

**Bidding document for-**

- Group A: Supply, Installation & Commissioning of various Instruments for Group -A-Neurosurgery.**
- Group B : Supply, Installation & Commissioning of Biomedical Equipt. for TB & Chest.**
- Group C : Supply, Installation & Commissioning of Biomedical Equipt. for State Cancer Institute**
- Group D : Supply, Installation & Commissioning of Biomedical Equipt. for Radiation Oncology (SCI)**
- Group E : Supply, Installation & Commissioning of Biomedical Equipt. for NELS Skill Lab.**
- Group F : Supply, Installation & Commissioning of Biomedical Equipt. for Medical Oncology (SCI)**
- Group G : Rate Contract of Media & Consumables for Reproductive Biology.**

## **BIDDING DOCUMENT**

**TENDER NOTICE No: 03/2019- 2020/Bio-Medical Equipment/IGIMS/Store**



### **Supply, Installation & Commissioning of Bio-Medical Equipment's / Instruments**

**TENDER NOTICE No: 03/2019- 2020/Bio-medical Equipment/IGIMS/Store**

Issued to:

Cost of Document: Rs.2000/-

Paid By:           Cash:           Receipt No.:

Demand Draft:    No.:

Issuing Bank:

**(Authorized Signatory)**

**INDIRA GANDHI INSTITUTE OF MEDICAL SCIENCES,  
SHEIKHPURA, PATNA - 800014.**

**INDEX**

<b>Sr. No.</b>	<b>Description</b>	<b>Page No.</b>
01.	<b>CHECK LIST</b>	<b>4-6</b>
02.	<b>ELIGIBILITY CRITERIA</b>	<b>7</b>
03.	<b>INSTRUCTION TO BIDDER</b>	<b>8-14</b>
04.	<b>CONDITION OF THE CONTRACT</b>	<b>15-20</b>
05.	<b>SCHEDULE OF THE REQUIREMENT</b>	<b>21</b>
06.	<b>SPECIFICATION AND ALLIED TECHNICAL DETAILS</b>	<b>28-52</b>

**IMPORTANT DATES**

<b>Last date for Purchase of Bidding Document</b>	Can be downloaded from Institute website
<b>Last date for submission of completed bidding document</b>	16/08/2019 up to 4.00 PM. by registered/speed post/ Courier only
<b>Date of opening of technical bid</b>	17/08/2019 at 11.00 A.M. in Conference Hall IGIMS, Patna.
<b>Date of demonstration of equipment</b>	To be informed to the qualified bidders qualifying after opening of technical bids.

**INDIRA GANDHI INSTITUTE OF MEDICAL SCIENCES,**  
**SHEIKHPURA, PATNA -800014 (Bihar, India)**

Sr. No. of Tender: \_\_\_\_\_

FILE NO. : Tender No.: \_\_\_\_\_

Tender form issued in favour of: \_\_\_\_\_

Dear Sir,

1. I/We hereby submit our tender for the \_\_\_\_\_
2. I/We are enclosing herewith the Demand Draft No..... dated..... for **Rs.** /- drawn in favour of **Director I.G.I.M.S. - Patna (payable at Patna)** towards **EMD / Bid Security.**

**(EMD AND COST OF BIDDING DOCUMENTS MUST BE SUBMITTED IN SEPRATE ENVELOP.TENDERS NOT ACCOMPANIED WITH EMD / BIDSECURITY ALONGWITH THE TECHNO-COMMERCIAL BID SHALL BE SUMMARILY REJECTED).**

3. I/We have gone through all terms and conditions of the tender documents before submitting the same.
4. I/We hereby agree to all the terms and conditions, stipulated by the I.G.I.M.S. - Patna including delivery, warranty, penalty etc. Quotations for each group are being submitted under separate covers, and sheets and shall be considered on their face value.
5. I/We have noted that overwritten entries shall be deleted unless duly cut & rewritten and initialled.
6. Tenders are duly signed and stamped.(No thumb impression should be affixed)
7. I/We undertake to sign the contract/agreement, if required, within 15 (Fifteen days) from the date of issue of the letter of acceptance, failing which our/my EMD/Bid deposited may be forfeited and our/my name may be removed from the list of suppliers

Yours faithfully,

(Signature of Bidder with full name and address)

## CHECK LIST FOR TERMS AND CONDITIONS

A.: To be filled by the bidder and submitted along with the **Technical Bid.**

Sr. No.	Terms & Conditions as per Bidding Document	Page No.	Remarks
1.	<b>Status of Bidder:</b> <ul style="list-style-type: none"><li>• Manufacturer or Authorized Agent of the Manufacturer</li><li>• Whether Public Undertaking, Public Ltd., Private Ltd. Company or Proprietary Firm/partnership firm</li><li>•</li></ul> (Please attach Notary certified <b>MANUFACTURER'S AUTHORISATION FORM</b> as per <b>FORMAT</b> placed at <b>Annexure – III</b> )		
2.	<b>Power of Attorney as per Annexure - V</b> in favour of person to sign, submit and negotiate the bid.		
3.	Certificate towards market standing of minimum 05 years in the area of supply and or maintenance of bio-medical equipment's.		
4.	Certificate for sole ownership / partnership		
5.	Statement of financial standing from bankers		
6.	Statements of turnover per year for last three successive years duly certified by the Chartered Accountants.		
7.	<b>Notary certified User List</b> (List of Govt. /Semi Govt., Reputed Pvt. Hospital) where quoted model of the items has been supplied and installed.		
8.	<b>Notary certified Supply</b> order copy (Minimum 3nos. or more) issued by Govt./Semi Govt./Reputed Pvt. Institutions/organization for the quoted items. ( same model)		
9.	<b>Notary certified Performance certificate</b> of the same supplied machine (of quoted make and Model) issued by <b>Head of the dept. or Institution</b> after a minimum period of six months of installation		
10.	Prerequisite (if any) for installation of the Machine, if any, to be provided by the Institute.		
11.	Whether rates quoted are inclusive of all taxes or not.		
12.	Whether rates are quoted as per format mentioned in the Bidding Document or not.		
13.	Affidavit to the effect that the bidder is not blacklisted by any Govt. agency or have no pending case either Civil or Criminal against them.		
14.	Affidavit, to the effect that the bidder is not supplying the quoted item(s) to any other Govt. / Pvt. Organizations / Institutions / Hospitals at the rate lower than the rate quoted against this tender.		
15.	<b>Quality Assurance Certificate</b> like ISI, ISO-9002,		

	IP/BP, CE, FDA (US) or any other (please specify)		
16.	<b>Bid Security</b> amount deposited is enclosed or not. If yes, please mention the details.		
17.	<b>Original Technical Catalogue</b> of the quoted model .		
18.	Certificate, to the effect that bidder will maintain the quoted item(s) during Warranty period of three years including all spares, accessories, consumables etc.,  (Please mention the name of the item / items with price, which are not supplied by the bidder free of cost with frequency of replacement)		
19.	Certificate, to the effect that bidder has quoted its rate for Comprehensive Annual Maintenance Contract inclusive of labour, spares, consumables, accessories etc. on per year basis for a further period of seven years after expiry of warranty period of three years in the <b>price bid</b> .  (Please mention the name of the item / items with price, which are not supplied by the bidder free of cost with frequency of replacement during Comprehensive Annual Maintenance Contract period in the price bid)		
20.	Acceptance of all terms / conditions towards <b>after sales / services</b> as mentioned in the bidding document.( Clause No- 13 of “ Instruction to Bidder “ & clause no- 3, 4 and 5 of Condition of contract.)		
21.	<b>Compliance Statement</b> with relation to the technical specification as mentioned in the bidding document duly supported by the original catalogue. The bidder must quote specification in the compliance column Mere writing” Complied shall not be accepted.		
22.	<b>Compliance Statement</b> with relation to the terms & conditions as mentioned in the document.		
23.	<b>PAN and copies of Income Tax Returns</b> for the last three years.		
24.	Duly attested copy of GST registration certificate.		

**B: To be filled by the Bidder and submitted along with Price Bid**

<b>Sl. No.</b>	<b>Terms &amp; Conditions as per Bidding Document</b>	<b>Page No.</b>	<b>Remarks</b>
1.	<b>Item wise price for the item(s)</b> as mentioned in the Bidding Document and as per format attached as <b>Annexure – I(a) or I (b)</b>		
2.	<b>Rate for Comprehensive Annual Maintenance Contract</b> as per terms & conditions mentioned in the Bidding Document and as per format attached as <b>Annexure - II</b>		

**Note: If the above tender details are not mentioned and required documents are not attached at appropriate places, the offer of the bidder(s) shall be summarily rejected. Hence, bidder(s) are advised to go through the bidding document carefully and tender be prepared with all the required documents to avoid rejection of offer.**

(Name of the Bidder with signature & seal)

## ELIGIBILITY CRITERIA

01	Manufacturers or their authorized dealers/Indian subsidiaries/direct importers having a place of business in any of the States of India are eligible to participate in this tender.	Mentioned  Page no.
02	The bidder and manufacturer of the equipment offered should be in the business of the supply and installation of same / similar equipment for the last five calendar years.	
	<p>(a)The manufacturer should have completed at least 05( Five ) nos. installations of the quoted items in Govt. /Pvt. Institutions /Hospitals in India. The installations mentioned by the manufacturer in their offer must be functional and performance certificate for the same issued by the user concerned also be attached with the offer.</p> <p>(b) The bids quoted as the authorized representative of the manufacturer meeting the above criteria 02 (a) should have also supplied and installed at least 03( Three) nos. installations of the quoted items in Govt. /Pvt. Institutions/ Hospitals in India in last five years from the last date of submission of tender. The installations mentioned by the authorized representative in their offer must be functional and performance certificate for the same issued by the user concerned also be attached with the offer.</p>	
03	The Bidder should be public undertaking /Autonomous Body /Public Ltd./Pvt. Ltd. Company or proprietary firm /Partnership Firm and should be in medical equipment business since last five years in India. The Bidders having manufacturing facility in their name in India for the majority of the items offered by them shall be given preference.	
04	The Bidder (manufacturer or their authorized agent) should have had average annual financial turnover of Rs. 50 Lakh during the last three years ending s 31 <sup>st</sup> March 2018.	
05	Bidders who have the capability to attend repairs of these equipment within the time mentioned in this bidding document and who are willing to provide stand by equipment or replace the faulty equipment if the repair/down time extends beyond 72 hours from the time of reporting of the fault within the next 48 hours (total down time should not exceed 5 days in one instance). The bidders who have the capability to ensure the uptime mentioned in this document (Documentary proof shall be submitted on the after sales facilities and expertise of the bidder.)	
06	Bidders are not offering the equipment of a firm /company that has been blacklisted by Indira Gandhi Institute of Medical Sciences – Patna or blacklisted/debarred by any other State / Central Government's organization.	

**Note:**

- Notwithstanding anything stated above, the Institute reserves the right to assess the Bidder'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.
- The Institute reserves the right to ask for a free demonstration of the quoted equipment at a pre-determined place acceptable to the purchaser of technical acceptability as per the tender specification, before the opening of the price tender.

## INSTRUCTION TO BIDDER

### GENERAL INSTRUCTIONS TO BIDDERS

#### 1. **Tendering System**

The tenders/Bids are to be submitted in two Parts i.e. **Part - I & Part II**.

