chair required for dental and surgical procedures.

2 Operational Requirements

2.1 Physiological dental chair operated by electricity

3 Technical Specifications

- 3.1. Dental unit should have latest overhead delivery system
- 3.2. It should have two 3 way syringes (tip autoclavable with 6 spare tips) one on unit side and other on the assistant side.
- 3.3. It should have one high speed Air Rotor terminal with water control on coupling supplied with handpieces.
- 3.4. It should have one high speed fiber-optic air-rotor terminal with handpiece
- 3.5. One air motor terminal having straight and contra angle handpieces
- 3.6. It should have LED light cure unit on unit sides (Min. Intensity 800 mW/cm² and wavelength range - 370 - 500 nm output)
- 3.7. It should have in-built Piezon LED (fiber-optic) Ultrasonic Scaler (frequency 28-36 KHz) with 4 scaler tips and one set of perio-curette tips
- 3.8. It should have infection control system with non-retraction valves (Bio System/ equivalent)
- 3.9. All handpieces/ terminals should be kept on Autoclavable pads. 6 spare autoclavable pads should be supplied
- 3.10. Arm of unit should be pneumatically locked
- 3.11. All air tubing of the delivery system can be disinfected internally after every dental procedure
- 3.12. It should have latest foot operated LED/halogen Light (min 35,000 LUX)
- 3.13. It should have Rotatable Water System with removable spittoon
- 3.14. It should have Medium Vacuum Suction and High suction (Motorised Suction)
- 3.15. It should have following programmes:
 - Two programmable working positions
 - Spitting and last working position with light ON and OFF automatically
 - Return to Zero position with light OFF automatically

- It should have option to Lock the movements of chair
- It should have emergency stop control
- Programmable Bowl water and Cup filler water

3.16 It should have LED based X-ray viewer

3.17. It should be provided with right arm (options for Fixed, Lateral 90 degree swivel available)

3.18. It should have multifunctional foot control base (fixed or mobile)

3.19. It should be provided with one doctor's stool and one assistant's stool with adjustable backrest tilt including an adjustable ring for foot rest.

3.20. Oil Free Air Compressor (Medical Grade) with Air moisture filter

4 System Configuration Accessories, spares and consumables

4.1 System as specified

4.2 All consumables required for installation and standardization of system to be given free of cost.

4.3 Provision for modular furniture with sink for dental operator 10feet x 2 feet or dimensions as required by the operator.

5.1 Complete installation of the system including water input and drainage system has to be installed

6 Power Supply

6.1 Power input to be 220-240VAC, 50Hz

6.2 Five KV Servo Voltage stabilizer of appropriate ratings meeting ISI Specifications. (Input 160-260 V and output 220-240 V and 50 Hz)

7 Standards & Safety

7.1 Should be FDA/ CE approved product

7.2 Manufacturer/Supplier should have ISO certification for quality standards.

7.3 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450

B. Compressor - (to be quoted separately)

Should produce oil-free, dry & filtered compressed air, which can be used for the operation of dental equipment

Unit should include pressure tank, electric cyclone separator, compressor machine with 4 aggregate. Heat exchanger, refrigerant dryer, ventilators, manometers, control box with display.

- Manufacturer should be ISO & CE certified.

Item Sl. No. 20**Intra oral camera****1 Description of Function**

1.1 Intra-oral camera is required for documenting video and still images of intra-oral procedures

2 Operational Requirements

2.1 High resolution Intra-Oral camera based on CCD technology

3 Technical Specifications

- 3.1. Should give true image (not a mirror image)
- 3.2. Light source integrated into hand piece
- 3.3. Sealed design and hygienic material for proper disinfection
- 3.4. The image live/freeze/save functions should be initiated by the station foot control
- 3.5. Ergonomical shape of handle
- 3.6. True imaging angle of 530 approx
- 3.7. Viewing orientation - 90o approx
- 3.8. Magnification – minimum 40X
- 3.9. Resolution – minimum 470 lines
- 3.10. Focal range – min. 6mm to infinity
- 3.11. Light source – four output halogen, 32,000 LUX at 10 mm
- 3.12. It should be supplied along with Desktop computer 20 inch screen, Intel Pentium Quad Core, 500 GB HDD, RAM 4 GB, DVD-RW, latest genuine windows version software and color laser jet printer.

4 Power Supply

5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug

5 Standards, Safety and Training

- 5.1 Should be FDA/ CE approved product
- 5.2 Manufacturer/ Supplier should have ISO certification for quality standards.

Item Sl. No. 21**RVG (Radio-visual graphy)****1 Description of Function**

1.1 RVG is used for digital dental x-rays which can be instantly viewed and evaluated with minimal radiation exposure

2 Operational Requirements

2.1 High resolution RVG based on CCD/CMOS technology

3 Technical Specifications

- 3.1. Min. 90% reduction in patient radiation as compared to X-ray film
- 3.2. Should supply sensor with minimum active area – 600 mm²
- 3.3. Thickness of the sensor should be less than or equal to 5 mm
- 3.4. Spatial resolution approx. 25 line pairs/mm
- 3.5. Dynamic range (accurate measurement of bone density), should be more than or equal to 14 bit image acquisition
- 3.6. Computer with LCD color monitor 20 inch screen, Quad core, DVD-RW, 500 GB HDD, 4 GB RAM, All-in-4 laser jet printer
- 3.7. Intra oral X-ray unit should be DC based. (8mA/65-70 kv) with option for wall mount/ mobile stand
- 3.8. Should have positioning devices
 - a. Bitewing
 - b. Periapical
 - c. Endodontic

4 System Configuration Accessories, spares and consumables

- 4.1 X-ray unit should be supplied with lead apron, thyroid collar and gonadal sheath
- 4.2 Additional sensor with Minimum active area - 800 mm² (optional as per user's requirement)

5 Power Supply

- 5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug
- 5.2 Servo Voltage stabilizer of appropriate ratings meeting ISI Specifications.(Input 160-260 V and output 220-240 V and 50 Hz)

6 Standards, Safety and Training

- 6.1 Should be FDA/ CE approved product
- 6.2 Manufacturer/ Supplier should have ISO certification for quality standards.
- 6.3 Electrical safety for dental x-ray unit conforms to standards for electrical safety IEC-60601 / IS-13450

Item Sl. No. 22

IOPA X ray unit

- Mains voltage: 220v ± 10% AC, 50Hz
- Power Unit : 1 KVA
- Output: 70 KV, 8 mA
- FSD : 200 mm
- Total Filtration: 2.0 mm Al.
- Focal Spot < 1 mm

- Radiation Leakage < 1 mr/Hr
- Exposure Switch : Dead Man Type
- Timer Range (Digital Display): 0.05 to 3.2 secs.
- AERB type approved product

Item Sl. No. 23

Bleaching light

Ergonomic arc design, fitting the widest scope of illuminating

Proper and direct focus of illuminating light on teeth with distance guide

Full mouth whitening

Blue LED light sources with high output

Cool light causing no heat to patients.

No fan cooler, no noise.

Digital LCD display for overall understanding of processing.

10 preset programs with 6 adjustable settings of output.

Multiple settings of timing and power according to various requests of whitening treatment

Overall full mouth whitening in just one cycle of 15 minutes

Screw driver free design of arm allowing setting proper arm position by just pulling and dragging by hands.

At least 10,000 hours of using life for LED.

Item Sl. No. 24

Autoclave

1 Description of Function

1.1 Autoclaves are required for sterilizing instruments in high temperature and high pressure steam.

2 Operational Requirements

2.1 Autoclave should be table top and front loading with fully automatic microprocessor based control

3 Technical Specifications

3.1 The autoclave should provide sterilization at 121° C and 134° C for both wrapped and unwrapped tools and also a flash cycle for rapid sterilization.

3.2 The autoclave should be equipped with a powerful vacuum pump to eject air pockets from the chamber at the beginning and at the end of cycle (Pre-vacuum and Post vacuum)

3.3 Water purification unit (based on reverse osmosis principle) should be supplied along with the autoclave, and it should be possible to connect the water purification unit directly to autoclave

for continuous supply of high quality demineralized water.

- 3.4 It should have minimum four sterilization programs and two test program. Programs should be monitored by microprocessor.
- 3.5 Chamber volume 22 -25 liters.
- 3.6 Loading can be min. 4 Kg instrument/ 1 Kg textile.
- 3.7 It should be class B autoclave so that hollow bodied instruments, handpieces, and turbines can be fully autoclaved.

4 Environmental factors

- 4.1 Shall meet IEC-60601-1-2:2001(Or Equivalent BIS)/ or EN61010-1-2 General Requirements of Safety for Electromagnetic Compatibility or should comply with 89/366/EEC; EMC-directive.

5 Power Supply

- 5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug
- 5.2 Servo Voltage stabilizer of appropriate ratings meeting ISI Specifications.(Input 160-260 V and output 220-240 V and 50 Hz)

6 Standards, Safety and Training

- 6.1 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450
- 6.2 Should be FDA/ CE approved product
- 6.3 Manufacturer/ Supplier should have ISO certification for quality standards.

Item Sl. No. 25

IMPEDENCE AUDIOMETER

- I. Probe frequency 226 Hz
- II. Pressure range +200 to -400dapa
- III. Volume range 0.2 ml to 5.0 ml
- IV. Frequencies for testing 500 hz, 1000 hz, 2000 hz, 4000 hz or more
- V. Reflexes: inslateral , contra – lateral, intensity 70db to not less than 100db, automatic
- VI. Eustachain tube mode pressure range +400 to -400dapa
- VII. Lcd screen for display of tympanogram and test results.
- VIII. Test programme – reflex test selectable
- IX. Probe with built in control lights
- X. Should have memory for test results
- XI. Should give a print record of test
- XII. Should be supplied with following accessories
 - A) Diagnostic probe
 - B) Contra phone receiver with head band

- C) Ear tip set
 - D) Mains cable
 - E) Paper roll for print out
 - F) Operating manual
- XIII. Power supply 230v, 50 /60 hz

Item Sl. No. 26

Cryo Surgical Unit

1. Facility to cutoff gas line without closing cylinder while inter changing probes.
2. Twin Trigger system to frost and defrost.
3. Cleaning the inner hypodermic needle should be much easier
4. System should be operated by CO2 or NO2 gas.
5. Console to house cylinder with temperature indicator
6. Probes Tips: Exo Cervical, Endo Exo Endo cervical and long Endo Exo Cervial, HPV, Flat and Round in different sizes and shapes.
7. System high quality and reliability.

Item Sl. No. 27

ENT Operating Microscope

- 1) Focussing System- Internal , Manual,Continuously adjustable from 200mm-415mm
Continuously adjustable via hand control,
- 2) Working length – 200mm to 415mm
- 3) Magnification – Manual Apochromatic in 5 steps.
- 4) Optics- - Apochromatic
- 5) Main Binocular Tube – Straight Tube with 12.5 x wide field eyepieces.
- 6) Main illumination and back-up – Xenon 180W lamp with daylight colour temperature
via light guide, Back-up Halogen 150W Twin light light Source.
- 7) Filters – UV/IR
- 8) Stand- Floor Stand should have locking/ unlocking facility with up/ down, to and fro and side
to side movement. Adjustable friction at all joints
- 9) knob for adjusting inter papillary distance
- 10) handle to mobilise microscope to be provided
- 11) Objective lenses required: 200 mm, 300mm and 400 mm
- 12) Voltage - 230V

13)Frequency – 50 Hz

14)Power Consumption- Max. 150 VA

Accessories:

1) Stereo Co-observation Tube with Binocular Tube

2) 3 Chip CCTV Camera

3) Desktop Computer with 19" LCD monitor.

Intel latest processor with 4 GB RAM, 500 GB Hard disk DVD RW VIDIA 9300 GE,512MB

Dedicated Graphics/LAN/ Card Reader/2.1 Speakers/In built in TV Tuner Card/Vista Home

Premium/Multi media keyboard mouse/Wireless LAN/ DesktopTrolley.

Item Sl. No. 28

ENT EXAMINATION CHAIR

1. Electromotive height adjustment by pedal switch 54cm to 74cm
2. Upper part rotatable around 360 degree with arresting brakes on both sides.
3. Seat with integrated handles rotary both 90 degree to right and to the left.
4. Variable inclination of back rest.
5. Synchronous coupling of back rest, arm rest and foot support
6. Should have read rest also
7. Power supply 230V/50Hz.

Item Sl. No. 29

Mastoid drill with hand piece

Specification :

1. High speed of 40000 rpm
2. Dual speed control from control box as well as foot pedal.
3. Both modes forward and reverse cutting.
4. Inbuilt pump for Irrigation.

MICROMOTOR HAND PIECES

Specification :

1. rated for minium 40000 rpm.
2. Ball bearing type so as to generate minium heat & vibration.
3. With attached Irrigation pipes.
4. Standard Coupling for Micromotor.
5. Straight hand pieces of high torque- 2 nos.
6. Oblique hand pieces of high torque–2 nos.

BURRS

1. Stainless Steel burrs cutting set of 12 varying from 0.7mm to 7mm standard length of 70mm, round
2. Diamond burrs complete set of six varying from 2.3mm to 7mm length 70mm, round.
3. Oil Spray for Hand pieces with Nozzle

Item Sl. No. 30**Pure Tone Audiometer**

- Two channel audiometer for clinical use interface with sound proof room with complete accessories to insure complete functionality

Specifications:

- Input: Tone, microphone 1&2 Tape/CD 1&2, NB, WN, SN
- Output: Left, right, bone, L&R, free-field, insert phones, High frequency phones

Frequency range

- Air conduction : 125 to 12000 Hz
- High frequency : 8000 to 20000 Hz
- Bone conduction : 250 to 8000 Hz
- Sound field : 250 to 12000 Hz
- Insert : 125 to 6000 Hz
- U-V meter : Two independent U-V meters one for Ch. 1 and 1 for Ch.2 speech
- Microphone : For live voice testing and communication
- Speech score counter
- External A and external B: To accept recorded speech material from external stereo tap cassette or CD player
- Talk forward, talk back and monitoring facilities
- Signal format
- Steady : Tone continuously present.
- Pulsed : Tone pulsed 200 mses ON, 200 msec OFF
- FM : Tone modulated +/- 5% of center frequency at rate of 5Hz
- With signal processing software and patient management software to be supplied with PC and manual
- All accessories for all above facilities to be included.

Airbone Or Tree Field

Pure, Pulsed Or Warble Tones

Frequency : 125 Hz 20 Khz

Bone Frequency : 250 Hz To 8 Khz

Attenuation : 1dB Step Resolution

To be able to Proceed All Type Of Test Including S.I.S.I. Ablb , Stenger, Rainville, Dli, Auto Thresh

Hold, Tone Decay, Mcl/Ucl, Dlf, Mlb

Built In Thermal Printer .

Should be regularly calibrated in warranty and contract period as per manufacturer's recommendations. (Please mention the frequency of calibrations as mentioned in operation or service Manual)

Item Sl. No. 31

A/B SCAN (OPHTHALMIC ULTRASOUND)

- High resolution dedicated A and B, ophthalmic scanning unit B scan will cross vector.
- The system should consist of fourth generation microcomputer and high speed digital electronics, with highest resolution monitor.
- Technical features:
 - A-scan
 - Three a scan modes
 - Auto biometric, manual biometric, diagnostic
 - Complete IOL program capabilities include SRK1 SRK11 SRK. T Holladay or Binkhorest formulas.
 - Save in memory capacity at least 45 cases for a-scan images and corresponding IOL data.
 - 10mhz solid probe
 - The unit should incorporate, audio feed back for probe alignment.
 - B-scan
 - 256 gray levels
 - User definable, DGC curve
 - Pre & post processing capabilities.
 - Volume, distance and area/ perimeter measurement
 - Selectable a-vector for simultaneous A/B display.
 - Annotation/arrow placement
 - Archiving of at least 150 patients in a single data file with an unlimited number of data files possible.
 - Complete IOL calculation capability with IOL data storage.
 - B-scan sector angle at least 55°
 - Standard accessories
 - Should include :
 - Console with 7'' display
 - Alphanumeric keyboard
 - Trackball
 - Foot pedal
 - 10 MHz probe for A

- 10/ 12.5 MHz and 35 MHz probes for B Sacn
- A scan calibration cylinder
- Probe holders etc.
- Vendors may quote other accessories
- Standard accessories should include:
- Console with 7” display
- Alphanumeric key board
- Trackball
- Foot pedal

Item Sl. No. 32

FUNDUS CAMERA

Capture mode: color/red-free/fa

Field angle: 500/30 -350/ 200

Filter: uv barrier filter

Optical head tilt: 150 up, 100 down

Flash: 21 steps

Working distance: 39 mm

Compensation of ametropia: +23 d to -23 d, continuous

Light source: 300 watt xenon

Frequency: 50hz

Pc specification: (preferred)

Pc system and fundus camera should be integrated so that time delay is not more than two seconds (transfer of photo) specification: latest intel processor, hdd 250gb or more, 4 gb ram, dvd r/w, cd writer, and keyboard scroll mouse, 21”

colour tft monitor photo quality printer, and motorized instrument table. System should be supplied with relevant licensed software.

Other hardware:

Digital camera > 12 mega pixels

Teleconverter lens, tv relay lens

Software: software for capturing, processing, archiving, consulting; software for pdt, linear distance and area

measurement, c: d ratio and stereo viewing.