**PART - I titled as TECHNICAL BID** shall contain the complete technical specifications and details on the competency of the bidder and also the commercial bid package with terms and conditions of supply, warranty, after sales service etc. (Except Price Bid Form). Apart from the documents and signed copy of the purchased tender document, the necessary enclosures should be submitted in this technical bid. In short, the technical bid should contain all the necessary documents to prove the technical competency and capability of the bidders for supplying and installing a trouble free equipment meeting the quality standards and technical specification and the ability of the bidders for providing efficient after sales service to the satisfaction of the Tender Inviting Authority and the user institution.

#### **PART - II titled as PRICE BID**

2. The tender offers, duly filled, shall be submitted in sealed covers for **technical**. Such covers shall be super scribed as **“Tender No..... (here mention the tender no as specified) TECHNICAL BID for supply of ..... (here mention the name of the equipment**
3. Quantity of items may increase or decrease. Director, I.G.I.M.S. - Patna reserves the rights to purchase different sub items/ components of items from different bidders.

This rate Contract will be valid for one year from date of 1<sup>st</sup> satisfactory installation and acceptance of the equipment. Repeat Supply Order will be placed as per requirement of the Institute of all the quoted and approved items. The rate contract may be further extended for period of one year as decided by Director, IGIMS-Patna.

4. The “Bidding Document” along with terms and conditions, technical specification can be obtained from the office of the Store Officer, IGIMS, Patna on payment of Rs.2000/- (Rs. Two thousand only) Non –refundable for each Group by demand draft favouring Director , IGIMS, Patna payable at Patna.
5. The “ Bidding Document” can also be downloaded from institute website [www.igims.org](http://www.igims.org). In case, downloaded bidding document is used, Bidder(s) have to submit the cost of the Tender Document along with the completed documents in the form of demand draft in favour of Director , IGIMS, Patna, payable at patna towards cost of the “ Tender documents” Bidder is required to attach separate DD for the same in a separate envelop super scribed with “ cost of bidding document” if the cost of tender document is not submitted by the bidder, his offer shall be outright rejected .

**6. Last date for submission of bidding document is 16/08/2019 up to 4.00PM by speed/Regd. post/ Courier only and technical bid will be opened on 17/08/2019 at 11.00 AM in Conference hall IGIMS, Patna**

#### 7. **Earnest Money Deposit (EMD):**

**Earnest Money 2% of the cost of Equipment required** to be submitted along with tender by Demand Draft from any scheduled Indian Bank (valid up to one year from the date of technical bid opening.) only along with the tender favouring Director, I.G.I.M.S. – Patna (payable at Patna). No interest is payable on EMD/ Bid security.



- a. Bidder may quote more than one/several models. In such a situation EMD will be payable on the basis of highest priced model.
  - b. EMD of the unsuccessful bidders will be returned to them at the earliest after expiry of final bid validity and latest on or before the 30<sup>th</sup> day after the award of the contract without any interest.
  - c. EMD must be submitted in separate sealed envelope and endorsement of the same with DD number & date Bank Guarantee No. and its validity period be made with technical bids without amount stating that the same has been complied with price bid. If same is later found not enclosed tender will be cancelled for the party.
  - d. Non- submission of sufficient EMD along with the Technical Bid shall be one of the primary reasons for rejection of the offer in the first round.
  - e. Cheque, Cash payment, Money Order, Fixed deposit etc will not be accepted as EMD.
  - f. Public Sector Units within the State or State micro, small and medium enterprises registered with Govt. are exempted from remittance of EMD subject to submission of valid documents.
  - g. The EMD shall be in one of the following forms:
    - i. A demand draft in favour of Director, I.G.I.M.S. – Patna (payable at Patna);
    - OR
    - ii. A Bank Guarantee issued by a nationalized/ scheduled bank located in India, in the form prescribed in the tender document as Annexure- IV (valid up to one year from the date of technical bids opening) Bank Guarantee in any other format will not be acceptable and render the bid non-responsive.
    - iii. The successful Bidder's EMD will be discharged upon the Bidders signing the contract and furnishing the performance security. The EMD deposited in the form of DD of the successful Bidder can be adjusted towards the security deposit payable.
9. Bidder(s) should mention the DGS & D registration, if registered, and attach photocopy of DGS & D registration certificate Photocopy of Income tax & sales tax clearance certificate should be enclosed.
10. For Imported Goods, Indian Agency Commission must be declared in financial bid.
11. The Bidder's shall have to submit the following documents (Certified by Notary) in technical bid: -
- a. User List (List of Govt. / Semi Govt., Reputed Pvt. Hospital) where quoted model of the items has been supplied and installed.
  - b. Supply order (minimum 3 nos. Or more issued by govt./semi govt./reputed pvt.institution/organisation for quoted items ( same model)
  - c. Performance certificate of the same supplied machine (of quoted make and Model) issued by **Head of the deptt. or Institution** after a minimum period of six months of installation.
  - d. Prerequisite (if any) for installation of the Machine if any to be provided by the Institute.
  - e. If the manufacturing company and/or its Indian agent (for Foreign manufactured) have authorized some agency for participation in this tender for a limited period than in that case they (Manufacturer / Indian agent) shall have to submit an undertaking duly notarized by Public notary that if their tender is selected they shall be solely responsible for compliance of all the terms and conditions mentioned in the bilateral agreement for purchase and subsequent supply order even if their authorized agent is changed. Any tender offer without such certificate duly certified by public notary shall be rejected in technical scrutiny itself.
  - f. **Bidder must submit a compliance checklist along with the technical bid itself.**

- g. (Any tender offer without submission of above mentioned document (i.e. a to e) shall be rejected during technical scrutiny.)
- h. If any new System/ Latest model machine is a launched in the market and seller has not installed such quoted models they should submit an undertaking that he has not installed such models previously (Notarized by Public Notary).They may submit supply order / performance certificate of previous model, which was recently installed by them.

**Installation & site plan:-**

Requirement regarding site/location etc. for installation of equipment, if any, should be mentioned in the tender. Time required for installation of system after delivery must be mentioned. In case of delay in installation institute will have right to charge liquidated damage. Specify the following points for installation of the System: -

- a. Total power consumption along with break up of main System and Accessories.
- b. Whether the System needs uninterrupted power supply where ever applicable.
- c. Maximum tolerated transfer time in case of interruption of power supply.
- d. Whether the System needs any humidity control device.
- e. Whether the System needs any separate power line/isolation Transformer.
- f. Does the System need the electrical shielding?
- g. Does it require special civil works for installation?
- h. Whether Air conditioner is an essential requirement for the system.
- i. Does it require any special civil works for Installation?

**12. After Sales Service Conditions:**

- a. The Institute is in the pursuit of ensuring excellent after sales service for every user in respect of the equipment's supplied under this contract. The after sales services terms and conditions will be strictly enforced and those Bidders who are willing to support the Institute in its endeavour to provide trouble free operation/performance of the equipment's for the prescribed period need only participate in the tender.
- b. The after sales service shall be performed during the warranty period and also during the Comprehensive Maintenance Period (CMC)/ Annual Maintenance Contract, if awarded. The detailed terms and conditions for after sales service are mentioned hereunder.

**c. Guarantee/Warranty Terms:**

- i. The successful Bidder has to warrant that the Goods supplied under this Contract are new, unused, of the most recent or current models and incorporate all recent improvements in design and materials unless provided otherwise in the Contract.
- ii. The successful Bidder further have to warrant that the Goods supplied under this Contract shall have no defect arising from design, materials or workmanship (except when the design and/or material is required by the Tender Inviting Authority's specifications) or from any act or omission of the successful Bidder, that may develop under normal use of the supplied goods.
- iii. All the equipment's including the accessories supplied as per the technical specification as mentioned in the bidding document should carry comprehensive warranty (including all spares, accessories and consumables) for a period mentioned in this document in the first instance. During this period, the successful Bidder shall replace all defective parts / accessories / consumables and attend to all repairs/break downs and undertake stipulated number of preventive maintenance visits to every user installation site. The cost of spare parts for all replacements has to be borne by the successful Bidder during the period of comprehensive warranty. The items which are not covered under warranty should be clearly mentioned along with rate of the items . If any spares / accessories / consumables etc. are not replaced by the bidder during warranty period, bidder should mention it clearly with name of the items with frequency of replacement and its rate of the item.
- iv. On expiration of the comprehensive warranty period, the successful Bidder shall be willing to provide after sales support for an additional period prescribed in this document.

- v. The prospective Bidder, who are not manufacturers, shall submit an undertaking from the Original Equipment Manufacturers (OEM) that they are willing to provide spare parts for the period of warranty as mentioned and also during the additional CMC/AMC period, if awarded. The OEM shall also assure continuity of service to their product, in the event of change in dealership or the Bidders – their existing dealers - couldn't provide service during the warranty / CAMC period. The undertaking from OEM is an essential document forming part of the Technical Bid, without which the tenders will be rejected summarily in the first round itself.
- vi. After sales service centre in Patna (Bihar) preferably or at least in East India should be available as part of the pre-qualification and the Bidder shall provide proof of their capability to undertake such maintenance/repair within the stipulated time.
- vii. The successful Bidder shall provide preventive maintenance as per the frequency mentioned in this document during the warranty period. The Bidder shall attend any number of break down/repair calls as and when informed by the institute authority.
- viii. Upon receipt of such notice for repair/breakdown from the institute, the successful Bidder shall, within the period as specified in this document, and with all reasonable speed, repair or replace the defective goods or parts thereof, without cost to the Tender Inviting Authority.
- ix. If the successful Bidder, having been notified, fails to rectify the defect(s) within the period specified mentioned in this document, the Tender Inviting Authority may proceed to take such remedial action as may be deemed necessary, at the successful Bidder's risk and cost and without prejudice to any other rights which the Tender Inviting Authority may have against the successful Bidder under the contract.
- x. Failure to attend the repairs in time or failure to attend the stipulated preventive maintenance visit or failure to replace the defective equipment's or to provide stand by equipment if the fault/down time exceeds the stipulated period or to ensure the stipulated up-time in an year shall lead to forfeiture of the performance security and/or may lead to blacklisting/debarring of the defaulting Bidder.
- xi. The equipment which requires quality assurance test shall be done at free of cost immediately after installation, during the comprehensive warranty period, during the CMC/AMC period, by the demand of User and also when major spares are replaced.
- xii. Any mandatory approval required for installation shall be obtained by the successful Bidder in liaison with the respective authorities.
- xiii. The Bidder shall submit the parameters which require calibration and the frequency of calibration required.
- xiv. The Bidder shall undertake on-site calibration of the equipment every year as part of the after sales service during the period of comprehensive warranty, CMC/AMC or on demand from the user.
- xv. The Bidders shall also have to submit whether periodic replacements of consumable items are required for proper functioning of their quoted machine/Equipment? If yes they should submit the list of such consumables along with price list and frequency of replacement per year, if the same is not replaced free of cost during warranty / guarantee period.
- xvi. An undertaking of the principal regarding continuity of after sales and services (CAMC) @ the agreement rate even in case of changes of Indian agent during the life span of the equipment, must be enclosed in the technical bid. Further, it will be the responsibility of the manufacturer Indian agent to get counter signature on the agreement to be executed with them by the principal.