Ups: suitable online ups with 30 min support

Color laser printer

Service & operating manual

Training – application

Item Sl. No. 33**Lensometer**

- Large measuring capacity (30mm to 90mm)
- LED Light source
- Power sources: Dry batteries or Ni-Cd rechargeable batteries with auto shut off
- Freely adjustable instrument tilt: 0-90 degrees
- Measures all types of lenses including progressive lenses
- PD Measurement available
- Built in thermal printer

Item Sl. No. 34**Operating Microscope with TV Unit & Camera**

Compact microscope body with high quality & complete apochromatic Optics with 1:6 zoom ratio. Magnification factor 0.4X to 2.4X.

Focusing range 50mm, Objective lens f= 200mm, 65mm diameter.

Binocular tube: Tilttable tube with integrated image inverter without any external attachment.

Eyepices: 10X with +8D to-5 D compensator.

Deepview: Depth of field management system for optimal depth perception & maximum light transmission.

ILLUMINATION :

Stereo Coaxial Illumination system for unique detail recognition, high contrast & stability of Red reflex even with strongly pigmented decentered and ametropic eye.

Retina Protection Device and contrast enhancement aperture.

Integrated 408nm UV barrier filter/ Blue blocking filter/ fluorescence filter.

X -Y COUPLING:

Motorized foot controlled X-Y coupling with automatic re-centering and X-Y inversion facility. X-Y Range should be at least 60mm x 60mm adjustable range.

Stereo co observation attachment with 360 Rotation -2 joints .

SUSPENSION SYSTEM:

14 function wireless foot control, Motorized foot controlled Zoom and focus with recentering of focussing position through foot control. Image inversion facility on foot control.

High quality floor stands with long spring balance suspension arm with effective length of 1Metre or more having load bearing capacity of at least 14Kg or More.

Stand should have touch screen LCD display with programming facility for setting the speed of XY, Zoom and focus, Foot Pedal.

Stand should have cold light fiber Optic illumination 12v 100w Halogen lamp with in built lamp housing with two lamps, with automatic Lamp changeover facility.

CCTV ATTACHMENT:

1CCD Camera with camera control unit, control unit should be integrated in the in the floor stand. Video o/p S video & analog through the stand & programming through LCD

display in the floor stand.

NETWORKING:

Ethernet interface for microscope i incl. 10 m cable

WIDE ANGLED VIEWING SYSTEM:

Wide angled Non Contact observation/ viewing system (autoclave able) with field of viewing 120deg.(minimum). With independent focussing

Item Sl. No. 35

Automated Visual Field Analyzer with printer (Perimeter)

- High quality goldman standard Imported automated full field perimeter with bowl size 30cm.Computer monitor should be inbuilt with the perimeter. Clinically validated normative database (FDA approved).
 - Maximim intensity 10,000Asb,Bowl illumination 31.5Asb
 - Floppy drive,Internal hard disk drive with future upgradation to MOD
 - Stimulation duration 200ms,wavelenth Broad band visible light
 - Stimulus/Background colour White on White
 - Maximum temporal range 90Deg.Suitable for central 30 as well as full field testing
 - Central field test patterns 30-2,24-2,10-2,Macula
 - Peripheral field test pattern 60-4,Nasal Step
 - Thresold test strategies full thresold,Fast Pac,SITA,SITA Fast,SITA Standard
 - Screening field test P-60,FF-80,FF-120,FF-240,Nasal Step for periphery .
 - Screening test strategies Two zone,Three Zone and Quantify Defects
 - Custom Test
 - Stimulus Size I-V as per goldmann standards
 - Glaucoma hemifield test,Heijl –Krakau blind spot moniter
 - Video eye monitering,Trial Lens Holder,
Touch screen on CRT as well as Keyboard & Mouse
 - Motorised chinrest, Motorised table with Laser Jet Printer
- OPTIONAL
Glaucoma progression analysis software

Item Sl. No. 36

Phacoemulsifier Machine

Graphic User Interface based on 8,4" color LCD and touch screen

Voice feedback for function selections-English.

Dual Linear footswitch, selection among 6 pre-programmed modes

surgeon can store up to 10 user programs

Peristaltic or Venturi type pump

I / A :

Vacuum level range progrmmable from 5 to 500mmHg (step 5mmHg) Closed system vacuum reading,(reading through a sterile silicone membrane), Reusable tubing, Reusable tubings are steam autoclavable up to 50 times or more

Irrigating pressure regulated by height of I V pole,

Continuous irrigation-controlled by footpedal and key on touch screen.

Flow rate range 25 levels, programmable from 2 to 50cc/min (step 2cc/min)

Rise time programmable on the following 25 levels: 0.5, 0.52, 0.55, 0.57, 0.6, 0.63, 0.65, 0.70, 0.75, 0.77, 0.85, 0.90, 0.95, 1.05, 1.15, 1.25, 1.4, 1.5, 1.8, 2.1, 2.5, 3.0, 4, 6, 12 sec.

Panel or linear Vacuum control by the foot pedal

Ultrasound:

Operating frequency approx 40 KHz

Stroke range 5 to 100 micron, step of 5 micron controlled by "Adaptive Power Control", panel or

Linear stroke control by the foot pedal

Operating modes : Continuous, Pulsed from 1 to 40 Hz, Single Burst, Multiple Burst, Continuous Burst- Available Pulse rates : 1,2,3,4,5,6,7,8,10,13,16,20,25,32,40Hz

Handpieces : 4 piezoelectric hand piece with 4 / 40 UNC thread for the U/S tip and 1/4-32 UNEF for the sleeve. (four crystals, titanium, ultra light) Handpiece natural titanium color, steam autoclavable up to 600 times or more, dishwasher-safe

U/S Tips: Coaxial Phaco with 4/40 UNC thread Incision size range from 2.2 mm upto 3.2 mm, Coaxila Phaco, Co-MICS, MMICS

19 GA, Color : gray (natural titanium),20 GA, Color : Blue, Co-MICS with 4/40 UNC thread

SLEEVES RANGE :

Silicone sleeve for 19 GA tips, Color: gray, thread 1/4-32 UNEF,Silicone sleeve for 20 GA tips, Color: blue, thread 1/4-32 UNEF

Vitrectomy:

Cutters reusable guillotine- Steam autoclavable. Adjustable port from 0.2mm up to 0.7mm,

Pneumatic cutter Cutting range from 60 to 700 cut / min. Available cut rates: 60, 70, 80, 90, 100, 110, 130, 150, 170, 190, 220, 250, 280, 320, 370, 420, 480, 540, 620, 700 cut/min

Compressed air from integrated air compressor, Operating pressure 2.0 +/-0.1 bars (28 +/-1.5 PSI)

Panel or Linear cut rate control by foot pedal

Diathermy:

Type : Bipolar Max power 7W @ 450hm, Power adjustment 5 to 100 % step 5,Operating frequency 2Mhz,Panel or Linear power control by foot pedal

Reusable diathermy forceps / Reusable diathermy pencil / Diathermy Bipolar Cable- steam autoclavable up to 50 times

Input voltage: 100/120/220/230-240 V(A.C.) selected, Mains frequency 50/60 Hz

Item Sl. No. 37**SLIT LAMP**

Haag - Streit type Slit lamp
Galilean converging binocular
Magnification variable 5-step, range 6x - 40x
Eyepieces 12.5x
Field of view 44 to 6
Interpupillary distance 50 to 80 mm
Slit length 0.2 to 12 mm
Slit width 0 - 12 mm
Filters cobalt blue, red-free, grey & heat absorbing
Slit rotation 0° - 180°
Vertical Tilting Slit 0 deg to 20 deg
Working distance: 80 mm
Fixation point luminous flexible red diode
Chin rest height adjustable 70 mm
Goldmann type Applanation tonometer
Digital camera attachment with hardware & software for image processing and storage

Item Sl. No. 38**YAG Laser –Double frequency****A. PHOTOCOAGULATOR**

MODE OF OPERATION : Continuous wave

TYPE : Solid state laser b

WAVELENGTH : 532nm

COOLING : Air cooled

AIMING BEAM : Continuous wave, diode laser, 635nm

B. SLIT LAMP

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SPOT SIZE: 50-1000µm

PROTECTION FILTER FOR SAFETY

MAGNIFICATION: 5step

ILLUMINATION UNIT: Slit width and length 0-14mm

Filters : blue, red-free, heat absorbing

Halogen lamp

POWER SUPPLY: 240V, 50-60Hz

BASE UNIT to allow longitudinal, lateral and vertical movements

C. SLIT-LAMP ADAPTER**D. Motorized table**

E. Mainster and PRP lenses

F. UPS 1000 VA

Item Sl. No. 39

YAG Laser-Single frequency

Laser wavelength of 1064 nm

- Fundamental Q-switched laser
- Energy continuously adjustable from 0.2 to 10 mJ
- Spot size of 8 microns
- Single, Double & triple pulse modes. Separation between pulse 20 microseconds
- Pulse repetition rate of better than 1 pulse per second
- Laser offset shift continuously adjustable upto 500 microns both anterior & posterior around the aiming focal plane
- Slit Lamp focal length 107 mm
- Cone angle 16 degrees
- Slit Lamp magnification 5 step 16x to 40x
- Aiming beam dual beam 635 nm diode, variable intensity upto 200 micro-watts
- Cooling system air convection

Item Sl. No. 40

Non Contact Tonometer

- General features
- Measurement: Non invasive automatically activated as the cornea is in focus
- Working distance: 13-15mm
- Air pulse: soft pulse with no additional administering of anaesthetic/indicator
- Measurement range IOP- 5 to 80 mmHg
- Accuracy: +/-1mm Hg
- Display: Graphic liquid crystal display module with yellow backlight seven segment common
- Anode LED display
- Technical specifications:
- Electrical requirements: 90 264V AC, 50 Hz
- Power consumption: 150W
- Hand set dimensions: 40X 270mm
- Base unit dimensions: 320X310X180mm
- Weight: 8.5 Kg. (Approx)
- Cooling: Air cooled
- Accessories:
- Standard: Table top, joystick assembly with chin rest arrangement
- CE/US FDA approved

Item Sl. No. 41**AUTO KERATOREFRACTOMETER**

The unit should be with the following superior features:

1. Automatic radius measurement
2. Automatic peripheral measurement
3. It should have adjustable tilt Colour LCD Monitor.Active accommodation relaxation
4. IOL measuring mode
5. Reliable PD measurement
6. Large cylinder measuring range up to 10 D
7. Measurement as from 2.3 mm pupillary diameter
8. In-built printer with paper cutter function – auto save mode

Technical Specifications: Refraction measurement

1. Sph - 25.0D → + 25.0 0.01 / 0.12 / 0.25 D. steps
2. Cyl 0 to + / - 10D IN 0.1 0.2 / 0.5 D. steps
3. Axis 0° to 180° in 1 ° steps
4. Automatic measurement (release) in the case of correct centering
5. 1 to 10 automatic measurements possible

Radius measurement

1. Surface refraction power 33.75 D→67.5 D in 0.01 / 0.12 / 0.25 D. steps
2. Radius 5.0 - 10.0 mm in 0.01 mm steps
3. Cylinder size 0 - 9.0 D (Axis 0° to 180° in 1 ° steps)

Cornea vertex distance 0 1 10 / 12 / 13.5 / 15 mm Min. pupillary diameter 2.3 mm

Pupillary distance Up to 85 mm in 1 mm steps Printer Internal thermal printer with cut-off facility

Monitor 14.5 cm colour LC display

Outputs RS232C and Video NTSC

- Motorized table
- C.V.

Item Sl. No. 42**Cryo-surgical unit**

1. Facility to cutoff gas line without closing cylinder while inter changing probes.
2. Twin Trigger system to frost and defrost.
3. Cleaning the inner hypodermic needle should be much easier
4. System should be operated by CO2 or NO2 gas.
5. Console to house cylinder with temperature indicator
6. Probes Tips: Exo Cervical, Endo Exo Endo cervical and long Endo Exo Cervial, HPV, Flat and Round in different sizes and shapes.
7. System high quality and reliability.

Item Sl. No. 43**Dark field microscope**

Should be equipped with imported dark field condenser and 100X oil immersion, with built-in Iris diaphragm

- having ball bearing quadruple nosepiece, built-in co-axial stage, both sides graduated for slide manipulation, coarse motion with universal locking device and highly sensitive fine focusing reading to 0.002 mm

-also supplied with interchangeable bright field condenser and all imported specially coated optics for fungus protection

-Eye piece 10X (wide field)

-objectives 4X, 10X, 40X and 100X oil immersion, springmounted with built-in Iris diaphragm

- complete with 6V, 20 W halogen lamp with controlled power system, solid state intensity control

- All accessories

Item Sl. No. 44**Electro cautery machine**

- Should be suitable for all types of surgeries
- Digital system with automatic patient plate monitoring
- Display: Digital
- Monopolar cut: 300 to 400 W
- Not less than two blend modes
- Provision for Spray, Desiccation
- Bipolar Coagulation
- Facility for underwater cutting
- Facility for simultaneous coagulation
- Audio visual alarm for breakage of contact between patient and plate
- Accessories:
 - Double pedal foot switch
 - Single Pedal Foot switch
 - Patient plate with cable x1
 - Autoclavable handles: 3 sets
 - Electrodes: 3 sets
 - Bipolar forceps with cord x 1
- All accessories should be from same manufacturer to ensure compatibility.
- All instruments should be autoclavable or Single Use. Single Use Disposables if offered

should be

- Sufficient for 20 surgeries
- The equipment should be US FDA/CE Approved
- Complete instruction and service manual should be supplied.

Item Sl. No. 45

Phototherapy unit

1. Dimensions of the chamber should be at least 6ft x 3ft x 3ft.
2. Phototherapy chamber of 18 UVA+18 NB UVB tubes designed for providing even irradiation of the body in the treatment area.
3. UV chokes must be provided to provide long life to the tube light and cooling fans for effective cooling of the unit.
4. Integrated dosimeter system for easy calculation of irradiation levels.
5. The equipment has CE or FDA or ISI certification.
6. Advanced micro computerized electronic LCD/TFT Controller which allows setting of Joules/time for UVA and milli Joules/time for NB UVB tubes
7. Automatic computation of irradiation time from joules/time for NB UVB tubes.
8. Dose limit can be preset and cumulative dose is displayed instantaneously with provision of storage of data. Provision of 'software backup' is preferable.
9. Variation in irradiation is taken care by built in UVA/NB UVB sensors which should be able to detect all irradiation completely and uniformly.
10. Switches the system 'off' automatically with warning alarm at the end of set irradiation time.
11. Built in memory system that helps to avoid error in treatment.
12. Body to be of a metal which is rust free so as to ensure long rust free life of the unit.
13. Automated and/or mechanical safety mechanism to prevent excess irradiation to the patients so as to avoid/prevent burns etc.
14. Electrical leakage circuit tripper/breaker in each panel to ensure maximum safety of the patient.
15. Open top unit to ensure maximum ventilation and prevent claustrophobia.
16. Mechanism to provide information to the patient regarding duration of treatment and time left for exposure during their treatment.
17. Computer for patient data management with software and interface for the phototherapy chamber which is RS232 compatible.
18. To be supplied with suitable stabilizer.
19. Black UV Goggles and Eye pads cover (3 pairs each for adult and 3 pair for children) as protective

Item Sl. No. 46**PLATELET AGITATOR & INCUBATOR****Platelet incubator**

Platelet incubator should have the provision to store the

Agitator for 48

Platelet bags agitator.

Should have clear view single pane tempered glass

Agitator should stop automatically once the door is opened.

Should have microprocessed controlled led Display,temperature graph Display

Should have stainless steelRTD sensor probes

Should have provision for 4"7day inkless chart recorder with Battery

Backup for contineous operation during power failure.

Should have all controls in one convenient location including Chart Recorder and alarm key

Should be able to maintain a temperature of 22 degrees with +/- 2 deg Variation.

Platelet agitator

Should be able to store minimum 48 random platelet bags or Apheresis bags

Or bags of different sizes. With gentle side to side motion (1 ½" 38mm)

Should have single fan for forced air circulation.

Should be sturdy one piece drawers with holes for complete air Circulation across both surfaces of palatelet bags

Should be CE marked

Item Sl. No. 47**AUTOMATED PLASMA THAWING EQUIPMENT**

1. Should be able to thaw 8 – 12 plasma bags

(ffp/apheresisor plasma bags of any size or any make)

2. Should have water bath based system which should be operational at 4 degree temperature to 37 degree celcius precisely.

3. Should be compact in size.

4. Should have rack holders with built-in fingers for securely holding the plasma bags of all sizes.

5. Should have an alarm when the plasma bags are thawed

6. Should have the provision for selecting programmed time setting for the length of thawing cycle.

7. Should haver digital timer clearly displaying the programmed set time or remaining cycle in minutes

8. Should have alarm system for adjustable over temperature alarm setting, audible and visual

alarm warnings,

9. Should have a deep thawing chamber for increased heat transfer efficiencies, which results in faster ffp thawing times. The clean streamlined design of the heavy gauge stainless steel chamber simplifies routine cleaning.

10. Should have a chamber drain system with a high flow rate to drain the chamber within 2-3minuts.

11. Should have a temprature controller

12. Suitable Servo controlled voltage stabiliser

13. Should be CE approved

Item Sl. No. 48

Automated Component Preparation Machine.

1. Should work with a Vertical parallel pressure plates that is pneumatically driven.
2. Should have a set of 13 pairs of Optical sensor to automatically control the flow of fluid in the tube.
3. Should have an Automatic clamping and sealing device to control the flow of fluid in the tubing.
4. It should have 6 to 8 buckets
5. Should include calibration
6. Should have a Protocol to drive the clamp functions.
7. Should be able to produce over 80% leucoreduced blood components by constantly removing buffy coat
8. Should be capable of mechanical separation and volume adjustment
9. Should be Compatible with Top & Bottom blood Pack System
10. Should provide log 1 leucoreduced blood components, with 5 days extended storage for platelets and 42 days
extended storage for Red Cells.
11. Should have a laser display for operator use.
12. Should be compatible with the Bar coding System

Item Sl. No. 49

MOBILE BLOOD TRANSPORTATION BOX

Mobile Refrigerated Transportation Box - should be able to transport Packed Red Cells, Whole Blood, Platelets, Plasma at the required specific temperatures

Should be robust, light weight, portable Mobile Refrigerated Transport Box made up of rotationally moulded polyethylene

Temperature Range adjustable from -20 deg C to + 22 deg C

Capacity to Hold 25-30 blood bags of 450 ml

Should work on AC & DC power with the provision of attachment to vehicle battery

Should have digital temperature display of the internal temperature with functional alarm systems to indicate variations in the set temperature.

Should be CFC free refrigerant

Item Sl. No. 50

Blood Bank Refrigerator

General

Should operate at 4 °C with +/- 1 °C temperature uniformity

Capacity: 400 litres approximately

Must be designed for blood bank use. Commercial or modified commercial refrigerators are not acceptable

Should be able to pass through standard door heights of 201 cm (79”) with casters without requiring the unit to be tipped or laid on its side.

Should be CE marked.

Construction

Should have an interior and exterior that is constructed of minimum 20 gauge, galvanized steel.

Should incorporate bacteria resistant, powder coated interior, exterior and door handle.

Should have a minimum non-CFC urethane insulation

Should utilize a self-closing door with full-length handle, key lock and non-CFC urethane insulation.

Should include swivel-locking casters as a standard feature.

Should incorporate a recessed interior floor to contain spills.

Should have a chamber access port in the top of the unit.

Should have an interior fluorescent light with control panel mounted switch as a standard feature.

Should have a light bulb that can be changed without removing the drawers.

Should have dual-pane, glass door and key lock with a right hand hinge.

Should have self-closing door system

Independent Temperature Controller

Should utilize an independent, microprocessor temperature controller that is programmable from +2 deg C to +8 deg C.

Should have a Microprocessor controlled temperature readout, readable in 0.1 deg C increments.

Should have a stainless steel, RTD temperature probe that is located in the chamber.

Should have all functions accessible through a touch pad on the control panel.

Should have refrigeration system “On” indicator provided as a standard feature.

Independent Alarm / Monitor System

Should be able to program the high and low temperature alarms.

Should have audible and visual high and low temperature alarms as a standard feature.

Should have a stainless steel RTD temperature probe located in the top portion of the chamber in a product simulation bottle.

Should have audible and visual door ajar alarm as a standard feature. Must have all functions accessible through a touch pad on the control panel. Should have an alarm silence button.

Should have alarm disable switch.

Should have remote alarm contacts as a standard feature.

Alarm should work on battery also.

Should provide a suitable voltage stabilizer

Should have battery backup with a minimum of 2 hours life.

Should have a power fail alarm as a standard feature.

Temperature Recorder

Must have four inch, 7-day, ink-less, pressure-sensitive circular chart recorder.

Must have chart recorder temperature range of -5oC to +20oC.

Must incorporate a separate battery backup to ensure continuous operation of the chart recorder during power failure.

Must have temperature recorder probe that is independent from other probes.

Must have power status indicator.

Must have an optional deduction of the chart recorder.

Should have LCD Temperature Graphs that should display 24 continuous hours of data and event logging of door openings and alarm conditions.

Should have adjustable alarm volumes and password protected configurations.

Refrigeration System

Must incorporate a heavy-duty, air-cooled refrigeration system designed to operate on 230 volt 50/60 Hz.

Must utilize non-CFC, commercially available refrigerant.

Must have an automatic condense evaporator as a standard feature.

Must have an internal evaporator fan that shuts off when the door is opened.

Must have a compressor that can maintain required chamber temperatures when operating between 200-240 volts and 50 Hz.

Must incorporate a defrost system that requires no defrost timer, electric heaters or defrost down time.

Must keep the refrigerator free of frost without elevating the chamber temperature.

Drawers

Must have solid bottom and liquid tight stainless steel drawers for containment of spills

Must incorporate Scratch-Guard drawer edge protectors that keep the glass from being scratched.

Must have fully extendable drawer slides.

Must have shelf standards with a clear powder-coated finish to guard against rust and corrosion.

Must have drawers that are adjustable

Must have optional drawer dividers available as an accessory.

Must have a cabinet designed to accommodate available optional half-size wire shelves, full-size wire shelves and rollout wire baskets with no cabinet modifications.

Item Sl. No. 51

Blood Collection monitor

- Weighing range 100—999ml
- Automatic tare to zero for the bag weight.
- Adjustable low and high flow alarms.

- Adjustable donation time out up to 20 minutes.
- Adjustable default volume.
- Automatic clamp of tubing at the end of the donation.
- Weighing accuracy +/- 2%.
- Power supply 115/230 VAC 50/60Hz
- Dimensions - 290(L) X 253(W)X 150(H)mm
- Weigh: about approx 5kg incl battery
- Should have a data memory of approx 30000 characters
- Provision to attach bar code reader (optional) for capturing external data related to donor
- Internal fuses to be PTC-self recovery to ensure continuous operations
- Automatic Calibration Feature

Item Sl. No. 52

CELL WASHER

1 Description of Function

1.1 Blood cell washer is used in washing blood cells for antiglobulin reagents.

2 Operational Requirements

2.1 Easy-to-use instrument should simplify work and save time in washing blood cells for antiglobulin reagent tests such as ABO compatibility, Rh testing, cross matching and the Coombs procedure.

3 Technical Specifications

3.1 It should be made of stable Robust, All-Steel Cabinet.

3.2 Max. rpm:: 3,000 or more

3.3 Max. RCF: 800 gm or more

3.4 Max. Volume: 12-place stainless steel rotor for 12 mm X 75 mm or 10 mm X 75 mm

3.5 Drive Unit should be Three-speed, brushless induction motor, with sealed, Lubricated bearings.

3.6 Should have: Sensor-touch control buttons/soft keypad with digital LED display

3.7 Should have safety Indication of disorders by self –diagnosis program

3.8 Should Display the Number of wash cycles and Time selected, Saline Level, Lid latch and

- have Alarm at end of run.
- 3.9 Indication of digital selectable from 1 to 4 wash Cycles.
 - 4 System Configuration Accessories, spares and consumables
 - 4.1 System as specified-
 - 4.2 All consumables required for installation and standardization of system to be given free of cost.
 - 5 Power Supply
 - 5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug
 - 5.2 Suitable UPS with maintenance free batteries for minimum one-hour back-up should be supplied with the system.
 - 6 Standards and Safety
 - 6.1 Should be FDA /CE/ UL or BIS approved product
 - 6.2 Manufacturer/Supplier should have ISO certification for quality standards.

Item Sl. No. 53

CENTRIFUGE

1 Description of Function

1.1 Centrifuges are required in the Laboratory to separate various components of Blood for analysis.

2 Operational Requirements

2.1 Aerodynamic compact construction for vibration free performance

2.2 Table top version

3 Technical Specifications

3.1 Angle Head rotor with Tube Capacity Size 5 – 15 ml

3.2 To have capacity to hold 24-36 tubes at a time.

3.3 Should have a digital timer

3.4 Body should be made of strong fabricated & corrosion resistant steel

3.5 Control panel – for start/stop switch, dynamic brakes, step less speed regulator with zero start switch & speed indicator with timer and protective fuses.

3.6 Door interlock

3.7 Maintenance-free brushless drive motor with exact speed pre selection and alphanumeric interactive LCD digital display in control panel of RPM & RCF.

Speed range **100 to 5000 rpm**

3.8 Choice of acceleration and braking profiles.

3.9 Imbalance detection and auto shut down.

4 System Configuration Accessories, spares and consumables

4.1 Tube Holders as appropriate

5 Environmental factors

5.1 Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) or General Requirements of Safety for Electromagnetic Compatibility.

6 Power Supply

6.1 Power input to be 220-240VAC, 50Hz as appropriate fitted with Indian plug

7 Standards and Safety

7.1 The supplier should be preferably ISO certified for quality standards.

7.2 Product should preferably be FDA/CE/ISI approved

Item Sl. No. 54

Tube sealer

1. Should be a hand held sealer for apheresis, Stem cell, leucoreduction processes and should have anywhere mobility for multiple application.
2. Should be supplied with one power source, hand held sealing head and one NICD rechargeable battery pack.
3. Should do 1000 seals per fully charged battery pack and battery should fully be charged within two hours.
4. Should be a smart sealer to adjust for different sized tubing.
5. Tear seal feature to make segments that can be separated by hand.
6. Should be certified for patient connected use.
7. Lightweight and compact for ease of mobility. Total weight approx.3kgs.
8. Should have PTC overload protection internal fuses to ensure continuous operations

Item Sl. No. 55

Donor Chairs

1. Description of Function

Blood Donor Couch is a completely automatic enveloping, variable tilt chair and specially designed to make blood withdrawals easier, safe and functional, and also for other diagnostic and therapeutic areas

2. Operational Requirements

- 1) Provides a comfortable position for the donor.
- 2) Variable positioning for either arm with Comfortably wide armrests.
- 3) Armrests have swinging out as well as up and down moving facility.
- 4) Reclining and upright body positions with a smooth shifting to any position.
- 5) Both sides have supporting brackets.
- 6) Drawers provided for the upkeep of equipment & consumables.
- 7) If a vasovagal attack occurs the Donor's head needs to be lowered immediately and his legs lifted above his heart level so that blood can flow back to the brain and other vital organs. This facility should be available

3. Technical Specifications

- 3.1 Comfortable chair type with soft padding for cushioning and rexin cover.
 - 3.2 Seat, back rest and leg rest size designed for donor comfort. It should have step less electric remote controlled height adjustment.
 - 3.3 Adjustable arm rest for donor's comfort and phlebotomist friendly
 - 3.4 Easily tilted to head low position, electrically operated
 - 3.5 Comfortable working level for the operator. Lifting capacity - Approx 200 kg.
 - 3.6 4 Lockable castors for easy mobility
 - 3.7 Storage Drawers for storing consumables & Blood Collection Monitors
 - 3.8 UP/DOWN control
 - 3.9 OPTIONS:
 - (i). A paper roll holder can be fixed on the' upper part of the chair.
 - (ii). Melodious musical Headphone can be integrated for patient relaxation while blood donation is in progress.
 - (iii). Preferable to have inbuilt trays & stands for keeping all blood collection accessories.
 - 3.10 Should have interface for blood collection monitor (optional)
- ## 4. System Configuration Accessories, spares and consumables
- 4.1 Donor Couch -01
 - 4.2 Dust Cover -01
 - 4.3 Power cable -01
 - 4.4 Arm Rests (pair) -01 pair
 - 4.5 Remote control -01
- ## 5. Power Supply
- 5.1 Power input: 220-240V/ 50 Hz AC Single phase or 380-400V AC 50 Hz Three phase fitted with appropriate Indian plugs and sockets.

5.3 Suitable Servo controlled Stabilizer/CVT

7. Standards and Safety

7.1 Should be FDA or CE approved product

7.2 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450

7.3 Manufacturer should have ISO certification for quality standards.

7.4 All electrical actuators and mechanisms should be housed inside the structure making the product safer

Item Sl. No. 56

PLASMA EXPRESSOR (Manual)

Mechanical plasma extractor.

Manual system – accept all kinds of blood bags.

Frame and construction in stainless steel

Transparent plate for visual control red cells / plasma

Powerful spring.

Dimensions (W x D x H) : 19 x 25 x 24 CM

Gross weight : 3 kg.

Item Sl. No. 57

Water bath

Baths; Open; Stainless steel; Non refrigerated; Capacity 7.37 gal. (28L); 19.4L x 11.4W x 8.4 in. D (49

x 29 x 21cm) reservoir; 21.2L x 13W x 9 in. H (54 x 33 x 23cm) overall; Scratch-resistant exterior coating

Bath, Open; Stainless Steel; Refrigerated Model; 3-3/8 gal. Capacity; 16 L x 21-1/2 W x 11-1/2 in. H;

Scratch-resistant exterior coating; Work down to 0 deg. C; 115V 50/60Hz

Item Sl. No. 58

Cell Counter (Fully automated 5 part differential haematology analyser)

- Automated hematology analyzer should include 24 parameters including histogram for RBC, WBC and platelet.
- Should have impedance principle for counting and photometer for hemoglobin.
- It should read at least 60 samples per hour or more.
- Should have dual channel measurement.

- Double dilution chamber
- Sample volume less than 200 micro litres in whole blood and pre –dilute mode.
- It should have various types of discrete mode and real time random access analysis to save reagent consumption and analysis time.
- Sampling needle should have automatic wash from inside and outside.
- LCD / VGA Monitor with graphical user interface (GUI) for easy operation.
- Large illuminated colored VGA or LCD should display the result of all parameters and histogram together.
- Should have sample manual and capillary mode.
- Should have capacity to store at least 20000 **alpha** numeric patient results and 5000 graphics.
- Should have inbuilt / External graphic printer.
- Should have RS232 serial and parallel port can be connected with LAN and laser printer.
- Should have a membrane keyboard for routine operations and maintenance with option to attach external key board for patient demographic entry at instrument operation.
- Should have three dimensional technology or Flow cytometry for differential analysis to maximize resolution, specificity and efficiency.
- Should have extended analysis time for cytopenic sample. .
- Should be able to integrate with optional automated slide maker and stainer.
- Should have zero routine maintenance with automatic electronic aperture cleaning and back flush after each sample.
- Instrument should accept all types of vacutainer tubes.
- The instrument should have option for auto sampler, bar code reader.
- Reagent cost per cycle including start up and shutdown if 200 & 500 samples are processed at a time should be submitted separately in the financial bid.
- There should be automatic storage of calibration data and extensive quality control programme with LJ plot for at least 8 control lots and at least 25 runs per lot.

Basic common necessities:

- Input Voltage 230 volts 50 Hz as per Indian standard.
- Service manual and technical data with all necessary passwords without any obligation.
- Instruction and operational manuals without any obligation.
- UPS preferably sine wave based with maintenance free batteries with duration two hours.

Item Sl. No. 59

CENTRIFUGE MACHINE ROTOFIX

1 Description of Function

1.1 Centrifuges are required in the Laboratory to separate various components of Blood for analysis.

2 Operational Requirements

2.1 Aerodynamic compact construction for vibration free performance

2.2 Table top version

3 Technical Specifications

3.1 Angle Head rotor with Tube Capacity Size 5 – 15 ml

3.2 To have capacity to hold 24-36 tubes at a time.

3.3 Should have a digital timer

3.4 Body should be made of strong fabricated & corrosion resistant steel

3.5 Control panel – for start/stop switch, dynamic brakes, step less speed regulator with zero start switch & speed indicator with timer and protective fuses.

3.6 Door interlock

3.7 Maintenance-free brushless drive motor with exact speed pre selection and alphanumeric

interactive LCD digital display in control panel of RPM & RCF. Speed range 100 to 6000 rpm and above.

3.8 Choice of acceleration and braking profiles.

3.9 Imbalance detection and auto shut down.

4 System Configuration Accessories, spares and consumables

4.1 Tube Holders as appropriate

5 Environmental factors

5.1 Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) or General Requirements of Safety for Electromagnetic Compatibility.

5.2 The unit shall be capable of operating continuously in ambient temperature of 10 -40deg C and relative humidity of 15-90%

5.3 The unit shall be capable of being stored continuously in ambient temperature of 0 - 50 deg C and relative humidity of 15-90%

6 Power Supply

6.1 Power input to be 220-240VAC, 50Hz as appropriate fitted with Indian plug

7 Standards and Safety

7.1 The supplier should be preferably ISO certified for quality standards.

7.2 Product should preferably be FDA/CE/ISI approved

Item Sl. No. 60

Deep Freezer -20 to -40deg C

Voltage: 220v/50hz capacity 450 to 500 litres

- temp: -20 to -40degc, microprocessor control

- access port

- heavy-duty swivel casters

- heavy-gauge steel cabinet with long-lasting powder paint finish

- single door +keylock, digital display

- refrigerating fluid & insulation: cfc free.

- rounded interior corners

- eye-level controls

- temp: alarm

- microprocessor alarm

- battery back-up

- audible/visual over temperature alarm

- air insulated inner doors

- 3 adjustable shelves

- multi-point gasket seals

- automatic voltage booster

- set point security system

- independent operating temperature and high/low limit alarm
- on-board monitoring
- air-cooled cascade refrigeration system
- efficient downfeed evaporator
- high capacity air-cooled condenser
- heated door seals (hot gas) minimizes frost build-up around door
- Gasket
- door latch cam action with key lock, one hand operation
- door handle full length for easy access
- chart recorder 7 day 6 ”
- servo controlled voltage stabilizer of 3 KVA should be included

Item Sl. No. 61

INCUBATOR

INCUBATOR

Stainless steel make, inner full length plexi- glass door.