Xvii;- The offered warranty includes:

- Visits to the user institutions at frequencies prescribed as part of preventive maintenance.
- Testing & calibration as per technical/service/operation manual of the manufacturer or as per the period specified or as per the demand of the user.
- Quality Assurance tests (if applicable).
- The cost of labour for all repairs/ and all spares required for replacement during repairs all kinds of accessories, Probes, all types of sensors and transducers, Electrodes, Detectors, battery, battery for UPS, other vaccumatic parts etc wherever applicable and also the accessories and other devices supplied along with the equipments like stabilizer, UPS, AC, Computer, Compressor, Monitor, etc, which forms part of the equipment system, without which it cannot perform satisfactorily.
- The exclusion of warranty of any vital equipment parts will be compared with offers of other Bidders during evaluation of the bids and this may be taken into consideration in deciding the successful Bidder on the basis of expert advice.
- The Bidder shall provide up-time warranty of complete equipment as mentioned in this document, the uptime being calculated on 24 (hrs) X 7 (days) basis failing Warranty period will be extended for every additional day of down time equal to one week.
- All software updates, if any required, should be provided free of cost during Warranty period.

**d. Comprehensive Annual Maintenance Contract:**

- The decision to enter into CMC or AMC will be determined on the basis of cost and complexity of the equipment by the Tender Inviting Authority, at its discretion, prior to the expiration of warranty period.
- The Comprehensive Maintenance Contract (CMC) is otherwise an extended warranty. All the terms and conditions agreed by the successful Bidder for executing the comprehensive warranty of the equipment shall be extended during the period of CMC, only difference being the payment of CMC charges is absent during the period of comprehensive warranty.
- The cost of CMC, accessories spares, and consumables as in case may be quoted along with taxes applicable, if any. The taxes to be paid extra, to be specifically indicated. 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.
- Failure/refusal on the part of the successful tender supplying/installing the equipment's to enter into CMC with the Tender Inviting Authority, at the end of the Comprehensive Warranty Period, if the Institute, as the case may be, desires so, shall lead to forfeiture of performance security and may also result in the blacklisting/debarring of the Bidder.
- The successful Bidder shall also indicate the rates for the CMC in price bid form and such rates are binding on the successful tenders after the expiration of the warranty period. The yearly rates for CMC shall remain the one and the same as quoted in the price bid form for the extended years.
- Cost of CMC (excluding taxes, if any) will be considered for Ranking/Evaluation purpose.
- The payment of the agreed CMC charges will be made as per frequency for payment after satisfactory completion of said period, on receipt of service report/ break down report from the user.
- The Bidder shall also have to submit whether periodic replacement of consumable items are required for proper functioning of their quoted machine/Equipment? If yes they should submit the list of such consumables along with price list and frequency of replacement per

year if the same is not included in quoted Comprehensive Annual Maintenance Contract charges per year.

**13. Time Limits prescribed**

Sl. No	Activity	Time Limit
a.	Installation & Delivery period	12 weeks from date of issuance of Supply Order
b.	Comprehensive warranty period	3 years from the date of successful installation.
c.	CMC period	7 years
d.	Frequency of visits to all User Institution concerned during Warranty/CMC	One visit every three months (4 visits in a year) for periodic/preventive maintenance and any time for attending repairs/break down calls.
e.	Frequency of payment of CMC charges	Every six months after completion of the Period.
f.	Submission of Performance Security and entering into contract	10 days from the date of issuance of Letter of Intent
g.	Maximum time to attend any Repair call	Within 24 hours.
h.	Uptime in a year during warranty as well as during CAMC period.	95% of 365 days.

14. Firm have to provide a minimum **UPTIME GUARANTEE** of 95% (95% of 365 Days) per year during the warranty period as well as during the Comprehensive Annual Maintenance Contract.
15. **While calculating the total unit price of the item / system to be procured, expenditure to be incurred in maintenance of the quoted item / system including all spare parts for a total period of seven years after expiry of the warranty period of three years shall also be taken into consideration. Accordingly, it is mandatory for the bidders to submit the rate for Comprehensive Annual Maintenance Contract (with spares) for a minimum period of seven years after the expiry of warranty period of three years.**
16. Supplier will submit undertaking for ensuring uninterrupted supply of spares during the total life span of the equipment's.
17. Indian agency commission and Installation charge if any will be paid in Indian rupees after successful installation and demonstration of the equipment's.
18. Principal's Invoice of the quoted items must be submitted with the quotations.
19. Proof of the official Indian agent certificate of the firm must be attached. (Notary Certified Photocopy)
20. In order to fully and optimally utilize the equipment, training to Para Medical Staffs and Doctors should be provided. In continuation to this training, separatemaintenance training for the machine and the sub systems should also be given to the "Equipment Maintenance Engineer" and "Equipment Maintenance Technicians". All the financial commitments in this regard shall be met by the bidder(s).
21. Bidder(s) have to submit an affidavit to the effect that they have not supplied the offered item(s) to any Govt., semi Govt. / Pvt. Organization, Institution, Nursing Home etc. at the price lower than the price offered to I.G.I.M.S. – Patna.
22. All the claims regarding meeting the specifications shall be duly supported by appropriate, latest technical catalogues/brochures from the manufacturer. Simply stating that the equipment(s) meets the specifications is not sufficient and any such quotations will be summarily rejected. Computer printed documents or Photostat copy or laser printouts will not be accepted as technical catalogues / brochures.
23. Bidder might be required to demonstrate the system at the discretion of the institute.
24. **Notification of Award/Letter of Intent (LOI)**
  - a. Before expiry of the tender validity period, the Institute will notify the successful Bidder(s) in writing, by registered / speed post or by fax or by email (to be confirmed by registered / speed post immediately afterwards) that its tender for equipment(s), which have been selected by the Institute, has been accepted, also briefly indicating there in the essential details like description, specification and quantity of the goods & services and corresponding prices accepted. This notification is undertaken by issuing a

Letter of Intent (LOI) by the Institute.

- b. The successful bidder, upon receipt of the LOI, shall furnish the required performance security and submit an agreement in the prescribed format within ten days, failing which the EMD will be forfeited and the award will be cancelled.
- c. The Notification of Award shall constitute the conclusion of the Contract.

25. **Signing of Contract**

The successful bidder shall execute an agreement for ensuring satisfactory supply, installation, commissioning and the after sales service/support during the warranty period and during the Comprehensive Annual Maintenance Contract.

27. The Director reserves the right to accept or reject any or all tenders without assigning reasons.
28. The Director reserves the right to modify, add or delete any terms & conditions of the contract as and when required.

29. **Amendment of tender documents:**

- a. At any time prior to the dead line for submission of Tender, the Institute may, for any reason, modify the tender document by amendment.
  - b. The amendment shall be notified and uploaded on the institute website [www.igims.org](http://www.igims.org) only and such amendments shall be binding on them thereafter.
  - c. The Institute shall not be responsible for failure to inform the prospective bidders. Purchasers of tender documents are requested to browse the website of the Institute for information/general notices/amendments to tender document etc on a day to day basis till the tender is concluded.
30. The Dispute, if any, will be subject to Jurisdiction at Patna (Bihar).

**Director,  
I.G.I.M.S. - Patna**

## CONDITIONS OF THE CONTRACT

**01. Duty Free Clearance, Transportation, Forwarding & Handling Charges:**

Clearance charges at point of Entry / Air Port and on ward transportation charges with Insurance up to I.G.I.M.S. - Patna will be borne by supplier's Indian Agent for which this Institute will not pay the charges. The firm should quote as FOR IGIMS Patna including all expenditure.

**02. Demurrage, Taxes & Octroi:-**

No demurrage charges will be paid by the Institute in case of delay on the part of supplier. However, this Institute will provide all necessary documents required for clearance / transportation of the goods and for exemption of the taxes/octroi for which supplier/Indian agent will have to intimate/furnish his requisition of document required, if any, well in advance. Octroi will be payable by supplier / Indian agent, if required.

**03. Warranty Period:**

a. The “**Complete System**” shall remain under warranty period of **three years** from the date of satisfactory installation. The Complete System should include the basic unit and allied supporting components like UPS, Computer System, Printer, De-ionizer, Dehumidifier etc. to be supplied by the bidder along with basic unit if necessary for running the system.

b. During warranty period of three years, bidder shall provide at least **four maintenance visits per year** at regular interval for usual maintenance and supervision. If bidder fails to provide these maintenance visits at regular interval, a proportionate deduction in the form of penalty on pro-rata basis will be recovered from the bidder from the Bank Guarantee amount. In case the Bank Guarantee is not adequate, Institute shall have right to recover the losses / penalty from other sources as well.

c. Bidder shall also attend all breakdown calls within 48 hours of the receipt of the information from institute through fax/e-mail/mobile/sms etc.

d. During warranty period, **bidder** shall maintain and keep **95% uptime** per year of the “**Complete System**” as per calculation given below:-

$$\begin{aligned} 1 \text{ Year} &= 365 \text{ days} \\ 95\% \text{ of } 365 \text{ days} &= 347 \text{ Days per annum} \end{aligned}$$

e. The bidder shall compensate the uptime less than the specified above for **every additional day** of down time over and above 18 days stipulated above, warranty period will get extended by one week as penalty at no extra cost i.e. the extended penalty period will be equal to one week for every additional day of down time.

f. During warranty period, **bidder** will make the “**Complete System**” in satisfactory working condition. In case, any spare parts, accessories, PCB, consumables etc. needs replacement due to normal wear and tear, **bidder** will supply and install the same for which no additional payment is to be made with a validity to cover warranty period if required.

g. In case, the **bidder** is not able to provide services (and the items / accessories is not functioning as the reason thereof) due to natural calamity (act of God), Political unrest, Riot and fire at the user site, then in such a situation the warranty period will be extended by the period for which the item / accessories could not be operated because of supplier not been able to provide services.

h. During warranty period, in case of any alleged damage due to accident / human error, a committee under the Chairmanship of Director, I.G.I.M.S. – Patna with one member from the bidder and one member from the Institute will decide the authenticity of the claim. The decision of the committee shall be final and binding on both the parties.

**04. After Sales Services: -**

a. After expiry of the warrantee/Guarantee period of the equipment, the Indian agent will have to undertake the Comprehensive Annual Maintenance contract (with spare parts, accessories, consumables etc.) of the Complete System for the further life span of equipment. The life span

of the equipment shall not be less than ten years. In special circumstances the total life span of the Equipment/ items may be reduced by the Institute.

- b. The Complete System should include the basic unit and allied supporting components like UPS, Stabilizer, Computer System, Printer, De-ionizer, Dehumidifier etc to be supplied by the bidder along with basic unit if necessary for running the system.
- c. During Comprehensive Annual Maintenance Contract, bidder shall provide at least **four maintenance visits per year** at regular interval for usual maintenance and supervision. If bidder fails to provide these maintenance visits at regular interval per year, a proportionate deduction in the form of penalty at the rate of 25% of contract amount per year will be deducted.
- d. Bidder shall also attend all breakdown calls within 48 hours of the receipt of the information from institute through fax/e-mail/mobile/sms etc.
- e. During Comprehensive Annual Maintenance Contract, **bidder** shall maintain and keep **95% uptime** per year of the “**Complete System**” as per calculation given below:-  
1 Year = 365days  
**95% of 365 days = 347 Days per annum**
- f. The bidder shall compensate the uptime less than the specified above for **every additional day** of down time over and above 18 days stipulated above, warranty period will get extended by one week as penalty at no extra cost i.e. the extended penalty period will be equal to one week for every additional day of down time.
- g. During Comprehensive Annual Maintenance Contract, **bidder** will keep the “**Complete System**” in satisfactory working condition. In case, any spare parts, accessories, PCB, all type of consumables etc. needs replacement due to normal wear and tear, **bidder** will supply and install the same for which no additional payment is to be made. .If any spares / consumables / accessories etc. are not covered under Comprehensive Annual Maintenance Contract charges, it should be clearly mentioned with frequency of replacement and with rate. The validity of rate of such items should also be mentioned clearly. What will be the rate of escalation on the quoted rate after expiry of the validity of rate of such item must be mentioned.
- h. The payment of Comprehensive Annual Maintenance Contract will be made on half yearly basis after submission of satisfactory functioning report of the Complete System by the officials authorized by the Institute.
- i. In case, the **bidder** is not able to provide services (and the items / accessories is not functioning as the reason thereof) due to natural calamity (act of God), Political unrest, Riot and fire at the user site, then in such a situation the Comprehensive Annual Maintenance Contract will be extended by the period for which the item / accessories could not be operated because of supplier not being able to provide services.
- j. During Comprehensive Annual Maintenance Contract, in case of any alleged damage due to accident / human error, a committee under the Chairmanship of Director, I.G.I.M.S. – Patna with one member from the bidder and one member from the Institute will decide the authenticity of the claim. The decision of the committee shall be final and binding on both the parties.

#### 05. **Performance Security**

- a. There will be a performance security deposit amounting to 10 % of the total value of the equipment excluding taxes, which shall be submitted by the successful bidder within 10 days from the date of issuance of “Letter of Intent”.
- b. The contract duly signed and returned to the Institute shall be accompanied by a demand Draft or Bank Guarantee in the prescribed format.
- c. Upon receipt of such contract and the performance security, the Institute shall issue the Supply Orders containing the terms and conditions for the execution of the order.



- d. Failure of the successful bidder in providing performance security as mentioned above and / or in returning contract copy duly signed in time shall make the bidder liable for forfeiture of its EMD.
- e. The Performance security shall be denominated in Indian Rupees or in the currency of the contract as detailed below:
  - i. It shall be in any one of the forms namely Account Payee Demand Draft or Bank Guarantee issued by a Scheduled bank in India, in the prescribed form as provided in this document endorsed in favour of the Institute.
  - ii. Institute will release the Performance Security without any interest to the successful bidder on completion of the successful bidder's all contractual obligations including the warranty obligations & after receipt of certificates confirming that all the contractual obligations have been successfully complied with.

**06. Delivery period/Liquidated Damage: -**

Goods should be delivered within three months after receipt of irrevocable and confirmed Letter of Credit. If the delivery is not affected by due date, the Director, I.G.I.M.S. - Patna shall have the right to charge liquidated damage on supplier/his Indian agent as under: -

- i. 1<sup>st</sup> extension for a month or a part thereof @ 2% per month of C.I.F. value.
- ii. 2<sup>nd</sup> extension for an additional month or a part thereof @ 3% per month of C.I.F. value subject to maximum Limit of 20% of the order items. All expenses incurred for extension of L.C. will be borne by supplier/his Indian agent.
- iii. Cancellation.- If delivery is not done even after 2<sup>nd</sup> extension Institute shall have the right of cancellation of Supply order at its discretion.

**07. Payment: -**

100% payment through International Irrevocable Letter of Credit in favour of principal abroad, but 80% will be released on shipment of goods & balance 20% after satisfactory installation of equipment on submission of Bank Guarantee of value not less than 20% of the cost of the quoted equipment (with a minimum validity to cover up the warranty / guarantee period) will be submitted by supplier. This Bank Guarantee will be released after expiry of guarantee period.

- a. In case, the equipment is purchased in Indian Currency then the payment will be made as per following scheduled.
- b. 90% payment will be released against delivery and successful installation of the equipment & balance 10% will be released on submission of 10 % Bank Guarantee of the total cost of ordered value. This Bank Guarantee will be released after expiry of guarantee period.
- c. L. C. will be opened only after receipt of the 20% bank Guarantee of the total cost of equipment (with a minimum validity to cover up the warranty / guarantee period), confirmation letter of all our terms and condition, submission of agency certificate in favour of Indian agent who have submitted and quoted the price, name of the Bankers abroad; intimation about country of origin and 10 copies of Performa invoice of the ordered item. Indian Agency commission will be paid in Indian currency only to Indian agent, if any. No extra charges will be paid for installation/demonstration and training to personnel.

08. **Validity of Price:-**

Minimum up to one year from date of tender submission and it should be extendable.

09. **Part Supply:** No part supply/ wrong supply or short supply will be accepted by the Institute. The Director IGIMS, Patna will be the final authority and will have the right to reject full or any part of supply, which is contradictory to the terms and conditions agreed at the time of placement of order. In case of rejection of any supplied items due to nonconformity in quantity and/or quality, Institute will have right to charge liquidated damages, as it deems fit

10. **Packing & Marking:-**

Goods must be securely and adequately packed and protected in order to prevent damage, otherwise all losses and /or damage resulting from inadequate packing and/or inadequate protection or inadequate marking shall be borne by seller/seller's Principal abroad.

11. Supplier may have to provide required manpower for running the equipments at mutually agreed remuneration (Which shall not be more than remuneration payable for the particular category of staff at IGIMS) at the sole discretion of the Institute, till institute is able to arrange its own staff for the purpose.

12. **Insurance: -**

Insurance up to Patna will be borne/arranged by principal supplier/his Indian Agent.

13. **Installation & site plan:**

Requirement regarding site/location for installation of equipment, if any, should be mentioned in the tender. Time required for installation of system after delivery must be mentioned. In case of delay in installation institute will have right to charge liquidated damage.

Specify the following points for installation of the System: -

- a. Total power consumption along with breakup of main System and Accessories.
  - b. Whether the System needs uninterrupted power supply.
  - c. Maximum tolerated transfer time in case of interruption of power supply.
  - d. Whether the System needs any humidity control device.
  - e. Whether the System needs any separate power line/isolation Transformer.
  - f. Does the System need the electrical shielding?
  - g. Whether Air Conditioner is required for the System.
  - h. Does it require special civil works for installation?
14. The bidder should also quote for supply of "Un-Interrupted Power Supply" (UPS) with a battery backup of at least 30 minutes, "Constant Voltage Transformer (CVT)" of reputed manufacturer of required capacity along with Spike Suppressor or "Servo Voltage Stabilizer" as per requirement of the System. Bidder may quote the prices for all the above items (UPS/CVT/SERVO VOLTAGE STABILIZER) and the decision will be taken during technical evaluation of the item whether UPS is suitable or CVT / Servo Voltage Stabilizer will serve the purpose.

15. **Responsibility:-**

The principal as well as its agent will be severally and jointly responsible for ensuring the minimum life span of 10 years for the equipment. Both the said principal abroad and his Indian agent will have

the full responsibility for the proper functioning of the equipment/instruments within the warranty period and thereafter during the life span of the equipment

16. The bidder is required to provide list of persons (along with their permanent and correspondence address) owning more than 1% share ownership in the company/firm (both principle and Indian Agent).
17. The bidder is required to submit compliance sheet, which should reflect details of clause-by-clause compliance of technical specifications as well as general terms & conditions failing which their offer shall be rejected.
18. In order to fully and optimally utilize the equipment, training to paramedical staff and Doctors should be provided. In continuation to this training a separate maintenance training for the machine and the sub system should also be given to the Equipment Maintenance Engineer and Maintenance Technicians of the Institute. All the financial commitment in this regard shall be met by the firm/Principal.

**19. Penalties for non-performance**

The penalties to be imposed, at any stage, under this tender are;

- a. imposition of liquidated damages,
- b. forfeiture of EMD/performance security,
- c. termination of the contract,
- d. Blacklisting/debarring of the bidder.

**20. Termination of Contract**

- a. Termination for default:- The Institute, without prejudice to any other contractual rights and remedies available to it (the Institute), may, by written notice of default sent to the successful bidder, terminate the contract in whole or in part, if the successful Bidder 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 Institute.
- b. In the event of the Institute terminates the contract in whole or in part, the Institute 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 successful bidder shall be liable to the Institute for the extra expenditure, if any, incurred by the Institute for arranging such procurement.
- c. Unless otherwise instructed by the Institute, the successful bidder shall continue to perform the contract to the extent not terminated.
- d. Termination for insolvency: If the successful bidder becomes bankrupt or otherwise insolvent, the Institute reserves the right to terminate the contract at any time, by serving written notice to the successful bidder without any compensation, whatsoever, to the successful Bidder, 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 Institute.
- e. Termination for convenience: - The Institute reserves the right to terminate the contract, in whole or in part for its (Institute) convenience, by

serving written notice on the successful bidder at any time during the currency of the contract. The notice shall specify that the termination is for the convenience of the Institute. The notice shall also indicate inter alia, the extent to which the successful bidder's performance under the contract is terminated, and the date with effect from which such termination will become effective.

21. **Fall Clause:**

The prices charged for the equipment supplies under the contract by successful bidder shall in no event exceed the lowest price at which the successful bidder sells the equipment's of identical description to any other persons during the period of contract. If any time, during the contract, the bidder reduces the sales price chargeable under the contract, he shall forth with notify such reduction to the Institute and the price payable under the contract of the equipment's supplied after the date of coming into force of such reduction or sale shall stand correspondingly reduced.

22. **Applicable Law & Jurisdiction of Courts**

- a. The contract shall be governed by and interpreted in accordance with the laws of India for the time being in force.
- b. All disputes arising out of this tender will be subject to the jurisdiction of courts of law in Patna (Bihar, India).

**Director,  
IGIMS - Patna.**

**CHAPTER:**

**SCHEDULE OF THE REQUIREMENT**

<b>Group -A-Neurosurgery</b>
Endovascular Surgery items
Instruments for Neurovascular Surgery
<b>Group -B-TB &amp; Chest</b>
Bipap Machine
Portable Mobile X-ray Machine
<b>Group-C-State Cancer Institute</b>
Nerve Stimulator
Surgical Instruments
Microsurgical Instruments
Hyperthermic Intraperitoneal Chemotherapy System (HIPEC)
Binocular Loupe System
<b>Group-D-Radiation Oncology(SCI)</b>
Head rest with Head & Neck Base plate
Breast Board
Thermoplastic Sheet (Head & Neck )
Microwave Oven for thermoplastic sheet
Heat Gun
Separation meter (Calliper)
Shoulder Retractor for Head & Neck Patients
Bolus (0.5cm thickness )
<b>Group-E-NELS Skill Lab</b>
Syringe Infusion Pump
Flexible Spine Model
Cervical Spine Anatomic Model
Basic Life Support Trainer (Half Torso)
Anatomical Torso Trauma Manikin
Central IV Manikin with Internal Jugular, Subclavin and Femoral Access
AED Trainer with Simulator
<b>Group-F- Medical Oncology</b>
Vertical laminar safety cabinet (class ii type b)
Chemotherapy couch / recliners
<b>Group-G-Reproductive Biology</b>
Rate Contract for Media and Consumables

**ANNEXURES**  
**Annexure - I (a)**

**PRICE SCHEDULED FOR DOMESTIC GOODS OR GOODS OF FOREIGN ORIGIN  
LOCATED WITHIN INDIA.**

1	2	3	4	5							6
				<b>Price per unit (Rs.)</b>							
Sched uled	Brief descript ion of goods  Make: Model:	Countr y of origin	Qty. nos.	Ex- factory/ex- warehouse /ex- showroom/ off-the shelf	Excise duty( if any) % and value.	Sales tax/ vat( if any % and value.	Packi ng and forwa rding charg e	Inland transportatio n , insurance for a period including 3 months delivery, loading/ unloading and incidental cost till consignee site.	Incidental services ( including installatio n and commissi oning, supervisio n, demonstra tion and training) at the consignee site. (f)	Unit price ( at consign ee site basis(g)  a + b + c + d+ e + f	Total unit price ( At Consign ee Site) Basis Rs. 4x5(g)
				(a)	(b)	(C)	(d)	(e)	(f)		

Total quoted price in Rs. ....