Triple wall with special grade glass wool insulation

Long lasting stainless steel tabular heaters with fins

Removable wire mesh trays at fixed distance: Min. 2 Nos.

Air circulation: Forced air motor with blower for uniform temperature.

Temperature range, ambient + 50 deg C to 80 deg C +10 deg C

Resolution controller/Digital indicator for Temperature

Size 24"x 24" x 24". and Door swing 65 cms

Operation at 230V AC.

Double door with innser glas dor

Cord and plug

Remarks :

The apparatus should confirm to Indian Standard Institution Guidelines with latest amendment

in Indian Standard Specification for Incubators or equivalent National or International Standards covering Markings, tests and Safety requirements Voltage regulators of Appropriate rating to be included for each item to cope with 160-260 V.

Item Sl. No. 62

Refrigerated Centrifuge

Should be Floor Model Microprocessor controlled Refrigerated Centrifuge with 4 place wind shield swing out rotor with capacity to process 8 blood bags of 350ml or 450ml

Maximum RPM - 4900 & RCF- 5530xg.

Centrifuge must attained max. RPM & RCF.

Temp. range: **9 deg C to + 40 degree C.**

Have frequency controlled drive with automatic lid locking & holding .
 Ergonomic rail grip for easy lid closing.
 51 complete programs memory
 Should Have Data Management System through RS232 port
 Tamper Proof Password Protection
 Dedicated PC software for Data Management & Analysis
 LOG of at least 50 run records on LCD display
 Suitable Servo Controlled Voltage Stabilizer
 Should be CE marked.

Item Sl. No. 63

ROTARY MICROTOME

Accurate reproducible section of same thickness of high quality throughout the length of the specimen travel.
 Specimen advance 1-30 μ m, 1 μ steps selectable.
 Coarse specimen advance about 200 μ m/revolution.
 Specimen tilted = +/- 50 with x and y Micro adjustment.
 Ergonomic balanced flywheel.
 Brake for flywheel.
 Total specimen advance about 18mm.
 Audiovisual alarm at beginning and end of travel range.
 Disposable blade holder for both high and low profile blade.
 Spring loaded disposable blades.
 List of installations to be provided.
 FDA /CE Certificate required.

Item Sl. No. 64

AUTO URINE ANALYZER

Two Different strips can run on the system
 Glucose,protein,pH, Leucocytes,Nitrite,Ketones
 Bilirubin,Urobilinogen,Blood,SG (10 parameter)
 Glucose, protein,pH, Leucocytes,Nitrite,Ketones,Blood,Bilirubin,Urobilinogen

Features

- Sample: Uncentrifused Fresh Urine
- Analysis time – less than 1 min
- Sample throughput – approx. 60 test strips/hours (normal Mode)
- Calibration through dry strips for better results .

- Totally Maintenance Free System
- Light Source - LED
- Wavelength measurement – 470 nm,555 nm and 620 nm
- Data display on Touch screen monitor
- Data printout on fast low noise thermal printer
- Memory for 1000 patient results with time and date, 3×100 Control
- Simple Touch Screen operation
- Flagging of abnormal results
- Interfaces - 1 x RS 232
- 110V to 240V AC operation
- Weight - 12 Kg
- CE / CB / UL/CUL approved

Accessories

Accessories Kit

Manual

Power Cord

Adapter

Item Sl. No. 65

AUTOMATIC CELL COUNTER- 3 PART

Measures 18 parameters including differential leucocyte with only 20 microlitre of blood
Backlit and touch screen LCD display.

All 18 parameters alongwith three histograms are displayed

In built thermal printer,and facility of external also.

Automatic sample prob wipe.

Automatic prob parking in side the machine

Automatic orifice cleaning with back flush.

Possibility of shifting discriminators manually for particle size analysis.

Should have zero back ground count at any time.

Should have two seperate chambers for WBC & RBC measurement.

Should have long life led,sensors & maintenance free membrane valves.

Should have throughput 60 test / hour

Should have reagent level monitoring system/alarm.

Should have enhanced WBC/platelets measuring range to accommodate high WBC/Platelets counts
in cases of leukamia/blood bank samples

Should have power back up system in case of power failure.

RS 232 port and integration to LAN to be provided

Item Sl. No. 66**AUTOCLAVE****1 Description of Function**

1.1 Autoclaves are required for sterilizing an object in high temperature and high-pressure steam.

2 Operational Requirements

2.1 Microprocessor based electrically heated vertical steam sterilizer

3 Technical Specifications

3.1 Pressure range 5- 40psi, adjustable

3.2 Pressure control switch with Digital display of Pressure and Temperature

3.3 Outer and inner chamber made of thick stainless steel

3.4 Inner chamber made of at least 18 SWG SS sheet

3.5 Inner chamber size 550-650X350-450X350-450mm

3.6 Stainless steel Steam jacket insulated with high grade glass wool

3.7 Water level indicator with automatic low water level cut off device

3.8 Joint less gasket

3.9 Water inlet and drain valves

3.10 With standard safety features

3.11 Additional accessories – (to be quoted separately)

Gaskets -2 Nos.

Heating Coil - 2 Nos.

Stainless Steel Perforated Drums – 4 Nos.

Stainless Steel Trays – 2 Nos.

4 System Configuration Accessories, spares and consumables

4.1 As specified

5 Environmental factors

5.1 Shall meet IEC-60601-1-2: 2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility.

5.2 The unit shall be capable of being stored continuously in ambient temperature of 0 -50deg C and relative humidity of 15-90%

5.3 The unit shall be capable of operating in ambient temperature of 20-30 deg C and relative humidity of 80%.

6 Power Supply

6.1 Power input to be 220-240VAC, 50Hz/440V 3 Phase as appropriate fitted with Indian plug

6.2 Resettable over current breaker shall be fitted for protection

7 Standards and Safety

7.1 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450

7.2 Should be FDA or CE or ISI approved product

7.3 Should be compliant to ISO 13485: Quality systems - Medical devices - Particular requirements for the application of ISO 9001

applicable to manufacturers and service providers that perform their own design activities.

Item Sl. No. 67

Fully Automatic Hematology Analyzer- Three Part

WBC, RBC, HGB, HCT, MCV, MCH, MCHC, PLT, LYM%, MXD%, GRAN%, LYM#, MXD#, GRAN#, RDW CV, RDW SD, PDW, MPV, PCT and Histogram for RBC, WBC, and PLT

It should be based on Electrical resistance for counting

SFT method for Hemoglobin

Sample volume should be 20 ul for prediluted mode and 13 ul for Whole blood.

Throughput: Up to 60 samples per hour.

Large color display: resolution 800X600

It should have the facility for data storage min 30,000 samples with histogram.

It should be close tube sampling facility.

Close tube sampling should have the facility for 4 position (QC 1.5 ml, 3 or 5 ml)

2 RS 232 port is required.

Comprehensive QC program: L-J, X, XR and XB analysis.

QC should be up to 9 QC lot- 30 runs lot

Unique calibration program with fresh blood.

Membrane key facility should be there.

It should have the facility for in built printer with keyboard interface.

Item Sl. No. 68

Automatic Slide Staining Machine

High throughput robotic stainer to process up to 11 racks at one time.

Simultaneous staining of various different staining protocols.

18 reagent stations and 5 wash stations of 450 ml capacity.

Programmable for 15 programs of upto 25 steps with incubation time setting fro 0 to 99 minutes 59 seconds.

Integrated oven with temperatures setting from 30° to 65° for optimal slide drying.

Continuous loading and unloading of slides via rack entry and exit door.

Agitation programmable from 0 to 20 times or continuous.

Programmable up and down movement of robotic arm.

Fume extraction fan with charcoal filter to remove hazardous fumes.

Gentle vibration to slide rack during lifting to reduce carry over contamination.

Audible warning buzzer in case of any error during operation.

Should be CE approved.

Item Sl. No. 69

Automated ESR analyzer

Model for 20 samples.

Totally automatic sample aspiration from closed vaccutainer

Provision for Pediatric sample aspiration

Automatic mixing at variable speeds

Automatic corrected results for low and high HCT

Measurement at constant temperature

Capable of automatic ESR calibration

Capable of running QC programmes

Availability of ESR calibrators and ESR QC' controls

Should be able to perform ESR with less than 200 ul blood

Results in less than 40 seconds.

Item Sl. No. 70

Cryostat system

Section machine selection 1 – 60 um in

1 um steps from 1 to 10 um

2 um steps from 10 to 20 um

3 um steps from 20 to 60 um

Maximum specimen size is 55mmØ

Total horizontal specimen feed 25 mm

Total vertical specimen store 50 mm

Specimen orientation with o positioning 8° x/y part of standard delivery.

Trimming – via motorized coarse feed.

Motorised coarse feed – 2 speed setting rapid: 0.65 mm/sec. Slow” 0.3 mm/sec

Refrigerating capacity:

Temperature selection range - 0° to – 30° C

Time required to refrigerate to -30° C approximate 3 hours at 22° C

ambient temperature.

Chamber defrosting automatic hot gas defrosting cucle duration 8 min

starting time freely programmable.

Manual defrost cycle on demanding temperature of quick freeze shelf max -45° at a cryo chamber temperature of -30° C
Quick freeze shelf defrosting – manual defrost in demand.
System should be FDA/CE marked.

Item Sl. No. 71

AUTOMATIC WATER DISTILLER

System should be compact & based on principle of reverse osmosis to produce demineralized water with characteristics that fully conforms to DIN EN 285 standards.

- Should be fully automatic with integrated safety measures as:
- Sensor to prevent overflow as well as to detect lack of water from city distribution system.
- Integral system to check quality of demineralized water produced.
- Active carbon filter & replaceable resin filters.
- Should have variety of connection option as:
- Can be connected directly to autoclave
- Can be connected to an external tank with possibility of connecting upto 3 autoclaves simultaneously.
- Can be connected to an independent tap for filling small tanks.

Item Sl. No. 72

Fully automated coagulation analyzer

System should be bench top, compact random access analyser for routine coagulation and chromogenic assays.

Should have the facility for diluting and dispensing of sample and reagent, - preheating and level sensors to be available.

On board QC and display of calibration curves to be available.

System should have a through put of 80 -100 samples per hour.

Should measure PT, APTT, Fibrinogen, TCT and factor assays.

Should report in secs (PT), %, INR g/l or mg/ml (fibrinogen)

In-house training and free installation to be provided.

System should be FDA/CE certificates should be enclosed

Item Sl. No. 73

HOT AIR OVEN

Microprocessor based digitally controlled equipment suitable for daily usage.
Should have double walled construction, special high quality insulated steel.

Facility for adjustable shelves, 10 removable shelves to be provided.

Size of inner chamber approx 55x55x70 cm (or as per user demand) with internal lighting facility

Insulated door fitted with heavy hinges, mechanical door lock.

Temperature range 30-250°C, digitally temperature setting accuracy

Separate PT 100 sensor and display for temperature (LCD).

Forced uniform air circulation, digital safety thermostat.

Delayed start and stop function, high quality heating element

Supplied with cord & plug, operate at 220V/50 Hz AC supply

All consumables required for installation and standardization of system should be provided free of cost

List of users and Satisfactory Report of quoted model from reputed institute / hospital

Should have all the accessories required for the functioning of the equipment.

CE / ISI mark or other equivalent quality certification.

All electrical peripherals required for smooth functioning e.g. voltage stabilizer provided with the equipment

There should be provision for demonstration before final approval of equipment

Service centre should be closed proximity.

Item Sl. No. 74

Micro Haematocrit Centrifuge

Max RCF 21,100 x g

Max Speed 14,800 rpm

Max Noise Level 56 dBA (ventilated), 50 dBA (refrigerated)

Time Set Range 1 min - 99 min; 1 min increments + HOLD mode

Temperature Range* Set from -9 °C to +40 °C per 1 °C increment

Dimensions, H x W x D 330 x 295 x 445 mm (12.9 x 11.6 x 17.5 in)

with 24 x 1.5 / 2.0 mL rotor with ClickSeal bio-containment lid, 230V, 50/60 HZ

Item Sl. No. 75

Binocular Microscope

1. Antimould/Antifungal type microscope
2. Colour corrected infinity optical system
3. Nose piece Quintuple reversed inword facing.
4. Objectives Panchromatic and spring loaded 4X (1pc), 10X (1pc), 20X(1pc), 40X(1pc), oil immersion 100X (2 pcs).
5. Eye piece wide field, 10X, one pair each with preferably with pointer.
6. Field of view >20mm.

7. Trinocular eye piece tube to facilitate camera attachment. The eye piece tube should be sidentopf type, 30 degree inclined and rotatable by 360 degree.
8. Dioptre adjustment of both eye pieces.
9. Inbuilt arrangement of illumination with halogen lamp (6V/20W) fitted directly under file lenses (Kohler's system) with intensity control.
10. Condenser- Bright field Abbe's NA 1.25 with iris diaphragm and filter holder.
11. Coaxial fine and coarse adjustment with adjustable tension.
12. Double stage- Double slide holder low position and coaxial, movement
13. Power supply 220/240 volts.
14. Spare halogen lamps-6 no's to be supplied with each microscope
15. Power cord
16. Dust cover and preferable with box

Item Sl. No. 76

WATER BATH

Rectangular, volume within 20-25 liters

Double walled chamber with inner chamber made of stainless steel and the outer is made of thick sheet and duly powder coated.

The cavity between the two chambers should be filled with high quality mineral glass wool.

Dome shaped cover with knob to be provided.

Temperature should be controlled at increments of 1° C or less and is controlled by thermostat from room temperature to 100° C with an accuracy of $\pm 1^\circ$ C.

Heating should be provided with immersion type heater **1000** watts capacity.

It should be supplied with the drain facility of the bath contents

LED/LCD display of temperature

Mercury thertometer to read up 100° C.

Should have a water circulatory device.

Should have warning alarm for deviation from the set temperature.

Should have an inbuilt timer.

Accessories, Spares and Consumables

System as specified

Should be supplied with removable stainless trays for accommodating test tubes and flasks to fit the water bath.

Item Sl. No. 77

AUTOMATIC TISSUE PROCESSOR

1 Description of Function

1.1 Tissues from the body taken for diagnosis of disease processes are processed by the tissue processor in the histology laboratory to process tissues prior to microtomy to produce microscopic slides that are viewed under the microscope by pathologists.

2 Operational Requirements

2.1 Latest Model Fully automatic system carousel type with minimum 12 stations (10 reagents and 2 wax baths).

2.2 Computer controlled flow through tissue processor to automatically perform fixation, dehydration, clearing, and paraffin impregnation of tissue.

Specimens should remain stationary during processing in a fully enclosed retort while processing reagents and molten paraffin are moved to and from the chamber in a programmed sequence.

3 Technical Specifications

3.1 Metal / Polypropylene tissue baskets each with a capacity of 160-200 cassettes to be met by either single or double baskets.

3.2 The tissue baskets should be such that they have a firm bottom and do not get stuck to the sides of the reagent stations.

3.3 Reagent stations – Number of vessels: 10 (1.8- 2 litres each)

3.4 Paraffin stations– Number: 2 (1.8- 2 litres each)

– Temperature setting range: 45 – 70°C with temperature cut out facility (Temperature should be mentioned)

3.5 Computerized freely selectable and freely programmable Facility should be available.

Easy editing and changing of programmes should be possible even during a processing run

Infiltration time for each station should be separately programmable.

Program start delay should be selectable without time limit.

3.6 In-built Vacuum function with fume control device.

3.7 Safety device for protection for drying of specimen in case of power failure The buckets should go back inside the respective solution when power fails and not hang in mid air.

3.8 LCD display panel with ergonomic control, fully protected control with full protection key board, audible alarm warning/ error message.

3.9 Machine should be able to cater to short time / quick process

3.10 Interrupting an automatic processing for reloading or removing cassettes before the end of a run should be possible

3.11 Should be an open system capable of using standard cassettes from open markets.

4 System Configuration Accessories, spares and consumables

4.1 Quote pricing to up gradation to another basket with similar cassettes capacity.

4.2 Basket Rotor – 01 Nos.

4.3 **Metal polypropylene tissue basket- 04 Nos.**

4.4 Aluminium reagent vessels of 1.8-2 litre capacity each-10 nos.

4.5 Beaker covers- 11 Nos.

4.6 Wax baths complete with thermostat – 02 nos.

5 Power Supply

5.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug

5.4 Suitable UPS with maintenance free batteries for minimum two-hour back-up should be supplied with the system.

6 Standards and Safety

6.1 Should be compliant to ISO 13485: Quality systems – Medical devices – Particular requirements for the application of ISO 9001 applicable to manufacturers and service providers that perform their own design activities.

6.2 Should be compliant with IEC 61010-1: covering safety requirements for electrical equipment for measurement control and laboratory use.