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 warrantee shall be quoted separately as per price scheduled.

Place:

Name:

Date:

Business Address:-

Signature of Bidder;-

Seal of the Bidder;-

**Annexure: I (b)**

**PRICE SCHEDULED FOR GOODS TO BE IMPORTED FROM ABROAD**

1	2	3	4	5					6
				Price per unit ( CURRENCY)					
Schedule d	Brief descrip tion of goods  Make: Model:	Country of origin	Qty. nos.	FOB price at port/ Airport of lading  (a)	Carriage & Insurance ( port of loading to port of entry) and other incidental cost .  (b)	Incidental Services ( Including Installatio & Commissi oning, supervisio n, Demonstr ation And Training) at the consignee 's site. ( C )	Extended Insurance ( Local transportation and storage) from port of entry to the consignee site for a period including 3 month beyond date of delivery .  (d)	Unit Price on CIP Named port of Destination + Extended Insurance (Local Transportati on and storage)  (e_)	Total Price on CIP Named Port of Destination + Insurance ( Local Transportati on and storage)  4x5(e)

To be paid in Indian Currency (Rs) : .....

Total Tender Price in Foreign Currency:.....

In Words;-.....

**Note:-**

- a) If there is a discrepancy between the unit price and total price THE UNIT PRICE shall prevail.
2. The charges for Annual CMC after warrantee shall be quoted separately as per price scheduled.
3. The Bidder will be fully responsible for the safe arrival of the goods at the named port of entry in goods condition as per terms of CIP as per INCOTERMS, if applicable

Indian Agent;-

Indian agency commission:                      % of FOB

Name:

Signature of Bidder;-

Business address;-

Signature of Bidder

Seal of the Bidder;-

Place;-

Date

**Annexure - II**  
**COMPREHINSIVE ANNUAL MAINTENANCE CONTRACT PRICES SCHEDULE**

S. No.	Item Description	1 <sup>st</sup> Yr.	2 <sup>nd</sup> Yr.	3 <sup>rd</sup> Yr.	4 <sup>th</sup> Yr.	5 <sup>th</sup> Yr.	6 <sup>th</sup> Yr.	7 <sup>th</sup> Yr.	Total Comprehensive Annual Maintenance Contract over a period of seven years after expiry of warranty period of three years from the date of successful installation. (a + b + c + d + e + f + g + h + i)
a	b	c	d	e	f	g	h	i	j
1.	Name of the Equipment:  Make:  Model:  Qty.:								
2.	Name of the Equipment:  Make:  Model:  Qty.:								

**Scope of Contract (details as mentioned in the Clause No. – 13 of “Instruction to Bidder” & Clauses No.: 3, 4 and 5 of “Condition of Contract”):**

- a) The rate of Comprehensive Annual Maintenance Contract as mentioned above should cover the Complete System. Complete System should include the basic unit and allied supporting components like UPS, Stabilizer, Computer System, Printer, De-ionizer, Dehumidifier etc to be supplied by the bidder along with basic unit.
- b) **Preventive maintenance visit:** Four Maintenance visits at regular interval for usual maintenance & supervision failing which 25% of the contract amount per visit would be deducted as penalty.
- c) **Break down maintenance visit:** As & when required
- d) **Response Time:** within 48 Hours.
- e) Uptime Guarantee: 95% of 365 days
- f) The above-mentioned charges should includes labour charges for maintenance and breakdown visits per year, spares, accessories and all type of consumables required for the maintenance of the supplied items. If any spares / consumables /accessories etc. are not covered under above-mentioned charges; it should be clearly mentioned with frequency of replacement and with rate. The validity of rate of such items should also be mentioned clearly. What will be the rate of escalation on the quoted rate after expiry of the validity of rate of such item must be mentioned.
- g) Payment of Comprehensive Annual Maintenance Contract would be made on half yearly basis after completion of work and satisfactory working report. In no case, advance payment is to be considered.

Seal and Signature of the bidder



ANNEXURE – III

**MANUFACTURER'S AUTHORISATION FORM**

(To be submitted by authorized dealers/representatives/importers)

No.

Dated:

To

The Director  
Indira Gandhi Institute of Medical Sciences,  
Sheikhpura,  
Patna – 800 014 (Bihar, India)

Dear Sir,

Tender No :  
Equipment Name :

1. We ..... (Name of the OEM) are the original manufacturers of the above equipment having registered office at ..... (full address with telephone number/fax number & email ID and website), having factories at \_\_\_\_\_ and \_\_\_\_\_ , do hereby authorize M/s. \_\_\_\_\_ (Name and address of bidder) to submit tenders, and subsequently negotiate and sign the contract with you against the above tender no.
2. No company or firm or individual other than M/s. \_\_\_\_\_ are authorized to bid, negotiate and conclude the contract in regard to this business against this specific tender.
3. We also hereby undertake to provide full guarantee/warranty /Comprehensive Annual Maintenance Contract as agreed by the bidder in the event the bidder is changed as the dealers or the bidder fails to provide satisfactory after sales and service during such period of Comprehensive Warranty / Comprehensive Annual Maintenance Contract and to supply all the spares/ accessories / consumables etc. during the said period.
4. We also hereby declare that we have the capacity to manufacture and supply, install and commission the quantity of the equipment's tendered within the stipulated time.

(Name)

for and on behalf of M/s. \_\_\_\_\_

Date:

(Name of manufacturers)

Place:

**Note: This letter of authority should be on the letterhead of the manufacturing concern and should be signed by a person competent and having the power of attorney to bind the manufacturer.**

**ANNEXURE – IV**  
**BANK GUARANTEE FORM**

To

The Director  
Indira Gandhi Institute of Medical Sciences,  
Sheikhpura,  
Patna – 800 014 (Bihar, India)

WHEREAS \_\_\_\_\_ (Name and address of the supplier) (Hereinafter called “the supplier”) has undertaken, in pursuance of tender no \_\_\_\_\_ dated \_\_\_\_\_ (herein after called “the contract”) to supply The Director, Indira Gandhi Institute of Medical Sciences, (address) with \_\_\_\_\_ (Description of goods and supplies).

AND WHEREAS it has been stipulated by you in the said tender/bid that the supplier shall furnish you with a bank guarantee by a scheduled commercial bank recognized by you for the sum specified therein as security for compliance with its obligations in accordance with the bid scope;

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 amount 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 undertake to pay you any money so demanded notwithstanding any dispute or disputes raised by the supplier(s) in any suit or proceeding pending before any Court or tribunal relating thereto our liability under these presents being absolute and unequivocal.

We 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 no modification.

No action, event, or condition that by any applicable law should operate to discharge us from liability, hereunder shall have any effect and we hereby waive any right we may have to apply such law, so that in all respects our liability hereunder shall be irrevocable and except as stated herein, unconditional in all respects.

This guarantee will not be discharged due to the change in the constitution of the Bank or the Supplier(s).

We, \_\_\_\_\_ (indicate the name of bank) lastly undertake not to revoke this guarantee during its currency except with the previous consent, in writing, of The Director, Indira Gandhi Institute of Medical Sciences, Patna (Bihar). This Guarantee will remain in force up to (Date). Unless a claim or a demand in writing is made against the bank in terms of this guarantee on or before the expiry of (Date) all your rights in the said guarantee shall be forfeited and we shall be relieved and discharged from all the liability there under irrespective of whether the original guarantee is received by us or not.

(Signature with date of the authorized officer of the Bank) .....  
Name and designation of the officer

.....  
.....  
Seal, name & address of the Bank and address of the Branch

**ANNEXURE - V**  
**POWER OF ATTORNEY**  
**(On a Stamp Paper of relevant value)**

I/ We.....(name and address of the registered office) do here  
byconstitute,appointandauthoriseSri/Smt.....  
.....(name  
and address) who is presently employed with us and holding the position of  
..... as our attorney, to act and sign on my/our behalf to  
participate in the tender  
no.....for  
..... (Equipment name).

I/ We hereby also undertake that I/we will be responsible for all action of  
Sri/Smt..... undertaken by him/her during the tender process and  
thereafter on award of the contract. His / her signature is attested below

Dated this the \_\_\_ day of 201\_ For\_\_\_\_\_

(Name, Designation and Address)

Accepted

\_\_\_\_\_  
(Signature) (Name, Title and Address of the Attorney)

Date : \_\_\_\_\_

## **Specification & Allied Technical Details**

### **Group-A: Neurosurgery**

#### **I. Endovascular Surgery items**

1. Disposable Angio Kit
2. Disposable angiography drape set
3. Disposable surgeons gown
4. Luerlock syringe 1 ml
5. Luerlock syringe 2 ml
6. Luerlock syringe 3 ml
7. Luerlock syringe 5 ml
8. Luerlock syringe 10 ml
9. Luerlock syringe 12 ml
10. Luerlock syringe 20 ml
11. Control Syringe for Contrast injection 10 cc, 12cc, 20 cc
12. Puncture Needle For Vascular Access
13. Puncture Needle Dedicated For Radial Artery Access
14. Introducer Sheath For Adults (Size 4fr.-9fr.) (Standard Length)
15. Vascular access sheath 4Fr diameter,11 cm length
16. Vascular access sheath 4Fr diameter,45-55 cm length
17. Vascular access sheath 5Fr diameter,11 cm length
18. Vascular access sheath 5Fr diameter,45-55 cm length
19. Vascular access sheath 6Fr diameter,11 cm length
20. Vascular access sheath 6Fr diameter, 45-55 cm length
21. Vascular access sheath 6Fr diameter,90-100 cm length
22. Vascular access sheath 7Fr diameter,11 cm length
23. Vascular access sheath 7Fr diameter,45-55 cm length
24. Vascular access sheath 7Fr diameter,90-100 cm length
25. Vascular access sheath 8Fr diameter,11 cm length
26. Vascular access sheath 8Fr diameter,45-55 cm length
27. Vascular access sheath 8Fr diameter,90-100 cm length
28. Vascular access sheath 9Fr diameter,11 cm length
29. Vascular access sheath 9Fr diameter,45-55 cm length
30. Vascular access sheath 9Fr diameter,90-100 cm length
31. Vascular access sheath 10Fr diameter,11 cm length
32. Vascular access sheath 10Fr diameter,45-55 cm length
33. Vascular access sheath 10Fr diameter,90-100 cm
34. Vascular access sheath 11Fr diameter,11 cm length
35. Steerable vascular sheath 5Fr to 10Fr diameter in lengths of 55,70 and 90 cm Radial access sheath set
36. Introducer Sheath For Adults (Size 10fr.-11fr.) (Standard Length )
37. Introducer Sheath Long (For Peripheral Vascular Access)
38. Long Introducer Sheath (For Carotid Access)
39. Micro puncture Set
40. Steerable Vascular Sheath
- Guide Wires
41. J-tip angiography wire 0.035 inch diameter 135-145 cm length
42. J-tip angiography wire 0.035 inch diameter ,180 cm length
43. J-tip angiography wire 0.035 inch diameter,260-300 cm length

44. Hydrophilic measuring guide wire with radio opaque markers 0.035 inch diameter, 190 & 260 cm length
  45. Hydrophilic guide wire with torque device 0.035 inch diameter,135-145 cm length Hydrophilic guide wire with torque device 0.035 inch diameter,180 cm length
  46. Hydrophilic guide wire with torque device 0.035 inch diameter,260-300 cm length Superstiff guide wire 0.035 inch diameter,75 cm length Superstiff guide wire Superstiff guide wire 0.035 inch diameter,260 cm length
  47. Stiff hydrophilic wire 0.035 inch diameter,135-145 cm length
  48. Stiff hydrophilic wire 0.035 inch diameter,260-300 cm length
  49. Hydrophilic Angiography Guide Wire - (Regular Length, Regular Stiffness)
  50. Hydrophilic Diagnostic Guide Wire - (Exchange Length, Regular Stiffness)
  51. Hydrophilic Diagnostic Guide Wire - (Regular Length, Extra Stiff)
  52. Hydrophilic Diagnostic Guide Wire - (Exchange Length, Extra-Stiff)
  53. Ptfе Coated Extrastiff Shaft Strength Exchange Wire Backup Meier (Exchange Length)
  54. Nitinol 0.014 Inch Guidewire (Exchange Length)
  55. Heavy Duty Nitinol Extra Support Wire (Exchange Length)
  56. Steerable High Support .014 Inch Guidewire (Exchange length)
- Angiographic and guiding Catheters
57. Straight tip guide wire 0.035 inch diameter,135-145 cm length
  58. Straight tip guide wire 0.035 inch diameter,260-300 cm length
  59. Angled tip guide wire 0.035 inch diameter,135-145 cm length
  60. Angled tip guide wire 0.035 inch diameter,260-300 cm length 39 Support wire for chronic thrombotic occlusions 0.014 inch and 0.018 inch diameters
  61. Diagnostic Pigtail catheter 4Fr, 65 cm and 90-120 cm length Diagnostic Pigtail catheter 5Fr, 65 cm and 90-120 cm length
  62. Diagnostic Pigtail catheter 6Fr,65 cm and 90-120 cm
  63. Headhunter catheter 4Fr,55-65 cm and 100-120 cm
  64. Headhunter catheter 5Fr, 55-65 cm and 90-120 cm length
  65. Hydrophilic headhunter catheter 4Fr, 55-65 cm and 90-120 cm length
  66. Hydrophilic headhunter catheter 5Fr, 55-65 cm and 90-120 cm length
  67. Vertebral catheter 4Fr,55-65 cm and 100-120 cm
  68. Vertebral catheter 5Fr, 55-65 cm and 90-120 cm length
  69. Hydrophilic vertebral catheter 4Fr, 55-65 cm and 90-120 cm length
  70. Hydrophilic vertebral catheter 5Fr, 55-65 cm and 90-120 cm length
  71. C1(Cobra) catheter 4Fr, 65 cm and 90-120 cm length
  72. C1(Cobra) catheter 5Fr, 65 cm and 90-120 cm length
  73. Hydrophilic C1(Cobra) catheter 4Fr, 55-65 cm and 90-120 cm length
  74. C2(Cobra) catheter 4Fr, 55-65 cm and 90-120 cm length
  75. C2(Cobra) catheter 5Fr, 55-65 cm and 90-120 cm length
  76. Sim(Simmons) catheter curve 1 4Fr,55-65 cm and 100-120 cm
  77. Sim(Simmons) catheter curve 1 5Fr, 55-65 cm and 90-120 cm length
  78. Hydrophilic Sim 1 catheter 4Fr, 55-65 cm and 90-120 cm length
  79. Sim(Simmons) catheter curve 2 4Fr,55-65 cm and 100-120 cm
  80. Sim(Simmons) catheter curve2 5Fr, 55-65 cm and 90-120 cm length
  81. Shepherd Hook catheter 4Fr ,65 cm length
  82. Shepherd Hook catheter 5Fr , 65 cm length
  83. Van schie catheter 4Fr, 65 cm length
  84. Van schie catheter 5Fr, 65 cm
  85. Sizing catheter with pig tail configuration of tip 5fr
  86. Co axial Microcatheter set 0.020"-0.024" internal diameter,
  87. Co axial Microcatheter set 0.027"-0.029"internal diameter
  88. Hydrophilic Angiographic Catheters
  89. Angiographic Catheters For Peripheral Interventions
  90. Guiding Catheter For Peripheral Vascular Use
  91. Hydrophilic Guiding Catheter For Peripheral Vascular Use

92. 5 fr Guiding Catheter For Peripheral Vascular Use
93. Inflation device
94. Y- connector device
95. W- connector device
96. Pushable coils 0.018"system compatible, size range:1 mm and larger
97. Pushable coils 0.035"system compatible, size range: 1 mm and larger
98. Detachable coils for non neuro interventions 0.018"system compatible, size range:1mm and larger
99. Detachable coils for non neuro interventions 0.035"system compatible,size range: 1 mm and larger
100. PVA(polyvinyl alcohol) particles Size range:50 micron to 1000 micron
101. Carotid stent delivery system with distal protection device Kindly quote separate price for each size Ev3
102. Distal Embolic Protection Device, one size fits all, compatible for 3.5mm to 5.5mm diameter vessels
103. Self expandable stent with dynamic tapering with an ease of recapturing till 70% of deployment(for carotid stenting).Kindly quote separate price for each size
104. Self expandable stent with distal tapering( for carotid stenting) Kindly quote separate price for each size Ev3
105. Balloon catheters for 0.014"/0.018" system for infrapopliteal angioplasties Kindly quote separate price for each size
106. Balloon catheters for 0.035 "system for large vessel angioplasties Kindly quote separate price for each size
107. High pressure Balloon catheters for 0.035 "system with deflation time of 10- 15 seconds for large vessel angioplasties Kindly quote separate price for each size
108. Balloon catheters for carotid artery angioplasty Kindly quote separate price for each size
109. Peripheral Cutting balloons with atherotome blades for AV Fistulas & calcified/Fibrotic Lesions
110. Support Catheter to enhance lesion access & entry through CTO
111. Angiography vascular access needle 16 G size
112. Fascial dilator set 6Fr to 22Fr diameter,20 cm length
113. Uncovered self expanding stents Size range:4mm diameter and above, length 30mm to 200
114. Uncovered self expanding stents in large vessel diameter till 24 mm with an ease of recapturing till 70% of deployment.Size range:6mm diameter to 24mm and above, length 40mm to 120 mm. Price of each product to be quoted separately
115. Electronic Detachable coils for intracranial aneurysm treatment: bare Platinum
116. Special microguide wire with torque device for use with microcatheter Diameter ranging from 0.010 inch to 0.014 inch and length range from 200-300 cm
117. Guiding catheters for interventional neuroradiology Kindly quote price of each product separately
118. Detachable tip catheter for onyx delivery
119. Liquid embolization agents for AVM injection EV3(Onyx),
120. Vascular plug(disc diameter size range 4mm to 24 mm), Amplatzer 102 Peripheral vascular snare(size range: 5mm to 35 mm) for retrieval of intravascular foreign objects nitinol shaft with snare catheter, introducer & torque device
121. Neuro interventional vascular microsnares(size range:2 mm-7mm ) for retrieval of intravascular foreign objects with snare catheter, introducer & torque device
122. Retrievable IVC filter with controlled release mechanism
123. Balloon Dilation catheters for Occlusion tests for Neuro interventions & IVC/SVC
124. Luer lock injector syringe 1ml. for inflation & deflation of Occlusion Balloon System EV3,
125. Rotating Y connectors with 3-way adjustable valve 9F EV3,
126. Rotating Y connectors with 2-way adjustable valve 9F EV3,
127. Mechanical thrombectomy and reperfusion device for stroke thrombolysis Penumbra, EV3
128. Selective infusion microcatheters for intra cranial aneurysm treatment with 2 tip markers

129. Super-selective high flow directed braided micro catheter OD 2.7/1.3F usable length 165cm with Hydrophilic coating for AVM treatment. (Specify if the catheter is braided/non-braided and the specific material of the catheter hydrophilic coating used)
130. Super-selective high flow directed nonbraided micro catheter single lumen endhole OD 3.0/1.5F usable length 170cm with Hydrophilic coating for AVM treatment. (Specify if the catheter is braided/non-braided and the specific material of the catheter hydrophilic coating used)
131. Exceptional Torqueability, shapable tip, 0.021 & 0.027 id, micro catheters with High flow rate (1200 PSI), having a hupotube braiding
132. High torque, stainless steel with a radiopaque distal platinum coil tip 0.008, 200 cm hydrophilic guide wire with torque device for use with infusion catheters.
133. High torque, stainless steel with a radiopaque distal platinum coil tip 0.010 & 0.014, 200 cm hydrophilic guide wire with torque device for use with infusion catheters.
134. High torque, stainless steel with a radiopaque distal platinum coil tip 0.010 & 0.014, 200 cm hydrophilic guide wire with torque device for use with infusion catheters.
135. High torque, stainless steel with a radiopaque distal platinum coil tip 0.010 & 0.014, 300 cm (exchange length) hydrophilic guide wire with torque device for use with infusion catheters.
136. Mechanically Detachable Coils with appropriate & novel progressive coil diameter system (3D & Helix) for intracranial aneurysm embolization instant detachment facility (Please also quote Bare platinum & coated coils)
137. Straight tip/Preshaped (45 degree & 90 degree) endhole single-lumen Microcatheter for super selective catheterization with 0.017 ID 2.1/1.7F OD Nitinol braided 150 cm usable length dual radiopaque markers permitting 0.014 guide wire & DMSO Compatible
138. Straight tip/Preshaped (45 degree & 90 degree) endhole single-lumen Microcatheter for super selective catheterization with 0.017 ID 2.4/1.9F OD Nitinol braided 150 cm usable length dual radiopaque markers permitting 0.014 guide wire & DMSO Compatible
139. Straight tip endhole single-lumen Microcatheter for super selective catheterization with 0.021 ID 2.8/2.3F OD Nitinol braided 153 cm usable length permitting 0.014" guide wire.It should be DMSO Compatible
140. Shapeable distal tip single lumen Microcatheter with 0.027 ID 2.8/3.2F OD distal flexible length 10 cm compatible with Pipeline Embolization Device
141. Accessories for detaching neuro coils along with power supply, connecting cables, batteries and patient return electrodes
142. Balloon tipped guiding catheter
143. Distal access catheters for coaxial system
144. Intra-cranial stents for stent assisted coiling of aneurysms
145. Self-expandable intra-cranial stent for treatment of arteriosclerotic stenotic lesions of intracranial vessels
146. Occlusion balloon for flow modification/assistance for balloon assisted coiling of wide-neck intra cranial aneurysms
147. Flow Diverter stents for intracranial aneurysm treatment BALT, EV3
148. balloon Expandable MRI compatible stents for vertebral artery stenosis
149. Neurovascular remodeling self expandable Nitinol stent,fully deployable completely retrievable with open slit closed cell design radiopaque markers at both ends electrolytically detachment for aneurysm bridging
150. Rosch Uchida TIPS set
151. Tirofiban HCl Cadila,
152. Recombinant tissue plasminogen activator
153. Aspiration needle 16G and 18G, 10 cm and 15 cm length
154. Neff percutaneous access set
155. Chiba needle 21G and 22G diameter,15 cm length
156. Intravascular Retriever- Snare Kit ('Amplatz Gooseneck' Type)
157. Intravascular Retriever- Microsnare ('Amplatz Gooseneck' Type)
158. Support Catheter To Enhance Lesion Access & Entry Through CTO
159. Infusion Catheter 4 fr
160. Infusion Catheter 5Fr