6.3 Should be FDA or CE or ISI approved product

Item Sl. No. 78**Automatic Tissue Embedding Station**

Should be a Fully Programmable, automatic On/ Off control, unit comprising a maximum of Two consoles, one heated paraffin dispensing unit combined with thermal areas for storage and another Cryo console with cooling plate

I- Paraffin Dispensing Unit

1. Capacity of paraffin tank: min 4 litres
2. Capacity of Thermal Chambers for storage of molds: min 1.8 litres
3. Temp. range of Paraffin tank: 50- 70 deg C
4. Temp. range of Thermal Chamber: 50- 70 deg C in steps of 1 Deg C
5. Temp. range of Hot plates & forceps wells: 50-70 deg C
6. Connection for Electrically heated forceps
7. Six heated wells for normal forceps, 3 on either side of the wax dispensing line.
8. Precisely metered and adjustable gravity feed paraffin dispenser to deliver the right amount of paraffin.
9. Finger touch plate and foot switch for control of paraffin flow.
10. Large warm working surface on either side for min 10 cassettes on each side.
11. Control panel must have 2 line LCD display and easy navigation through the menu with help of simple touch key buttons.
12. Should have a Magnifying lens adjustable in any position, large cold spot & illumination for specimen orientation.

II- Cold Console

1. Capacity of freezing up to 60 blocks at a time.
2. Temp. range of cold plate: 0- 10deg C, adjustable in steps of 1 deg C.
3. Compressor to be extra quite to reduce noise fatigue.
4. Cryo Console to be controlled via the Dispensing Unit.

The system should work on 220-240 V, 50 Hz. Should use CFC free gas and must be original manufacturer and must have ISO 9000/01/02 certification.

Accessories:

1. Electrical forceps 2 nos.
2. Magnifying Glass: 1 no.
3. Foot Switch- 1 no.
4. Metallic Base molds -100 nos.
5. Plastic Embedding Rings- 1,000 pcs
6. Normal Forceps, Toothed – 6 pcs

Item Sl. No. 79**CO2 Incubator****Should have interior lighting facility**

Temperature

Control ± 0.1 °C

Range 5 °C above ambient to 50 °C (122 F)*

Uniformity ± 0.3 °C @ 37 °C (98.6 F)

Tracking Alarm User-programmable high/low

Overtemperature

Sensor Precision thermistor

Setability 0.1 °C

Function Shuts off heat

Temperature Safety

Sensor Precision thermistor

Controller Independent analog electronic

CO2 Control Better than ± 0.1 %

CO2 Range 0-20 %

Inlet Pressure 15 PSIG (1.0 bar)

Sensor T/C

Readability & Setability 0.1 %

Tracking Alarm User-programmable high/low

Humidity

rH Ambient to 95 % @ 37 °C (98.6 F)

Humidity Pan 3.2 qt. (3.0 liters) standard

Display (opt.) In 1% increments

Fittings

Access Port 1.3" (3.3 cm) with removable silicone plug with filter

CO2 Inlet 1/4" hose (barbed)

Unit Heat Load

115 V/230 V 293 BTUH (86 Watt)

Shelves

Dimensions 18.5" x 18.5" (47.0 cm x 47.0 cm)

Construction Stainless steel, perforated

Surface Area 2.4 sq. ft. (0.2 sq. m)

Max. per Chamber 36.0 sq. ft. (3.3 sq. m)

Standard, Maximum 4, 15

Construction

Interior Volume 6.5 cu. ft. (184.1 liters)

Interior Type 304, mirror finish, stainless steel

Exterior 18 gauge, cold-rolled steel, powder coated

Outer Door Gasket Four-sided, molded, magnetic vinyl

Inner Door Gasket Removable, cleanable, feather-edged, silicone

Electrical

All 115 V, 50/60 Hz, 9.6 FLA (Operating range 90-125 V)

230V, 50/60 Hz, 4.4 FLA (Operating range 180-250V)

Circuit Breaker/Power Switch 12 Amps/2 Pole

Convenience/Receptade 75 Watts max. (matches cabinet voltage)

Plug 115 V: NEMA 5-15P Plug; 230 V: CEE 7/7 Plug

Alarm Contacts Power interruption; deviation of temp,

CO2, rH; customer connections

through jack on back of unit

Data Outputs (opt.) RS-485, 0-1 V, 0-5 V, 4-20 milliamp (select one)

Dimensions

Exterior (w x h x f-b) 26.3" x 39.5" x 25.0"

(66.8 cm x 100.3 cm x 63.5 cm)

Interior (w x h x f-b) 21.3" x 26.8" x 20.0"

(54.1 cm x 68.1 cm x 50.8 cm)

Item Sl. No. 80

Binocular Research Microscope

Anti fungal coating

Magnification : 40X-1000X

Binocular head rotatable through 360 degree inclined at 45 degree with multiple ball bearings.

Dioptee adjustment ring on both eye pieces

Eye piece plate both sides sliding with interpupullary distance 53-75mm

Objective CF planochromatic 4X,10X,40X,100X

Eye piece 5X,10X, achromatic

Mechanical stage having low positional bearings

Abbe condenser

Illumination with 6 volts, 20 W Halogen lamp with electronically variable controlled

To be provided with carrying box, dust cover & spare halogen lamp

Compatible with LCD screen and computer for projection along with digital camera attachment

Item Sl. No. 81

Bio-Safety Cabinet

Simple operation for ultimate safety with 60% less energy consumption and heat output that complies with the EN 12469

Dimensions Exterior dimensions with stand (w x h x d) 1300 x 2200 x 795 mm (51.2 x 86.6 x 31.3 in)

Interior dimensions (w x h x d) 1200 x 780 x 495 mm (47.2 x 30.7 x 19.5 in)

Work surface with adjustable stand 750 to 960 mm (30 to 38 in)

Interior work surface area 0.56 m² (930 sq. in)

Working height of front window 200 mm (8 in)

Maximum lifting height of front window 535 mm (21 in)

dimensions (w x h x d) 1410 x 1700 x 925 mm

Weight Net weight ~240 kg (~530 lbs)

Shipping weight ~260 kg (~575 lbs)

Maximum weight load of one-piece work tray 50 kg (110 lbs)

Maximum weight load of divided work tray 25 kg (55 lbs) (max of 50 kg)

Ventilation System Exhaust/inflow air volume 400 m³/h (230 CFM)

Heat emission at 25°C ambient ~0.15 kW

Filter Specification Supply/exhaust air filter HEPA H 14 EN 1822,

Additional exhaust filter option (AEF) HEPA H 14 EN 1822,

Performance Certification EN 12469; GS Nord Cert-TÜV

Sound pressure level <55 dB (A)

Lighting power >1200 lx

Electrical Data Voltage 1/N/PE 230 V

Frequency 50 Hz

Power consumption 0.4 kW

Current consumption 1.7 A

Protection class II / A2

Protective measure Conductor connection Conductor connection

Individual precautions on customer side Lead fuse (slow blow) T 16 A or circuit breaker B 16. The

Local electrical regulations in the country of

use as well as the relevant connection conditions must be observed. The national regulations for electrical engineering as well as the relevant technical connection conditions must be taken into account.

Supply Management Supply requirement 230 V, 50/60 Hz standard supply. Total requirement including interior sockets 13-16 Amps.

Receptacles The receptacles have a load capacity of up to 5 A and are protected with T 5 A fuses.

When all receptacles are in use simultaneously, they must not exceed the maximum total load capacity of 5 A.

Radio interference Circuit is interference free in accordance with EN 55 014

Service valves Up to 4 (installed through access ports)

Receptacles One double, right side

Item Sl. No. 82**CENTRIFUGE HIGH POWER****1 Description of Function**

1.1 Centrifuges are required in the Laboratory to separate various components of Blood for analysis.

2 Operational Requirements

2.1 Aerodynamic compact construction for vibration free performance

2.2 Table top version

3 Technical Specifications

3.1 Angle Head rotor with Tube Capacity Size 5 – 15 ml

3.2 To have capacity to hold 24-36 tubes at a time.

3.3 Should have a digital timer

3.4 Body should be made of strong fabricated & corrosion resistant steel

3.5 Control panel – for start/stop switch, dynamic brakes, step less speed regulator with zero start switch & speed indicator with timer and protective fuses.

3.6 Door interlock

3.7 Maintenance-free brushless drive motor with exact speed pre selection and

Alpha numerical interactive LCD digital display in control panel of RPM & RCF. Speed range 100 to 6000 rpm and above.

3.8 Choice of acceleration and braking profiles.

3.9 Imbalance detection and auto shut down.

4 System Configuration Accessories, spares and consumables

4.1 Tube Holders as appropriate

5 Environmental factors

5.1 Shall meet IEC-60601-1-2:2001(Or Equivalent BIS) or General Requirements of Safety for Electromagnetic Compatibility.

6 Power Supply

6.1 Power input to be 220-240VAC, 50Hz as appropriate fitted with Indian plug

7 Standards and Safety

7.1 The supplier should be preferably ISO certified for quality standards.

7.2 Product should preferably be FDA/CE or ISI approved

Item Sl. No. 83**-20 Degree Freezer (Vertical type)**

Voltage: 220v/50hz capacity 484 litres

- should have automatic defrost and in-built condensate evaporator to prevent condensation of stored material
- capable of working in ambient temperature of 35 deg C to 55 deg C and relative humidity of 15 to 90%
- Should have pull-out drawers/ chambers for easy handling
- should restore default values after power cut off, etc
- temp: -20 to -40degc, microprocessor control
- access port
- heavy-duty swivel casters
- heavy-gauge steel cabinet with long-lasting powder paint finish
- single door +keylock, digital display
- refrigerating fluid & insulation: cfc free.
- rounded interior corners
- eye-level controls
- temp: alarm
- microprocessor alarm
- battery back-up
- audible/visual over temperature alarm
- low voltage booster
- air insulated inner doors
- 3 adjustable shelves
- base mounted controls
- multi-point gasket seals
- automatic voltage booster
- set point security system
- independent operating temperature and high/low limit alarm
- automatic voltage boost
- on-board monitoring
- air-cooled cascade refrigeration system
- efficient down feed evaporator
- high capacity air-cooled condenser

- heated door seals (hot gas) minimizes frost build-up around door gasket
- door latch cam action with key lock, one hand operation
- door handle full length for easy access
- chart recorder 7 day, 6"
- servo controlled voltage stabilizer of 3 kva should be included

Item Sl. No. 84

Deep Freezer (-80degree centigrade) (Vertical type)

The Deep Freezer should achieve low temperature of -80 degC

Should be heavy duty refrigeration system, maintenance free, with hermetically sealed refrigeration

compressors reliable refrigeration with minimum noise & vibration. –

Should have Automatic defrost and in-built condensate evaporator to prevent condensation of stored material

Capable of working in ambient temperature of 35 deg C to 55 deg C and relative humidity of 15 to 90%

- Should have pull-out drawers/ chambers for easy handling
- Should restore default values after power cut off, etc

Integrated digital temperature cum controller with inbuilt 7 days circular chart recorder with battery back up of 3-4 hours to ensure display & recording of temperature even during power failures.

Construction of double wall with efficient insulation to minimize temperature loss, inner chamber should be made of AISI 304 grade non corrosive stainless steel & outer made of high quality C/R sheet

Servo controlled line voltage corrector of 5 KVA should form part of the standard configuration.

Should be a CE marked product & from a ISO, WHO-GMP compliant manufacturer.

The Deep Freezer should be vertical upright with a capacity to hold minimum 185-200 plasma bags

Item Sl. No. 85**ELISA Reader with Washer****1. Description of Function**

1.1 ELISA Reader is required to Read the Colour Density known as OD (Optical Density) in ELISA (Enzyme Linked Immuno-Sorbent Assay.) Plates.

2 Operational Requirements

2.1 **ELISA Reader with washer is required.**

3 Technical Specifications

3.1 OPTICAL SYSTEM

Digital light control

8 measurement channels

6 to 8 s maximum measurement time

Measurement Range 400-700nm

Indication Range 0-2.999 abs

Accuracy Plus/Minus 2% or Plus/Minus 0.005 abs

Resolution 0.001 abs

Inbuilt Filters: Narrow band interference

Should have the following filters – 405, 450, 492(+/_2nm) and 630 nm

Should have data memory of 300 plates

3.2 SOFTWARE:

Storage of immediately preceding measurement. At least 15 user programmable tests permanently stored

Time programmable between each measurement. Agitation programmable before each reading

Bidirectional printer interface.

Built in Windows based software programming software.

Compatibility with Linux OS**3.3 MEASUREMENT MODES**

Plate shaking mode for sample mixing (selectable speed and time)

Flexible blank mode setting

Matrix Modes: Matrix -/x/t, Matrix-/0-0 (Range)

Matrix-/f/(Floating cut off)

Difference Mode: Absorbance of each well in even numbered subtracted from those of odd numbered columns

Curve fit Modes: LIN/LIN.LIN/LOG.LOG/LOG or auto curve transformation with ability to add

- the standard curve; 8 to 12 way string orientation or kinetic modes
Table of optical densities, Delta DD, Graphic, Reaction rate/V-Max
3.4 Adjustable for different micro plate geometrics
3.5 Halogen Lamp 20 - 40 W.
3.6 16 digit alphanumeric fluorescent display
3.7 Membrane keyboard.

4 Technical Specifications for Washer

- 4.1 Auto strip washer for 96 well plates / strips
4.2 1 x 8 strips/ 1x12 strips.
4.3 Dispensable wash volume 50 - 300 µl.
4.3a Residual wash Volume <0.5µl
4.4 Aerosol Shield for user safety.
4.5 In built shaking facility
5 System Configuration Accessories, spares and consumables
8-12 channel manifold, all tubing sets, wash, rinse and waste bottles
Maintenance is kit to be provided.

5 System Configuration Accessories, spares and consumables

- 5.1 System as specified-
5.2 Halogen Lamps: 2
5.3 Printer inbuilt or external to be supplied along with 10 Rolls/Z Fold
5.4 Dust cover.

6 Power Supply

- 6.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug
6.2 Suitable voltage corrector/stabilizer
6.3 Suitable UPS with maintenance free batteries for minimum one-hour back-up should be supplied with the system.

7 Standards and Safety

- 7.1 Should be compliant to ISO 13485: Quality systems - Medical devices – Particular requirements for the application of ISO 9001 applicable to manufacturers and service providers that perform their own design activities.
7.2 Should be FDA or CE or ISI approved product

Item Sl. No. 86**INCUBATOR FOR LAB (160 L)**

- General purpose laboratory incubator
- Capacity: 160 litres
- Temperature range: 25° c above room temperature, up to 52° c
- rust proof stainless steel interior
- Digital temperature display
- Safety thermostat for over temperature protection.
- Hi-quality, long lasting heater elements to be used.
- Glass inner door
- Adjustable four shelves
- Temperature uniformity 0.1° c
- Excellent electrical grounding for leakage current.
- Earth current leakage indication – audio and visual.
- should comply to general electrical safety standards

Item Sl. No. 87**LAMINAR AIR FLOW- Horizontal**

Hepa Filter : 99.97 %efficiency for particles down to 0.3 µm
Pre-Filter : Washable type filter, 85 %efficiency for particles >0.5 µm
Particle Count : Better than US Fed Std 209B Class10 and VDI 2083 Class 3
Cabinet : Laminated High Quality Wooden Board
Work Table : AISI 304 Stainless Steel
Airflow Speed Control : Speed Controller (Three Step Speed Controller)
Blower : High efficient centrifugal type with lifetime lubricated bearings
Light : High intensity,low wattage >800 lux
Noise Level : <55 dBA
Standard Accessories :
Timer for UV light
Lockable castor wheels
Particle dust count validation at site
Pressure gauge on front panel
Air/gas cock and mains power socket (16A)
Power Supply : 220-230 V,50 Hz.
Power Consumption : 400 W
Internal Work Space: 900mmx600mmx600mm

Item Sl. No. 88**Vertical Jacketed Autoclave**

1 Description of Function

1.1 Autoclaves are required for sterilizing an object in high temperature and high-pressure steam.

2 Operational Requirements

2.1 Microprocessor based electrically heated vertical steam sterilizer

3 Technical Specifications

3.1 Pressure range 5- 40psi, adjustable

3.2 Pressure control switch with Digital display of Pressure and Temperature

3.3 Outer and inner chamber made of thick stainless steel

3.4 Inner chamber made of at least 18 SWG SS sheet

3.5 Inner chamber size - 650 x 450 x450mm

3.6 Stainless steel Steam jacket insulated with high grade glass wool

3.7 Water level indicator with automatic low water level cut off device

3.8 Joint less gasket

3.9 Water inlet and drain valves

3.10 With standard safety features

3.11 Additional accessories – (to be quoted separately)

Gaskets -2 Nos.

Heating Coil - 2 Nos.

Stainless Steel Perforated Drums – 4 Nos.

Stainless Steel Trays – 2 Nos.

4 System Configuration Accessories, spares and consumables

4.1 As specified

5 Environmental factors

5.1 Shall meet IEC-60601-1-2: 2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility.

6.1 Power input to be 220-240VAC, 50Hz/440V 3 Phase as appropriate fitted with Indian plug

7 Standards and Safety

7.1 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450

7.2 Should be FDA or CE or ISI approved product

7.3 Should be compliant to ISO 13485: Quality systems - Medical devices - Particular requirements for the application of ISO 9001 applicable to manufacturers and service providers that perform their own design activities.

Item Sl. No. 89**WATERBATH**

Stainless Steel, insulated double walled, inner wall of stainless steel,

Thermostatic temp. control from ambient to 85 - 900C(+0.50C)

complete with immersion heater, Aluminium/SS cover,

brass drain cock, 220-240 volts AC, 50Hz,

Dimensions: outside:- 36x41x25 cms; inside:- 27x30x15 cms; Power : 480W;

Digital microprocessor display to set temp. point preventing thermal runaway.,

Seamless reservoir with no welds to leak or rust,

See-through cover is hinged and removable, and steeply gabled to accept taller samples.

IEC-1010 approved.

cord and plug

Remarks:

Equipment quoted should comply with Indian Standards Institutions Guidelines or any other National or International Guidelines. Voltage regulator of appropriate rating to be included to cope with 160-260 V

Item Sl. No. 90**Flash Autoclave**

1. Mains voltage shall be 220V - 50hz
2. The water reservoir shall have a capacity that is sufficient for approximately 30 cycles. The reservoir shall have a float that reads the level of the water that indicates on the display when the reservoir needs to be refilled. The water reservoir shall
3. The sterilization chamber shall have a capacity of at least 80 litres and be a removable cassette, constructed of stainless steel.
4. The sterilizer shall function with a micro - processor which controls a defined volume of distilled water that is pumped into a boiler, converted into steam, and then injected into the sterilizing chamber which will actively force 99% of the air from
5. The micro processor shall accurately control and monitor the sterilizing temperature and pressure.
6. The sterilizer shall have a keypad, which controls the pre-set programs and the start control with a single touch
- 6.1 Unwrapped Cycle.
To sterilize unwrapped instruments the sterilizing cycle shall be constant at 136 degrees C for 3.5 minutes. The total cycle time including warm up, pressurization and de-pressurisation shall not be more than 11 minutes.
- 6.2 Wrapped Cycle
To sterilize wrapped instruments the sterilizing cycle shall be constant at 136 degrees C for 6 minutes. The total cycle time including warm up, pressurization and de-pressurisation shall not be more than 15 minutes.
7. Cycle for Delicate Items
To sterilize certain rubber, plastic and delicate items the sterilizing cycle shall be constant at 121 degrees C for 15 minutes. The total cycle time including warm up pressurization and de-pressurisation shall not be more than 24 minutes.
8. L. C. Display for monitoring the systems throughout the processing cycle including the temperature, pressure and time elapsed.
9. The unit shall have the facility for an internal printer, external printer or data logger that captures the date, time, temperature and cycle number.
10. CE or USFDA Certified

Item Sl. No. 91**AUTOCLAVE****1 Description of Function**

- 1.1 Autoclaves are required for sterilizing an object in high temperature and high-pressure steam.

2 Operational Requirements

- 2.1 Microprocessor based electrically heated vertical steam sterilizer

3 Technical Specifications

- 3.1 Pressure range 5- 40psi, adjustable
- 3.2 Pressure control switch with Digital display of Pressure and Temperature
- 3.3 Outer and inner chamber made of thick stainless steel
- 3.4 Inner chamber made of at least 18 SWG SS sheet

- 3.5 Inner chamber size 550-650X350-450X350-450mm
 - 3.6 Stainless steel Steam jacket insulated with high grade glass wool
 - 3.7 Water level indicator with automatic low water level cut off device
 - 3.8 Join less gasket
 - 3.9 Water inlet and drain valves
 - 3.10 With standard safety features
 - 3.11 Additional accessories – (to be quoted separately)
- Gaskets -2 Nos.
- Heating Coil - 2 Nos.
- Stainless Steel Perforated Drums – 4 Nos.
- Stainless Steel Trays – 2 Nos.
- 4 System Configuration Accessories, spares and consumables
- 4.1 As specified
- 5 Environmental factors
- 5.1 Shall meet IEC-60601-1-2: 2001(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility.
- 6 Standards and Safety
- 6.1 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450
 - 6.2 Should be FDA or CE or ISI approved product

Item Sl. No. 92

ELECTROPHORESIS AND DENSITOMETER SYSTEM (AUTOMATIC)

The electrophoresis equipment should be able to perform electrophoresis on serum, urine or other body fluid for protein, lipoproteins hemoglobin's.

I. Electrophoresis system

Power supply

To provide constant voltage & current mode.

Input voltage 220 volts or 110 vac 50/60 hz

Output voltage 20-300 vdc continuously adjustable in each range.

Current 0-100 ma at settag current 1.5 to100 ma

Timer 0-60 minutes.

Safety featured: overload /short circuit protection floating output.

Horizontal tank: can accommodate 3 bridges for minimum 3 strips of 5×8cm size as well as can accept single suitable bridge adopter to hold larger strip. The tank unit should have buffer capacity of 250ml and built in safely micro-switches which are moved when the cover is taken off.

Ups: appropriate standard make ups with minimum 2 hrs back up battery.

The above system should be supplied along with necessary accessories like samples holder, applicators, bridge adaptors ,buffers, reagent start up kit.

II. Densitometer system

Light source: halogen lamp 6v-12v, 1watt - 40 watt.

Operating wavelength: at least 530nm, 570nm and white light

Photocell type: sillicium phtotcell or any other equivalent

Photometric linearity: 0.00 to 2.5 o.d. or better

Programmable scanning length: 120mm or more

Programmable scanning width: 90mm or more

Should accept all electrophoresis media (including agarose) on plastic or glass plate.

Editing features: automatic fraction identification, insertion/ deletion, renaming of peaks, addition of fractions, baseline correction.

Monitor: display of graphs and other data.

Printer: built in graphic thermal printer or better.

Software: user programmable tests for different applications including serum/urine/protein electrophoresis.

Reports: graphs, percentage, g/dl. A/g ratio, patient data.

Memory: storage of result including graphs.

Data management: direct comparison of pathological cases statistical calculation.

Serial port: bi-directional

Item Sl. No. 93**FULLY AUTOMATIC BIO-CHEMISTRY ANALYZER – RANDOM ACCESS**

Multi parameter and discrete analyzer including electrolyte with computer and printer.

Capable of analyzing all routine bio-chemistry analysis including electrolytes (ISE –Module)

- Throughput up to 320 test/hour, on 24 hours basis.
- Capability up to 40 samples/run and up to 20 different at any one time
- On board refrigeration for reagents.
- Integrated computer system for data management and storage data.
- Sample volume can be adapted to paediatric samples (micro analysis)
- Calibration and maintenance requirement is minimum.
- To be supplied with 90 Litre/hour multi-stage with 3 different grades of water (3 separate filter) and deionised.
- Tests to be analyzed by pre-analyzer, LFT, liquids, total protein, calcium, phosphorus, magnesium amylase,
sodium, potassium, bicarbonate, chloride urea, creatine and glucose etc.
- Battery backup minimum for 30 mins.

With complete accessories as cuvette, startup kit, consumables, cup 1000 etc

Item Sl. No. 94**Fully Automatic Electro Chemiluminiscene Machine**

It should have facility for clot detection.

1. Extensive test menu, ease of use, reliable and robust hardware.
2. High through out of up to 200 tests per hour with random access.
3. Enzyme amplified enhanced chemiluminescence's technology.
4. Bar-coded stored master curves with two point calibration.
5. On board reagent refrigeration up to 24 resident assays or more.
6. Continuous agitation enhances reaction kinetics preferable.
7. On board dilution.
8. State-of-the art, icon-driven Microsoft @ windows software with touch screen.
9. Real time system monitoring.
10. Customized patient reports.

11. Display quality control data in levey Jennings plot.
12. LIS interface with host query- Bidirectional.
13. Complete touch menu
14. Complete assays for maternal screening.
15. Use of primary tubes for sampling.
16. Suitable UPS with 60 min back up

Item Sl. No. 95
Bio-Chemistry Semi-Auto Analyzer

Automatic flow-through Cell Analyzer

Easy to use high quality precision Analyzer

Monochromatic and Bichromatic measurements (340 - 630) °

Interference filters 340-405-500-546-578-630nm

Bandwidth: 8 nm.

Optical measuring pass of 10 nm.

Measures in absorbances, Concentration kinetics,

Fixed Time, Rate and Differential MULTI-STANDARDS

Zero set: fully automatic

Fully programmable directly from the keyboard

Storage capacity - 100 complete tests.

Reading volume need: 500 ul

Disposable cuvette programmable with flow through

Cell: 500- 1000ul

Built in printer

Thermostated block by peltier effect at 25-30-37 °C for 10 cuvettes.

External interface to be connected to computer.

With Standard Accessories

Item Sl. No. 96
Spectrophotometer, UV Visible, Dual Beam

1 Description of Function

1.1 UV/Vis spectroscopy is routinely used in the quantitative determination of solutions of transition metal ions and highly conjugated organic compounds. The instrument used in ultraviolet-visible spectroscopy is called a UV/VIS spectrophotometer. It measures the intensity of light passing through a sample (I), and compares it to the intensity of light before it passes through the sample (I₀). In a double-beam instrument, the light is split into two beams before it reaches the sample. One beam is used as the reference; the other beam passes through the sample. Some double-beam instruments have two detectors (photodiodes), and the sample and reference beam are measured at the same time.

2 Operational Requirements

- 2.1 System should provide for analysis of Protein, DNA / RNA & Enzyme kinetics etc.
- 2.2 Microprocessor controlled Double beam spectrophotometer with scanning, kinetic and multi wave length facility, Self check & self diagnostic facility and Auto wavelength calibration facility

3 Technical Specifications

3.1 Spectral:

Wavelength Range 190-1100 nm

Wavelength Accuracy: +/- 1 nm

Bandwidth < 2.0 nm

Wavelength Reproducibility: +/- 0.5 nm

3.2 Photometric:

Photometric Accuracy + 0.005A at 1A

Photometric Reproducibility + 0.002A at 1A

Stability < 0.001A/nm

Absorbance Range -3.000 to 3.000

Scanning Speed 6000 nm/min or better

Stray light < 0.1% at 340 nm

3.3 Light Source Deuterium (D2) & Tungsten (W) Halogen lamp

3.4 Dual Detector: Photo Diode

3.5 Detection Mode %, Transmission & Absorbance

3.6 Large LCD display to view complete graphics

3.7 Multi position(six positions preferable) cell holder/chamber.

- 3.8 Must be supplied with 4 pairs of micro Quartz cuvettes (volume 400 ul or less), with suitable software for nucleic acid quantification, protein quantification and determination
- 3.9 Advance version of compatible computer & printer
- 3.10 Monochromator: 1200 lines/mm grating.

4 System Configuration Accessories, spares and consumables

- 4.1 As specified

5 Environmental factors

- 5.1 Shall meet IEC-60601-1-2:200(Or Equivalent BIS) General Requirements of Safety for Electromagnetic Compatibility

6 Power Supply

- 6.1 Power input to be 220-240VAC, 50Hz fitted with Indian plug
- 6.2 UPS of suitable rating shall be supplied for minimum 1 hour backup for the entire system

7 Standards, Safety

- 7.1 Electrical safety conforms to standards for electrical safety IEC-60601 / IS-13450
- 7.2 Should be FDA/ CE/UL or BIS approved product

Item Sl. No. 97

Blood Gas Analyzer (Electrolyte Analyzer)

- A fully automated pH/Blood gas/electrolyte analyzer measuring the following parameters:

pH, PCO₂, PO₂, Barometric pressure. Na, K, Ca, Cl

Co-oximetry: ct Hb, CCO Hb, Met Hb, Haematocrit and Barometric pressure.

- Sample volume should be approximate 150 µl for all parameters.
- All calibration and cleaning cycles should be fully automated with user selectable calibration items.
- Calibration should be performed by liquid calibration for all parameters.
- The electrodes provided should be zero maintenance including the reference electrode.
- The system should have on board data manager to store all patient results, QC data and calibrations.

- The system should have a closed waste system and monitored continuously. Also all the system reagents should be monitored continuously.
- A power fail protection for 20 min. to take all calibration and programmed data.
- The analyzer should have a colour LCD screen to access all the system software and to display the patient's results. With alphanumeric key board/touch screen.
- A built in thermal printer should be provided to print out patient results.
- The system should work in discrete testing, ie, selectable parameter testing.
- Should be supplied with consumable, reagents and QC agents for 1000 tests, as per the user requirements so that they do not expire.
- Should not preferably use special gases

GENERAL TECHNICAL SPECIFICATIONS

GENERAL POINTS:

1. Warranty:

- a) Comprehensive Warranty as stated in GCC clause No. 15 (in Section – IV) for complete equipment (including X ray tubes, HT Cable, Probes, Electrodes, Detectors, Batteries for UPS, other vacuumatic parts wherever applicable) and Turnkey Work from the date of satisfactory installation, commissioning, trial run & handing over of equipment to Hospital/ Dispensaries/ Institute/ Medical College.
- b) 98% up time Warranty of complete equipment with extension of Warranty period by double the downtime period on 24 (hrs) X 7 (days) X 365 (days) basis.
- c) All software updates should be provided free of cost during Warranty period.

2. After Sales Service:

- a) After sales service centre should be available at the city of Hospital/Institution/Medical College on 24 (hrs) X 7 (days) X 365 (days) basis. Complaints should be attended properly, maximum within 8 hrs. The service should be provided directly by Tenderer/Indian Agent. Undertaking by the Principals that the spares for the equipment shall be available for at least 10 years from the date of supply.
- b) The service provider should have the necessary equipments recommended by the manufacturer to carry out preventive maintenance test as per guidelines provided in the service/maintenance manual.

3. Training:

On Site training to Doctors/ Technicians/ staff is to be provided by Principal/ Indian Agents (if they have the requisite know-how) for operation and maintenance of the equipment to the satisfaction of the consignee.

4. Annual Comprehensive Maintenance Contract (CMC) of subject equipment with Turnkey:

- a) **The cost of Annual Comprehensive Maintenance Contract (CMC)** which includes preventive maintenance including testing & calibration as per technical/ service /operational manual of the manufacturer, labour and spares, after satisfactory completion of Warranty period **to be quoted for next 5 years on yearly basis** for complete equipment (including X ray tubes, HT Cable, Probes, Electrodes, Detectors, Batteries for UPS, other vacuumatic parts wherever applicable) and Turnkey (if any). The supplier shall visit each consignee site as recommended in the manufacturer's technical/ service /operational manual, but at least once in six months during the CMC period
- b) The cost of CMC to be quoted along with taxes applicable on the date of Tender Opening. The taxes to be paid extra, to be specifically stated. In the absence of any such stipulation the price will be taken inclusive of such taxes and no claim for the same will be entertained later.
- c) Cost of CMC will be added for Ranking/Evaluation purpose.
- d) The payment of CMC will be made on six monthly basis after satisfactory completion of said period, duly certified by end user on receipt of bank guarantee for 2.5 % of the cost of the equipment as per Section XV valid till 2 months after expiry of entire CMC period.
- e) There will be 98% uptime warranty during CMC period on 24 (hrs) X 7 (days) X 365 (days) basis, with penalty, to extend CMC period by double the downtime period.
- f) During CMC period, the supplier is required to visit at each consignee's site at least once in 6 months commencing from the date of the successful completion of warranty period for preventive maintenance of the goods.
- g) All software updates should be provided free of cost during CMC.

- h) Failure of the above [4. e) to 4. g)] by the supplier, may lead to the forfeiture of the Bank Guarantee for Annual CMC.
- i) The payment of CMC will be made as stipulated in GCC Clause 21.

5. Turnkey:

Turnkey is indicated in the technical specification of the respective items, wherever required. The Tenderer shall examine the existing site where the equipment is to be installed, in consultation with HOD of Hospital/Institution/Medical College concerned. Turnkey details of each Hospital/Institution/Medical College are given at the end of Technical Specification. The Tenderers to quote prices indicating break-up of prices of the Machine and Turnkey Job of each Hospital/Institution/Medical College. **The Turnkey costs may be quoted in Indian Rupee will be added for Ranking Purpose.**

The taxes to be paid extra, to be specifically stated. In the absence of any such stipulation the price will be taken inclusive of such duties and taxes and no claim for the same will be entertained later.

The Turnkey Work should completely comply with AERB requirement, if any.

Section – VIII

Quality Control Requirements

(Proforma for equipment and quality control employed by the manufacturer(s))

Tender Reference No.

Date of opening

Time

Name and address of the Tenderer:

Note: All the following details shall relate to the manufacturer(s) for the goods quoted for.

- 01 Name of the manufacturer
 - a. full postal address
 - b. full address of the premises
 - c. Email ID
 - d. telephone number
 - e. fax number

- 02 Plant and machinery details

- 03 Manufacturing process details

- 04 Monthly (single shift) production capacity of goods quoted for
 - a. normal
 - b. maximum

- 05 Total annual turn-over (value in Rupees)

- 06 Quality control arrangement details
 - a. for incoming materials and bought-out components
 - b. for process control
 - c. for final product evaluation

- 07 Test certificate held
 - a. type test
 - b. BIS/ISO certification
 - c. any other

- 08 Details of staff
 - a. technical
 - b. skilled
 - c. unskilled

Signature and seal of the Tenderer

Section – IX

Qualification Criteria

01. The Tenderer must be a Manufacturer or its authorized Agent.
02. (a) The Manufacturer should have supplied and installed in last **Five** years from the date of Tender Opening, atleast 100% of the quoted quantity of the similar equipment meeting major specification parameters which is functioning satisfactorily. The foreign Manufacturer satisfying the above criteria should also have supplied and installed in last **Five** years from the date of Tender Opening, at least 50% (or one No. where the schedule of requirement is one no.) of quoted quantity of similar model which is functioning satisfactorily any where outside the country of manufacture.
02. (b) The Tenderers quoting as authorized representative of the manufacturer meeting the above criteria 02 (a) should have supplied and installed in last **Five** years from the date of Tender Opening, atleast 50% (or one No. where the schedule of requirement is one no.) of the quoted quantity of similar equipment which is functioning satisfactorily, any where in India of the same manufacturer.