## Microcatheters

161. Microcatheter (Hi Flow) system with Guide wire system
162. Microcatheter system with Guide wire system

## **II. Instruments for Neurovascular Surgery**

1. Yasargil Aneurysm Clip applicator(Phynox Vario) Standard 210 mm one
2. Yasargil Aneurysm Clip applicator(Phynox Vario) Mini180 mm one
3. Yasargil Aneurysm Clip applicator(Phynox Vario) Standard 180mm one
4. Yasargil Aneurysm Clip applicator(Phynox Xs) Standard 230mm one
5. Yasargil Aneurysm Clip applicator(Double Bayonetwith latch) Standard one
6. Sano Multipurpose All angle clip applicator for standard sugita clips one
7. Sano Double action All angle clip applicator for standard Sugita
8. Sugita Multipurpose vario Clip applicator one
9. Caspar Aneurysm Clip applying Forceps one
10. Jacobson Scissors straight handle straight Blade 7 ¼ “one
11. Yasargil Bayonet microdissecting Scissors ( Blunt) straight 8” One
12. Yasargil Bayonet microdissecting Scissors ( Blunt) straight 9” One
13. Yasargil Bayonet microdissecting Scissors ( Sharp) straight 9” One
14. Yasargil Bayonet microdissecting Scissors ( Sharp) upward curved 8” One
15. Yasargil Bayonet microdissecting Scissors Flat handle coss serration straight 7 ¼ “ One
16. Yasargil Bayonet micro Scissors 45 laterally angled with one probe pointed blade 8” One
17. Fujita Micro needle holder straight 180 mm one
18. Yasargil Micro Needle holder without catch 180 mm one
19. Yasargil Micro Needle holder with catch 185 mm one
20. Micro suture Tying forceps Tips 0,3 mm 150 mm 6” one
21. Brock Heifetz Micronerve and vessel hooks
22. Assortment of Aneurysm Clips/Yasargil/ Sugita /Standard /Mini
23. Sugita Titanium Aneurysm Clip straight 7 mm 5 pieces
24. Sugita Titanium Aneurysm Clip straight 9 mm 5 pieces
25. Sugita Titanium Aneurysm Clip straight 12mm 2 pieces
26. Sugita Titanium Aneurysm Clip Slightly curved 11mm 2 pieces
27. Sugita Titanium Aneurysm Clip Slightly curved 9 mm 2 pieces
28. Sugita Titanium Aneurysm Clip bent 9 mm 2 pieces
29. Sugita Titanium Aneurysm Clip side ward curved Bayonet 9mm 2 pieces
30. Sugita Titanium Aneurysm Clip ¼ Curved 11 mm 2 pieces
31. Sugita Temporary standard Aneurysm Clip straight 8mm 2 pieces
32. Sugita Temporary standard Aneurysm Clip straight 9 mm 2 pieces
33. Sugita Temporary standard Aneurysm Clip straight 8mm 2 pieces
34. Sugita Temporary standard Aneurysm Clip Slightly curved 9 mm 2 pieces
35. Sugita Temporary Mini Aneurysm Clip straight 5mm 2 pieces
36. Sugita Mini Aneurysm Clip straight 5 mm 2 pieces
37. Sugita Mini Aneurysm Clip slightly curved 5mm 2 pieces
38. Sugita Fenestrated standard Aneurysm Clip straight 10mm 2 pieces
39. Sugita Fenestrated standard Aneurysm Clip straight 12mm 2 pieces
40. Sugita Fenestrated standard Aneurysm Clip Bayonet 10mm 2 pieces
41. Sugita Fenestrated standard Aneurysm Clip Bayonet 12mm 2 pieces
42. Sugita Temporary standard Aneurysm Clip straight 8mm 2 pieces



43. Sugita Titanium Aneurysm Clip ¼ Curved 8 mm 2 pieces
44. Yasargil Aneurysm clip Titanium Standard Permanent 7mm straight 5 pieces
45. Yasargil Aneurysm clip Standard permanent 9 mm straight 5 pieces
46. Yasargil Aneurysm clip Standard permanent 11 mm straight 2 pieces
47. Yasargil Aneurysm clip Standard permanent 15mm straight 2 pieces
48. Yasargil Aneurysm clip Standard permanent slightly curved 6.5 mm 2 pieces
49. Yasargil Aneurysm clip Standard permanent slightly curved 8.3mm 2 pieces
50. Yasargil Aneurysm clip Standard permanent slightly curved 10.2 mm 2 pieces
51. Yasargil Aneurysm clip Standard permanent Bayonet 9 mm 2 pieces
52. Yasargil Aneurysm clip Standard permanent Bayonet 12 mm 2 pieces
53. Yasargil Aneurysm clip Phynox fenestrated Straight permanent 4/9.1 mm 2 pieces
54. Yasargil Aneurysm clip Phynox fenestrated Straight permanent 6/11mm 2 pieces
55. Yasargil Aneurysm clip Phynox fenestrated Straight permanent 4/10.8mm 2 pieces
56. Yasargil Aneurysm clip Phynox fenestrated Straight permanent 5/11.8mm 2 pieces
57. Yasargil Aneurysm clip Phynox fenestrated Straight permanent 6/12.7 mm 2 pieces
58. Yasargil Aneurysm clip Phynox Mini Straight permanent 3mm 2 pieces
59. Yasargil Aneurysm clip Phynox Mini Straight permanent 5mm 2 pieces
60. Yasargil Aneurysm clip Phynox Mini Straight permanent 7 mm 2 pieces
61. Yasargil Aneurysm clip Phynox Mini curved permanent 5mm 2 pieces
62. Yasargil Aneurysm clip Phynox Mini Straight permanent 3mm 2 pieces
63. yasargil Aneurysm clip Phynox Mini curved permanent 6.6mm 2 pieces
64. yasargil Aneurysm clip Phynox Mini permanent bayonet 7 mm 2 pieces
65. yasargil Aneurysm clip Phynox standard Temporary straight 9 mm 2 pieces
66. yasargil Aneurysm clip Phynox standard Temporary straight 11 pieces
67. yasargil Aneurysm clip Phynox standard Temporary curved 8.4 mm 2 pieces
68. yasargil Aneurysm clip Phynox standard Temporary curved 13.8mm 2 pieces
69. yasargil Aneurysm clip Phynox standard Temporary Mini 5mm 2 pieces
70. Yasargil Aneurysm clip Titanium Standard temporary Bayonet 13mm 2 pieces
71. Miskimons Cerebellar Retractors Two
72. Self Retaining Retractor Scalp Contour 13.5 cm Two
- 73 . Self Retaining Retractor Anderson Adson 19 cm two
74. Self Retaining Retractor Weitlaner 11 cm Two
75. Self Retaining Retractor Adson 14 cm Two
- 75 . Self Retaining Retractor Cloward with plug in blades. Two
- 76 .Yasargil Aneurysm clip Titanium Standard Fenestrated Bayonet Permanent 7mm 5 pieces
77. Caspar Rongeur Straight 3.0 mm two piece
78. Caspar Rongeur Straight 4.0 mm two piece
79. Caspar Rongeur Straight 2.0 mm two piece
80. Caspar Rongeur curved 150 degee upper part of Jaw movable 2.0mm 2 pcs
81. Caspar Rongeur curved 150 degee lower part of Jaw movable 2.0mm 2 pcs
82. Love Grunweld Rongeur straight curved 150 degee upper part of Jaw movable 2.0mm 2 pcs
82. Love Grunweld Rongeur curved 150 degee lower part of Jaw movable 2.0mm 2 pcs

## **Group-B: TB & Chest**

### **1. Technical Specification of Bipap Machine**

BiPAP A40 Specifications (1/3)

Ventilation modes CPAP, S, S/T, PC, T, AVAPS-AE

Hybrid ventilation :Adjustable AVAPS (Average Volume Assured Pressure Support)

AVAPS rate: 0.5 cmH<sub>2</sub>O/min. up to 5 cmH<sub>2</sub>O/min.

IPAP 4 – 40 cmH<sub>2</sub>O

EPAP 4 – 25 cmH<sub>2</sub>O

Target tidal volume: (when AVAPS enabled) 200 – 1500 ml

Breath rate 0 – 40 BPM (4 – 40 BPM in T mode)

Inspiratory time 0.5 – 3 sec. Triggering and cycling Digital

Auto-TRAK algorithm / Flow trigger/sensitive autotrak

Rise time 1 (100 ms) – 6 (600 ms)

Size 21.6 cm W x 19 cm L x 11.5 cm H Weight 2.1 Kgs

(with power supply) Noise level < 30 dBA at 10 cmH<sub>2</sub>O Alarms

- Patient disconnection • Apnea • Low minute ventilation
- Low tidal volume (with AVAPS only) • High respiratory rate
- Low leak Alarm (system alarm) Monitoring • Pressure
- Tidal volume • Minute Ventilation • Respiratory rate • Leak • I /E ratio • SpO<sub>2</sub> and Heart Rate
- (when oximetry module connected) Battery module
- 5 hours at IPAP 12 / EPAP 5 and 12 BPM Data management
- Internal memory (2 MB) • Compatible with oximetry module
- Advanced detection of respiratory events:
  - Apnea/Hypopnea Index (AHI)
  - Obstructed Airway Apnea (OA)
  - Clear Airway Apnea (CA) • Hypopnea (H)
  - Periodic Breathing (PB) • RERA • Large Leak (LL) • Snore (S)

### **2. Technical Specification of Portable Mobile X-ray Machine**

70-150 mA Machine with multiple flexible arms for easy manoeuvrability

Combined X Ray generator

Single focus

Bridge rectification

Should have all advanced features required for use in ICU.

Should be upgradeable to a higher version

Remote control device (control range>5m)

Appropriate cassette holder

List of important spare parts and accessories with their part number and costing

Manufacturer should be ISO and CE certified for quality standards.

Equipment should have AERB approval Certificate for radiation safety

X-ray cassette compliable with CR system of Fujifilm;

08x10 o-2

10-x12 no.2

14x17 no.2

## **Group-C: State Cancer Institute**

### **1. Nerve Simulator -02 nos.**

#### **Technical Specification**

1. The nerve stimulator should have nerve mapping facility.
2. The nerve stimulator should have Remote control for sterile one handed operation.
3. The stimulator should work on 9V alkaline battery.
4. The Power consumption should be 8mA max
5. Stimulation current: 5 mA max
6. Stimulation Voltage: 95V
7. Stimulation frequency: 1Hz/2Hz
8. Allowable load impedance: 0 kohms -12kohms
9. Stimulus duration: 1.0ms to 0.05ms range
10. Current measuring accuracy: +/-0.02 mA
11. Impedance measuring range: 1 KOhms – 90 Kohms for target stimulation current >0.5 mA
12. Weight: 250 g maximum

Free of Cost Accessories:

- 1 Nerve stimulation needles 24G; 25mm – 3 nos.
- 2 Nerve stimulation needles 22G; 50mm -3 nos.
- 3 Nerve stimulation needles, 21G; 100mm- 3nos.
- 4 Nerve stimulation needles 20G; 150mm- 3nos.
- 5 Nerve stimulation needles 18 G, 55mm; length with 40cm length catheter set- 15 nos.
- 6 Nerve stimulation needles 18 G, 110mm; length with 100cm length catheter set- 15 nos.