Note:

1. In support of 2 (a) & 2 (b), the Tenderer shall furnish Performance statement in the enclosed Proforma 'A'.

The manufacturer as well as the Tenderer/ Indian Agent shall furnish Satisfactory Performance Certificate in respect of above, duly translated in English and duly notarized, alongwith the tender. The performance certificate should be in accordance with the requirement of clause 2 (a) / 2 (b) as stated above.

2. The Tenderer shall furnish a brief write-up, packed with adequate data explaining and establishing his available capacity/capability (both technical and financial) to perform the Contract (if awarded) within the stipulated time period, after meeting all its current/present commitments. The Tenderer shall also furnish details of Equipment and Quality Control in the enclosed Section VIII.
3. Notwithstanding anything stated above, the Purchaser reserves the right to assess the Tenderer's capability and capacity to perform the contract satisfactorily before deciding on award of Contract, should circumstances warrant such an assessment in the overall interest of the Purchaser.
4. The Purchaser reserves the right to ask for a free demonstration of the quoted equipment at a pre determined place acceptable to the purchaser for technical acceptability as per the tender specifications, before the opening of the Price Tender.

PROFORMA 'A'
PROFORMA FOR PERFORMANCE STATEMENT

(For the period of last five years)

Tender Reference No.: _____

Date & Time of opening: _____

Name and address of the Tenderer: _____

Name and address of the manufacturer: _____

Order placed by (full address of Purchaser/Consignee)	Order number and date	Description of ordered goods and services	Quantity of ordered goods	Value of order (Rs.)	Date of completion of Contract		Remarks indicating reasons for delay if any	Have the goods been functioning Satisfactorily (attach documentary proof)**
					As per contract	Actual		
1	2	3	4	5	6	7	8	9

Signature and seal of the Tenderer

** The documentary proof will be a certificate from the consignee/end user with cross-reference of order no. and date in the certificate duly notarised certification authenticating the correctness of the information furnished. If at any time, information furnished is proved to be false or incorrect, the earnest money and or performance security furnished will be forfeited. Such certificates from a third party or middleman other than actual end user will not be accepted. The satisfactory performance implies working satisfactorily without any complaint since the date of installation, commissioning & handing over to the end user as per the standard format enclosed.

Section – X TENDER FORM

Date _____

To,
Head (P & CD)
HLL Lifecare Limited
Procurement and Consultancy Division
B-14A, Sector -62, Noida -201307, Uttar Pradesh

Ref. Your TE document No. _____ dated _____

We, the undersigned have examined the above mentioned TE document, including amendment/corrigendum No. _____, dated _____ (if any), the receipt of which is hereby confirmed. We now offer to supply and deliver _____ (*Description of goods and services*) in conformity with your above referred document.

If our tender is accepted, we undertake to supply the goods and perform the services as mentioned above, in accordance with the delivery schedule specified in the List of Requirements.

We further confirm that, if our tender is accepted, we shall provide you with a performance security of required amount in an acceptable form in terms of GCC clause 5, read with modification, if any, in Section - V – “Special Conditions of Contract”, for due performance of the contract.

We agree to keep our tender valid for acceptance as required in the GIT clause 20, read with modification, if any in Section - III – “Special Instructions to Tenderers” or for subsequently extended period, if any, agreed to by us. We also accordingly confirm to abide by this tender up to the aforesaid period and this tender may be accepted any time before the expiry of the aforesaid period. We further confirm that, until a formal contract is executed, this tender read with your written acceptance thereof within the aforesaid period shall constitute a binding contract between us.

We further understand that you are not bound to accept the lowest or any tender you may receive against your above-referred tender enquiry.

We confirm that we do not stand deregistered/banned/blacklisted by any Govt. Authorities.

We confirm that we fully agree to the terms and conditions specified in above mentioned TE document, including amendment/ corrigendum if any

(Signature with date)

(Name and designation) Duly authorised to sign tender for and on behalf of

SECTION – XI PRICE SCHEDULE**A) PRICE SCHEDULE FOR DOMESTIC GOODS OR GOODS OF FOREIGN ORIGIN LOCATED WITHIN INDIA**

1	2	3	4	5							6
				Price per unit (Rs.)							
Item Sl. No.	Brief Description of Goods (with make & model)	Country of Origin	Quantity (Nos.)	Ex - factory/ Ex - warehouse /Ex-showroom /Off - the shelf (a)	Excise Duty (if any) [%age & value] (b)	Sales Tax/ VAT (if any) [%age & value] (c)	Transportation, loading/ unloading and Incidental costs till consignee's site (d)	Insurance charges for a period including 3 months beyond the date of delivery (e)	Incidental Services (including Installation & Commissioning, Supervision, Demonstration and Training) at the Consignee's site (f)	Unit Price (at Consignee Site) basis (g) =a+b+c+d+e+f	Total Price (at Consignee Site) basis (Rs.) 4 x 5(g)

Total Tender price in Rupees: _____

In words: _____

Note: -

1. If there is a discrepancy between the unit price and total price THE UNIT PRICE shall prevail.
2. The charges for Annual CMC after warranty shall be quoted separately as per Section-XI – Price Schedule C

Name _____

Business Address _____

Place: _____

Signature of Tenderer _____

Date: _____

Seal of the Tenderer _____

B) PRICE SCHEDULE FOR GOODS TO BE IMPORTED FROM ABROAD

1	2	3	4	5										
				Price per unit (Currency)									Unit price on DDP basis at consignee's site	
Item Sl. No.	Brief Description of Goods (with make & model)	Country of Origin	Quantity (Nos.)	Gross FOB price at sea/air port of Lading (inclusive of Agency Commission)	Amount and percentage of Agency Commission **	Net FOB (excluding Agency Commission) (a-b)	Insurance & Freight	Net CIP by Air/ Sea at the port of entry (c+d)	Custom Duty amount as % of Net CIP (amount with CDEC as applicable) **	Custom Clearance & Handling Charges **	Loading/ Unloading, inland transportation, insurance as per Clause 11 of GCC & incidental cost till consignee's site **	Installation commissioning , supervision. Demonstration & training at the consignee's site **	In foreign currency	In Indian Rupees
													=(e)	=(b+f+g+h+i)
				(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)		

** to be quoted in Indian Currency

Total price at Consignee's site

(A) In foreign currency : column (4 x e) _____ (In figures and words) plus
 ** (B) In Indian Rupees : column 4 x (b+f+g+h+i) Rs _____ (In figures and words)

Note: -

- The Tenderer will be fully responsible for the safe arrival of the goods at the consignee site in good condition as per terms of contract.
- The bidders break up of prices under various columns is for comparison of prices up to delivery of goods at consignee's site for tender evaluation.
- The quoted price should be supported with original proforma invoice from the foreign manufacturers. The proforma invoice should indicate the percentage of agency commission included in the FOB prices. Indian Agent to be paid in Indian Currency.
- All the components of the DDP price will be paid by the tenderer. The purchaser will make the payment of DDP price after receipt of goods at consignee's site in good condition as per payment terms in the contract.
- The prices quoted in foreign currency in column (e) shall be converted in Rupees at the selling rate of exchange applicable on the date of tender opening .The customs duty amount so worked out as percentage of net CIP value in rupees will be taken for evaluation and comparison of tenders
- The charges for Annual CMC after warranty shall be quoted separately as per Section-XI – Price Schedule C

Name _____

Business address _____

Signature of Tenderer _____

Seal of Tenderer _____

Place: _____

Date: _____

C) PRICE SCHEDULE FOR COMPREHENSIVE MAINTENANCE CONTRACT AFTER WARRANTY PERIOD

1	2	3	4					5
Item Sl. No.	Brief Description of the Goods	Quantity (Nos.)	Comprehensive Maintenance Contract Cost for Each Unit year wise*.					Total Comprehensive Maintenance Contract Cost for 5 (or as specified) Years [3 x (4a+4b+4c+4d+4e)]
			1 st	2 nd	3 rd	4 th	5 th	
			a	b	c	d	e	

* After completion of Warranty period

NOTE:-

1. In case of discrepancy between unit price and total prices, THE UNIT PRICE shall prevail.
2. The cost of Comprehensive Maintenance Contract (CMC) which includes preventive maintenance including testing & calibration as per technical/ service /operational manual and labour, after satisfactory completion of Warranty period may be quoted for next 5 (or as specified) years on yearly basis for complete equipment and Turnkey (if any).
3. The cost of CMC may be quoted along with taxes applicable on the date of Tender Opening. The taxes to be paid extra, to be specifically stated. In the absence of any such stipulation the price will be taken inclusive of such taxes and no claim for the same will be entertained later.
4. Cost of CMC will be added for Ranking/Evaluation purpose.
5. The payment of CMC will be made as per clause GCC clause 21.1 (D).
6. The uptime warranty will be 98 % on 24 (hrs) x 7 (days) x 365 (days) basis or as stated in Technical Specification of the TE document.
7. All software updates should be provided free of cost during CMC period.
8. The stipulations in Technical Specification will supersede above provisions
9. The supplier shall keep sufficient stock of spares required during Comprehensive Maintenance Contract period. In case the spares are required to be imported, it would be the responsibility of the supplier to import and get them custom cleared and pay all necessary duties.

Name _____

Business Address _____

Place: _____

Signature of Tenderer _____

Date: _____

Seal of the Tenderer _____

D) PRICE SCHEDULE FOR TURNKEY

Item Sl. No.	BRIEF TURNKEY DESCRIPTION OF GOODS	CONSIGNEE CODE	Turnkey price

Note: -

1. The cost of Turnkey as per Technical Specification (Section VII) may be quoted on lump sum along with taxes applicable on the date of Tender Opening. The taxes to be paid extra, to be specifically stated. In the absence of any such stipulation the price will be taken inclusive of such taxes and no claim for the same will be entertained later.
2. Cost of Turnkey will be added for Ranking/Evaluation purpose.
3. The payment of Turnkey will be made as per clause GCC clause 21.1 (c).
4. The stipulations in Technical Specification will supersede above provisions

Name_____

Business Address_____

Place: _____

Signature of Tenderer_____

Date: _____

Seal of the Tenderer_____

**SECTION – XII
QUESTIONNAIRE****Fill up the Section XX – Check List for Tenderers and enclose with the Tender**

1. The tenderer should furnish specific answers (alongwith mention of relevant page nos. of tender) to all the questions/issues mentioned in the Checklist. In case a question/issue does not apply to a tenderer, the same should be answered with the remark “not applicable”
2. Wherever necessary and applicable, the tenderer shall enclose certified copy as documentary proof/ evidence to substantiate the corresponding statement.
3. In case a tenderer furnishes a wrong or evasive answer against any of the question/issues mentioned in the Checklist, its tender will be liable to be ignored.

SECTION – XIV
MANUFACTURER’S AUTHORISATION FORM

To,

Head (P & CD)

HLL Lifecare Limited
Procurement and Consultancy Division
B-14A, Sector -62, Noida -201307, Uttar Pradesh

Dear Sir,

Ref. Your TE document No _____, dated _____

We, _____ who are proven and reputable manufacturers of _____ (*name and description of the goods offered in the tender*) having factories at _____, hereby authorise Messrs _____ (*name and address of the agent*) to submit a tender, process the same further and enter into a contract with you against your requirement as contained in the above referred TE documents for the above goods manufactured by us.

We further confirm that no supplier or firm or individual other than Messrs. _____ (*name and address of the above agent*) is authorised to submit a tender, process the same further and enter into a contract with you against your requirement as contained in the above referred TE documents for the above goods manufactured by us.

We also hereby extend our full warranty, CMC as applicable as per clause 15 of the General Conditions of Contract, read with modification, if any, in the Special Conditions of Contract for the goods and services offered for supply by the above firm against this TE document.

We also confirm that the price quoted by our agent shall not exceed than that which we would have quoted directly.

Yours faithfully,

[Signature with date, name and designation]
for and on behalf of Messrs _____

[Name & address of the manufacturers]

Note: 1. This letter of authorisation should be on the letterhead of the manufacturing firm and should be signed by a person competent and having the power of attorney to legally bind the manufacturer.
2. Original letter may be sent.

SECTION – XV

BANK GUARANTEE FORM FOR PERFORMANCE SECURITY/ CMC SECURITY

To
Head of Hospital/Institute/Medical College of ESIC

WHEREAS _____ (Name and address of the supplier) (Hereinafter called “the supplier”) has undertaken, in pursuance of contract no _____ dated _____ to supply (description of goods and services) (herein after called “the contract”).

AND WHEREAS it has been stipulated by you in the said contract that the supplier shall furnish you with a bank guarantee by a scheduled commercial bank recognised by you for the sum specified therein as security for compliance with its obligations in accordance with the contract;
AND WHEREAS we have agreed to give the supplier such a bank guarantee;

NOW THEREFORE we hereby affirm that we are guarantors and responsible to you, on behalf of the supplier, up to a total of. _____ (Amount of the guarantee in words and figures), and we undertake to pay you, upon your first written demand declaring the supplier to be in default under the contract and without cavil or argument, any sum or sums within the limits of (amount of guarantee) as aforesaid, without your needing to prove or to show grounds or reasons for your demand or the sum specified therein.

We hereby waive the necessity of your demanding the said debt from the supplier before presenting us with the demand.

We further agree that no change or addition to or other modification of the terms of the contract to be performed there under or of any of the contract documents which may be made between you and the supplier shall in any way release us from any liability under this guarantee and we hereby waive notice of any such change, addition or modification.

This guarantee shall remain valid till 2 (two) months beyond the warranty period, i.e up to ----- (indicate date)

.....
(Signature with date of the authorised officer of the Bank)

.....
Name and designation of the officer

.....
Seal, name & address of the Bank and address of the Branch

SECTION – XVI
CONTRACT FORM - A

CONTRACT FORM FOR SUPPLY, INSTALLATION, COMMISSIONING, HANDING OVER, TRIAL RUN, TRAINING OF OPERATORS & WARRANTY OF GOODS

(Address of the Purchaser's/Consignee's office issuing the contract)

Contract No _____ dated _____

This is in continuation to this office's Notification of Award No _____ dated _____

1. Name & address of the Supplier: _____
2. Purchaser's TE document No _____ dated _____ and subsequent Amendment No _____, dated _____ (if any), issued by the purchaser
3. Supplier's Tender No _____ dated _____ and subsequent communication(s) No _____ dated _____ (if any), exchanged between the supplier and the purchaser in connection with this tender.
4. In addition to this Contract Form, the following documents etc, which are included in the documents mentioned under paragraphs 2 and 3 above, shall also be deemed to form and be read and construed as integral part of this contract:

- (i) General Conditions of Contract;
- (ii) Special Conditions of Contract;
- (iii) List of Requirements;
- (iv) Technical Specifications;
- (v) Quality Control Requirements;
- (vi) Tender Form furnished by the supplier;
- (vii) Price Schedule(s) furnished by the supplier in its tender;
- (viii) Manufacturers' Authorisation Form (if applicable for this tender);
- (ix) Purchaser's Notification of Award

Note : The words and expressions used in this contract shall have the same meanings as are respectively assigned to them in the conditions of contract referred to above. Further, the definitions and abbreviations incorporated under clause 1 of Section II – 'General Instructions to Tenderers' of the Purchaser's TE document shall also apply to this contract.

5. Some terms, conditions, stipulations etc. out of the above-referred documents are reproduced below for ready reference:

- (i) Brief particulars of the goods and services which shall be supplied/ provided by the supplier are as under:

Item Sl. No.	Brief description of goods/services	Accounting unit	Quantity to be supplied	Unit Price	Total price	Terms of delivery

Any other additional services (if applicable) and cost thereof: _____

Total value (in figure) _____ (In words) _____

- (ii) Delivery schedule
- (iii) Details of Performance Security
- (iv) Quality Control
 - (a) Mode(s), stage(s) and place(s) of conducting inspections and tests.
 - (b) Designation and address of purchaser's inspecting officer
- (v) Destination and despatch instructions
- (vi) Consignee, including port consignee, if any
- (vii) Warranty clause
- (viii) Payment terms
- (ix) Paying authority

**(Signature, name and address
 of the Purchaser's/Consignee's authorised official)**
For and on behalf of _____

Received and accepted this contract

(Signature, name and address of the supplier's executive
duly authorised to sign on behalf of the supplier)

For and on behalf of _____

(Name and address of the supplier)

(Seal of the supplier)

Date: _____

Place: _____

CONTRACT FORM – B
CONTRACT FORM FOR COMPREHENSIVE MAINTENANCE CONTRACT

Comprehensive Maintenance Contract No. _____ **dated** _____
 Between _____

(Address of Head of Hospital/Institute/Medical College)
 And _____

(Name & Address of the Supplier)

Ref: Contract No _____ **dated** _____ **(Contract No. & date of Contract for supply, installation, commissioning, handing over, Trial run, Training of operators & warranty of goods)**

In continuation to the above referred contract

a) The Contract of Comprehensive Maintenance is hereby concluded as under: -

1	2	3	4					5
Item Sl. No.	BRIEF DESCRIPTION OF GOODS	Quantity (Nos.)	Comprehensive Maintenance Contract Cost for Each Unit year wise*.					Total Comprehensive Maintenance Contract Cost for 5 (or as specified) Years [3 x (4a+4b+4c+4d+4e)]
			1 st	2 nd	3 rd	4 th	5 th	
			a	b	c	d	e	

Total value (in figure) _____ (In words) _____

- b) The CMC commence from the date of expiry of all obligations under Warranty i.e. from _____ (date of expiry of Warranty) and will expire on _____ (date of expiry of CMC)
- c) The cost of Comprehensive Maintenance Contract (CMC) which includes preventive maintenance and labour, after satisfactory completion of Warranty period may be quoted for next 5 (or as specified) years as contained in the above referred contract on yearly basis for complete equipment (including X ray tubes, Batteries for UPS, other vacuumatic parts, _____ & _____) and Turnkey (if any).
- d) There will be 98% uptime warranty during CMC period on 24 (hrs) X 7 (days) X 365 (days) basis, with penalty, to extend CMC period by double the downtime period.
- e) During CMC period, the supplier shall visit at each consignee's site for preventive maintenance including testing and calibration as per the manufacturer's service/ technical/ operational manual. The supplier shall visit each consignee site as recommended in the manufacturer's manual, but at least once in 6 months commencing from the date of the successful completion of warranty period for preventive maintenance of the goods.
- f) All software updates should be provided free of cost during CMC.
- g) The bank guarantee valid till _____ [(fill the date) 2 months after expiry of entire CMC period] for an amount of Rs. _____ [(fill amount) equivalent to 2.5 % of the cost of the equipment as per contract] shall be furnished in the prescribed format given in

Section XV of the TE document, along with the signed copy of CMC within a period of 21 (twenty one) days of issue of CMC failing which the proceeds of Performance Security shall be payable to the Purchaser/Consignee.

- h) If there is any lapse in the performance of the CMC as per contract, the proceeds CMC bank guarantee for an amount of Rs. _____ (equivalent to 2.5 % of the cost of the equipment as per contract) shall be payable to the Consignee.
- i) **Payment terms:** The payment of CMC will be made against the bills raised to the consignee by the supplier on six monthly basis after satisfactory completion of said period, duly certified by the HOD concerned. The payment will be made in Indian Rupees.
- j) **Paying authority:** _____ (name of the consignee i.e. Hospital/
Institute /Medical College's authorised
official)

(Signature, name and address of
Hospital/Institute/Medical College's authorised official)
For and on behalf of _____

Received and accepted this contract

(Signature, name and address of the supplier's executive
duly authorised to sign on behalf of the supplier)

For and on behalf of _____

(Name and address of the supplier)

(Seal of the supplier)

Date: _____

Place: _____

SECTION – XVII

CONSIGNEE RECEIPT CERTIFICATE
(To be given by consignee's authorized representative)

The following store (s) has/have been received on said to contain basis in good condition:

- 1) Contract No. & date : _____
- 2) Supplier's Name : _____
- 3) Consignee's Name & Address with telephone No. & Fax No. : _____
- 4) Name of the item supplied : _____
- 5) No of cartons received which are said:
 Which are said to contain the items (List of items in each carton to be given.)
 : _____
- 6) Date of Receipt by the Consignee : _____
- 7) Name and designation of Authorized Representative of Consignee : _____
- 8) Signature of Authorized Representative of Consignee with date : _____
- 9) Seal of the Consignee : _____

SECTION – XVIII
Proforma of Final Acceptance Certificate by the Consignee

No _____

Date _____

To

M/s _____

Subject: Certificate of commissioning of equipment/plant.

This is to certify that the equipment(s)/plant(s) as detailed below has/have been received in good conditions along with all the standard and special accessories and a set of spares (subject to remarks in Para no.02) in accordance with the contract/technical specifications. The same has been installed and commissioned.

(a) Contract No _____ dated _____

(b) Description of the equipment(s)/plants: _____

(c) Equipment(s)/ plant(s) nos.: _____

(d) Quantity: _____

(e) Bill of Loading/Air Way Bill/Railway
Receipt/ Goods Consignment Note no _____ dated _____

(f) Name of the vessel/ Transporter: _____

(g) Name of the Consignee: _____

(h) Date of commissioning and proving test: _____

Details of accessories/spares not yet supplied and recoveries to be made on that account.

Sl. No.	Description of Item	Quantity	Amount to be recovered
---------	---------------------	----------	------------------------

The proving test has been done to our entire satisfaction and operators have been trained to operate the equipment(s)/plant(s).

The supplier has fulfilled its contractual obligations satisfactorily ## or

The supplier has failed to fulfil its contractual obligations with regard to the following:

He has not adhered to the time schedule specified in the contract in dispatching the documents/drawings pursuant to 'Technical Specifications'.

He has not supervised the commissioning of the equipment(s)/plant(s) in time, i.e. within the period specified in the contract from date of intimation by the Purchaser/Consignee in respect of the installation of the equipment(s)/plant(s).

The supplier as specified in the contract has not done training of personnel.

The extent of delay for each of the activities to be performed by the supplier in terms of the contract

is _____.

The amount of recovery on account of non-supply of accessories and spares is given under Para no.02.

The amount of recovery on account of failure of the supplier to meet his contractual obligations is _____ (here indicate the amount).

Signature

Name:

Designation with stamp

Explanatory notes for filling up the certificate:

- He has adhered to the time schedule specified in the contract in dispatching the documents/drawings pursuant to 'Technical Specification'.
- He has supervised the commissioning of the equipment(s)/plant(s) in time, i.e. within the time specified in the contract from date of intimation by the Purchaser/Consignee in respect of the installation of the equipment(s)/plant(s).
- Training of personnel has been done by the supplier as specified in the contract
- In the event of documents/drawings having not been supplied or installation and commissioning of the equipment(s)/plant(s) having been delayed on account of the supplier, the extent of delay should always be mentioned in clear terms.

SECTION – XIX

DETAILS OF SHIPPING ARRANGEMENT FOR LINER CARGOES IN RESPECT OF C&F/CIF/TURNKEY/F.O.R CONTRACTS FOR IMPORTS

1. SHIPMENT FROM PORTS OF U.K INCLUDING NORTHERN IRELAND (ALSO EIRE), FROM THE NORTH CONTINENT OF EUROPE (GERMANY, HOLLAND, BELGIUM, FRANCE, NORWAY, SWEDEN, DENMARK, FINLAND AND PORTS ON THE CONTINENTAL SEABOARD OF MEDITERRANIAN (I.E. FRENCH WESTERN ITALIAN PORTS), TO PORTS IN INDIA.

The Seller should arrange shipment of the goods by vessels belonging to the member lines of the India-Pakistan-Bangladesh Conference. If the Seller finds that the space on the 'Conference Lines' vessels is not available for any specific shipment, he should take up with India-Pakistan-Bangladesh Conference, Conferity House, East Grinstead, Sussex (UK), for providing shipping space and also inform the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

The Seller should arrange shipment through the Government of India's Forwarding Agents, M/s Schenker & Co., 2000-Hamburg (Cable: SCHENKER CO., HAMBURG) OR obtain a certificate from them to the effect that shipment has been arranged in accordance with instructions of the Ministry of Surface Transport, (TRANSCART), New Delhi.

2. SHIPMENT FORM PORTS OF U.K. INCLUDING NORTHERN

Goods under this contract would be shipped by the national shipping companies of the Contracting Parties operating bilateral shipping service and vessels under the flag of third countries in accordance with the Agreement between the Government of German Democratic Republic and the Government of the Republic of India in the Field of Merchant Shipping signed on 9.1.1979, as amended up-to-date.

3. ISHIPMENT FROM ADRIATIC PORTS OF EASTERN ITALY AND YUGOSLAVIA

The seller should arrange shipment of the goods by vessels belonging to the following Indian member lines;

1. The Shipping Purchaser of India Ltd.
2. The Scindia Steam Navigation Co., Ltd
3. India Steamship Co., Ltd

For the purpose of ascertaining the availability of suitable Indian vessels and granting dispensation in the event of their non-availability, the Seller should give adequate notice about the readiness of each consignment from time to time at least six weeks in advance of the required position to M/s Schenker & Co. 2000 HAMBURG (Cable: SCHENKER CO., HAMBURG) and also endorse a copy thereof to the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

The seller should arrange shipment through the Government of India's Forwarding Agents M/s Schenker & Co. 2000 HAMBURG (Cable: SCHENKER CO., HAMBURG) or obtain certificate from them to the effect that shipment has been arranged in accordance with the instructions of the Ministry of Surface Transport, (TRANSCART), New Delhi.

4. SHIPMENT FROM POLAND & CZECHOSLOVAKIA

- (i) IMPORTS FROM POLAND

Shipment under this contract would be made by the National flag lines of the two parties and vessels of the third flag conference lines, in accordance with the agreement between the Govt. of the Republic of India and the Govt. of the Polish People's Republic regarding Shipping Co-operation dated 27.6.1960 as amended up-to-date.

(ii) IMPORTS FROM CZECHOSLOVAKIA

Goods under this contract would be signed by the National flag lines of the two parties and vessels of the third flag conference lines, in accordance with the Agreement Co-operation in shipping between India and Czechoslovakia signed on 3.11.1978 and ratified on 19.12.1979, as amended up-to-date.

Shipping arrangement should be made by the Sellers in consultation with Resident Representative of the Indian Shipping Lines in Gdynia, Co., Morska Agencja W. Gdyniul, Pulaskiego 8, P.O. Box 246, Gdynia (Poland) – Telex : MG PL. 054301, Tel.: 207621, to whom details regarding contract number, nature of cargo , quantity, port of lading, discharging, name of Government consignee, expected date of readiness of each consignment etc. should be furnish at least six weeks in advance of the required position, with a copy thereof endorsed to the Shipping Co-ordination Officer, Ministry of Surface Transport, (Chartering Wing), New Delhi, (Cable: TRANSHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

5. SHIPMENT FROM U.S.S.R

Shipment under this contract should be made in accordance with the agreement between the Government of the Republic of India and the Government of U.S.S.R on Merchant Shipping 1976, as amended up-to-date, by vessels of Indo-Soviet shipping Service.

6. SHIPMENT FROM JAPAN

The shipment of goods should be made of India vessels to the maximum extent possible subject to the minimum of 50%.

The Seller should arrange shipment of the goods in consultation with the Embassy of India in Japan, Tokyo to whom details regarding contract number, nature of cargo, quantity, port of loading/discharge, name of Govt. consignee, expected date of readiness of each consignment etc. should be furnished at least six weeks in advance of the required position.

Note: The copies of such contracts are to be endorsed both to the Attached (commercial) embassy of India in Japan, Tokyo, and the shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi.

7. SHIPMENT FROM AUSTRALIA, ALGERIA, BULGARIA, ROMANIA, EGYPT

The Seller shall arrange shipment of the goods by Indian flag vessels to the maximum extent possible subject to a minimum of 50 %. For the purpose of ascertaining the availability of suitable Indian vessels, the seller shall give adequate notice of not less than six weeks about the readiness of each consignment to the Shipping Purchaser of India Ltd., SHIPPING HOUSE, 245, Madame Cama Road, Bombay – 400 021 (CABLE: SHIPINDIA BOMBAY) and also endorse a copy thereof to the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

8. SHIPMENT FROM PAKISTAN

The shipment of cargoes should be made by Indian vessels to the maximum extent possible subject to a minimum of 50 %.

Shipment arrangement should be made by the sellers in consultation with M/s Mogul Line Ltd., 16-Bank Street, Fort, Bombay – 400023 (Cable: MOGUL BOMBAY; Telex: 011 – 4049 MOGUL), to whom, details regarding contract number, nature of cargo, quantity, port of lading discharging, name of government consignee, expected date of readiness of each consignment etc. should be furnish at least six weeks in advance of the required position, with a copy thereof endorsed to the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

9. SHIPMENT FROM U.S ATLANTIC & GULF PORTS

The Seller should arrange shipment of the goods by vessels belonging to the member lines of the India – Pakistan – Bangladesh – Ceylon and Burma Outward Freight Conference. If the Seller finds that the space of the ‘Conference Lines’ vessels is not available for any specific shipment he should take up with India – Pakistan- Bangladesh – Ceylon and Burma Outward Freight Conference, 19, Rector Street, New York, N.Y. 10006 USA, for providing shipping space and also inform the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159)

10. SHIPMENT FROM ST. LAWRENCE AN EASTERN CANADIAN PORTS

The Seller should arrange shipment of the goods by vessels belonging to the following shipping lines;

1. The shipping Purchaser of India Ltd.
2. The Scindia Steam Navigation Co., Ltd

If the Seller finds that the space in the vessels of these Lines is not available for any particular consignments, he should inform the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159) immediately so that dispensation from the shipping lines concerned to use alternative lifting may be sought.

11. SHIPMENT FROM WEST COAST PORTS OF U.S.S CANADA AND OTHER AREAS NOT SPECIFICALLY MENTIONED ABOVE

The Seller should arrange shipment of the goods by Indian vessels to the maximum extent possible subject to a minimum of 50 %. For the purpose of ascertaining the availability of suitable Indian vessels and granting dispensation in the event of their non-availability, the Seller should furnish the details regarding contract number, nature of cargo, quantity, port of lading, discharging, name of government consignee, expected date of readiness of each consignment etc. to the Shipping Co-ordination Officer, Ministry of Surface Transport, New Delhi, (Cable: TRANSCHART, NEW DELHI, Telex: VAHAN IN – 031 – 61157, 61158, 61159) at least six weeks in advance of the required position.

B) **BILLS OF LADING:**

(i) C.I.F./C&F/TURNKEY SHIPMENTS

The Bills of lading should be drawn to indicate Shipper and ‘Consignee’ as under:

SHIPPER: The C.I.F (C&F)/TURNKEY SUPPLIERS concerned.

CONSIGNEE: As per consignee's particulars in the contract (The name and address of the 'Port Consignee' and 'Ultimate' both should be indicated).

(ii) F.O.R SHIPMENTS

The Bills of lading should be drawn indicating shipper Consignee as under:

SHIPPER: The F.O.R suppliers Concerned

CONSIGNEE: Supplier's Indian Agent on order

Note:

1. Moreover the name of the 'Purchaser' and 'Ultimate' Consignee should appear in the body of the Bills of Lading as the 'Notify' or as a remark.
2. Two non-negotiable copies of the Bills of Lading indicating the freight amount and discount, if any allowed, should be forwarded to The Shipping Co-ordination Officer, Ministry of surface Transport (Chartering Wing), New Delhi after the shipment of each consignment is effected.
3. The seller should avoid the use of over-aged vessels for the shipment of the goods under the contract and if so used the cost of additional. Insurance, if any, shall be borne by the seller.

SECTION – XX

CHECKLIST

Name of Tenderer:

Name of Manufacturer:

Sl. No.	Activity	Yes/ No/ NA	Page No. in the Tender document	Remarks
1.	Have you enclosed EMD of required amount for the quoted schedules?			
2(a).	Have you enclosed clause-by-clause technical compliance statement for the quoted goods vis-à-vis the Technical specifications?			
2(b).	In case of Technical deviations in the compliance statement, have you identified and marked the deviations?			
3.	Have you kept validity of 120 days from the Techno Commercial Tender Opening date as per the TE document?			
4(a).	Have you enclosed duly filled Tender Form as per format in Section X?			
4(b).	Have you enclosed Power of Attorney/ Authorisation in favour of the signatory?			
5.	Have you submitted manufacturer's authorization as per Section XIV?			
6.	Have you submitted the certificate of incorporation?			
7(a).	In case of Indian Tenderer, have you furnished Income Tax Account No. as allotted by the Income Tax Department of Government of India?			
7(b).	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?			

Sl. No.	Activity	Yes/ No/ NA	Page No. in the Tender document	Remarks
8.	Have you intimated the name and full address of your Banker (s) along with your Account Number			
9.	Have you furnished Annual Report (Balance Sheet and Profit & Loss Account) for last three years prior to the date of Tender opening?			
10.	Have you submitted the Quality Control Requirements as per Proforma given in Section VIII of TE document?			
11.	Have you accepted delivery period as per TE document?			
12.	Have you accepted the terms of delivery as per 'DDP at consignee site basis'?			
13.	Have you accepted the warranty/CMC as per TE document?			
14.	Have you accepted all terms and conditions of TE document?			
15.	Have you fully accepted payment terms as per TE document?			
16(a)	Have you submitted prices of goods, turnkey (if any), CMC etc. in the Price Schedule as per Section XI?			
16(b)	Have you submitted satisfactory end user performance certificate as per the Proforma for performance statement in Sec. IX of TE document in respect of all orders?			
17.	Have you submitted copy of the order(s) against the above end user certificate (s)?			
18.	Have you furnished documents establishing your eligibility & qualification criteria as per TE documents?			

N.B.

1. All pages of the Tender should be page numbered and indexed.
2. The Tenderer may go through the checklist and ensure that all the documents/confirmations listed above are enclosed in the tender and no column is left blank. If any column is not applicable, it may be filled up as NA.
3. It is the responsibility of tendered to go through the TE document to ensure furnishing all required documents in addition to above, if any.

(Signature with date)

(Full name, designation & address of the person duly authorised sign on behalf of the
Tenderer)
For and on behalf of

(Name, address and stamp of the tendering firm)

Section – XXI**Consignee addresses**

Consignee Address	Telephone No.
Medical Superintendent ESI Medical College and Hospital, Faridabad, Haryana, India	0129-2282443

NB: The purchaser/consignee will ensure timely issue of CDEC, Octroi Exemption Certificates, Road Permits & Entry Tax Exemption Certificates, wherever applicable, to the suppliers.