### **2. Surgical Instruments**

Allis tissue forceps 5x6t 7 “inch	6
Allis tissue forceps 5x6t 8” inch	6
Allis tissue forceps 5x6t 30cm	6
BABCOCK seizing forceps 6”	4
BABCOCK seizing forceps 8 “	4
BABCOCK seizing forceps 24 cm	4
DANDY hemostatic forceps, 14 cm	4
LAHEY RIGHT ANGLED FORCEPS 7½"	1
LAHEY RIGHT ANGLED FORCEPS 9"	1
LAHEY RIGHT ANGLED FORCEPS 9" Heavy	1
LANGENBECK MANNERFELDT 20x6 mm, 8.5”	2
LANGENBECK MANNERFELDT 30x8 mm, 8.5	2
LANGENBECK retr. 55x11 mm, 8.5”	2
LANGENBECK retr. 35x11 mm 8.5”	2
LANGENBECK retr. 30x14 mm	2
LANGENBECK GREEN retr. 16x6 mm,160mm	4
CONTOUR Self retaining 3x4 blunt prongs Scalp Retractor 5.5”	1
SENN GREEN retractor hand held 6.75” long	2
GRAHAM nerve hook blunt 7”	1
LANGENBECK bone holding forceps 21cm	1
DOYEN Periosteal elevator curved right 17cm	1

DOYEN Periosteal elevator curved left 17cm	1
LISTON bone cutting forceps angled 7.5 °	1
STILLE LISTON bone cutt.forcps, 11”	1
LISTON bone cutt.fcps. straight 7.5”	1
VOLKMANN bone curette STRAIGHT TIP 10 °	1
RONGEUR BONE NIBBLER STRAIGHT HEAVY 9”	1
RONGEUR BONE NIBBLER CURVED HEAVY 9”	1
LEMPERT Periosteal ELEVATOR CURVED 7¼" 6mm Blade	1
GIGLI handle for wire saws,	4
Scalpel handle #4 125mm	4
Malleable olive pointed probe	2
ROSER KOENIG mouth gag 19 cm	1
LAMBOTTE mini osteotome 8 mm, 5.25”	1
LAMBOTTE mini osteotome 10 mm, 5.25”	1
LAMBOTTE mini osteot. 15mm, 5.25”	1
LAMBOTTE mini osteot. 12mm 8”	1
LAMBOTTE mini osteot. 8” 10mm	1
LAMBOTTE mini osteot.8” 8mm	1
Dental Hammer	2
RYDER needleholder TC, 5”	1
RYDER needleholder TC, 6”	1
RYDER needleholder TC, 7”	1
RYDER needleholder TC, 8”	1
RYDER needleholder TC, 9”	1
<b>Open Surgical Instruments</b>	
1. CUSHING retractor 14 mm, 205 mm	1
2. RIBBON retractor 50x330 mm	1
3. RIBBON retractor 40x330 mm	1
4. RIBBON retractor 32x330 mm	1
5. LLOYD-DAVIS (ST.MARKS) retractor 45/60x180 mm, 33 cm	1
6. RICHARDSON retractor 28x20 mm	2
7. SENN GREEN retractor 10x 6 mm	2
8. FINOCHIETTO spreader 250/70/65	1
9. COOLEY rib spreader Alu 37 mm	2
10. BAILEY rib approximator 16 cm	1
11. GIERTZ STILLE rib shear 27 cm	1
12. DAVIDSON SCAPULA RETRACTORS Large 3" x 3½"	1
13. DAVIDSON SCAPULA RETRACTORS Small 3" x 2"	1
14. DUVAL grasping forceps 13mm/20cm	2
15. LOVELACE lung grasping fcps.20 cm	2
16. GUYON pedicle clamp, 22cm	1
17. GUYON pedicle clamp, 24cm	1
18. Lung spatula 30 cm, 137 mm	2
19. DOYEN costal periosteal adult right 17cm	1
20. DOYEN costal periosteal adult left 17cm	1
21. HOESEL retractor 140x40 mm	2
22. STILLE LUER rongeur 225mm, cvd.	1
23. CLEVELAND rongeur 17 cm	1
24. PEAN hemostatic forceps Atrau., 20cm	1
25. DE BAKEY PEAN clamp curved, 26 cm	1
26. DIETH.-HEGEMANN scissors 90°, 180mm	1
27. TOENNIS ADSON dissecting scissors 17.5cm delicate model	1
28. POTTS SMITH vasc.scissors 40*, 19cm	1

29.	POTTS SMITH vasc.scissors 45°, 185 mm	1
30.	ADSON hemostatic forceps curved, 18cm	8
31.	ROBERTS hemostatic forceps, 22cm	8
32.	BERGMANN FOERSTER sponge forceps small, 24cm	2
33.	KOCHER DELICATE hemostat.forceps curved 280mm	4
34.	KOCHER DELICATE hemostat.forceps straight 280mm	4
35.	Kocher Retractor 23 cm 57 x 25 mm	2
36.	Kocher Retractor 23 cm 78 x 40 mm	2
37.	MORRIS abdominal retractor 70x40mm 24.5 cm 9 3/4inch	2
38.	MORRIS abdominal retractor 70x50mm 24.5 cm 9 3/4inch	2
39.	MORRIS abdominal retractor 70x65mm 24.5 cm 9 3/4inch	2
40.	BALFOUR Retractors 2½" Fenestrated Side Blades 7" Spread 2¼" x 3½" Center Blade	1
41.	BALFOUR Retractors 2½" Fenestrated Side Blades 10" Spread 2¼" x 3½" Center Blade	1
42.	DEAVER Retractors Without Handle ¾" x 7"	1
43.	DEAVER Retractors Without Handle 7/8" x 8½"	1
44.	DEAVER Retractors Without Handle 1" x 14"	1
45.	DEAVER Retractors Without Handle 1½" x 12"	1
46.	DEAVER Retractors Without Handle 1" x 9"	1
47.	DEAVER Retractors Without Handle 3" x 12"	1
48.	DEAVER Retractors Without Handle 1" x 12"	1
49.	DEAVER Retractors Without Handle 1" x 13"	1
50.	DEAVER Retractors Without Handle PEDIATRIC 5/8" x 8"	1
51.	DEAVER Retractors Without Handle PEDIATRIC 1" x 8"	1
52.	CZERNY Retractor 17.5 cm 38x32mm	4
53.	GIL VERNET Saddle Hooks, 11mm, 24cm flexible shaft	1
54.	GIL VERNET Saddle Hooks, 15mm, 24cm flexible shaft	1
55.	GIL VERNET Saddle Hooks, 17mm, 24cm flexible shaft	1
56.	GIL VERNET Saddle Hooks, 20mm, 24cm flexible shaft	1
57.	ROSE trachea hook double end, 13cm	2
58.	SCHUMACHER biopsy forceps	1
59.	YEOMAN rect.biops.fcp. 40cm	1
60.	TROUSSEAU tracheal dilator, 14.5cm	1
61.	OLLIER retractor 3 pr.36x30 mm	2
62.	OLLIER retractor 4 pr.36x60 mm	2
63.	DENHART mouth gag 12 cm	1
64.	DOYEN Mouth Gag	2
65.	KILNER DOUGHTY mouth	1
66.	FERGUSON Mouth Gag	1
67.	TOBOLD tongue depressor 14,5cm	2
68.	Cheek retractor Simplex 11 cm	1
69.	YOUNG tongue hold. fcps. 16 cm	1
70.	Orbital rim retractor	1
71.	HARGIS mandibular body retr.	1
72.	HARGIS PterigoidOsteostome 22 cm	1
73.	GILLIES Zygoma elevators, 20cm	1
74.	Approximator BIEMER-MÜLLER, 9.0 mm jaw	2
75.	DE BAKEY needleholder TC, 180 mm	1
76.	DE BAKEY needleholder TC, 230 mm	1
77.	DE BAKEY needleholder TC, 300 mm	2
78.	DE BAKEY needleholder TC, 200 mm	1
79.	Wire twisting forceps 15cm, TC	1

80.	Wire cutting pliers 13 cm	1
81.	LEBSCHKE sternum chisel 24,5 cm	1
82.	GUTHRIE double hooklet large	6
83.	DOYEN intestestinalforceps cvd 21cm	2
84.	MAYO ROBSON intestinal forceps cvd 25cm	2
85.	FEHLAND intestestinal forceps 23.5cm	2
86.	Retractor saddle fenestrated	2

### 3. Microsurgery Instruments

#### Technical Specification of Microsurgery Instruments

1. Microsurgical instruments specially designed in consideration with the depth of the operating field, for free tissue transfer/ nerve repair.
2. The instruments should be balance in design to put the centre of gravity between webspace & index finger.
3. Instruments should be curved to facilitate needle driving
4. The micro scissors should be specially designed for minimum closing pressure and for equal pressure distribution along the blades
5. Handles should be round with spring instrument configuration & with curved blades. They should be rounded at the tips with radius of 0.2 mm & adventitia scissors should have very sharp tips that are pointed for fine trimming & suture cutting. The suprafine needle holders scissors & forceps should have a tip dia of 0.2 mm, for very fine vessels in children & neonates
6. All instruments should have special ergonomic design & have well-made tips for high durability.
7. The vessel dilator should have special ball point form of the tips so that the dilating pressure is evenly distributed over the entire area of the vessel
8. Needle holder should be specially designed for secure grip due to parallel closure over the entire jaw length and closing pressure precisely calibrated for minimising fatigue. They should have stronger tips to withstand higher pressure tip dia 0.3 mm or 0.4 mm.
9. Micro clamps should be light, compact robust corrosion resistant & have unique gripping surface. They should have smooth sliding bar action on all approximator clamps for vessel diameter of 0.4 mm to 5.00 mm, pressure of 5 gm/mm<sup>2</sup> to 15 gm/mm<sup>2</sup>.
10. Should have complete set as listed below:-

#### **Microvascular Surgery Instruments**

- Microforceps flat straight 11 cm, 9mm width 0.3 mm tip classic line
- Microforceps flat straight 12 cm long, 9 mm width, 0.3 mm tip classic line
- Microforceps flat straight with plateau 7 mm width 0.3 mm tip classic line
- Microforceps flat straight 13.5 cm long, 7 mm wide, 0.3 mm tip
- Microforceps flat curved 13.5 cm, 9 mm wide, 0.3 mm tip
- Microforceps flat handle straight 15 cm, 9 mm wide, 0.3 mm tip
- Microforceps flat curved 15 cm, 9 mm wide, 0.4 mm tip dia
- Microforceps flat handle with plateau, 13.5 cm, 9 mm wide, 0.3 mm tip
- Microforceps flat roundle handle 18 cm, 8 mm wide, 0.5 mm tip dia
- Microforceps flat round handle curved forceps 18 cm, 8 mm wide, 0.5 mm tip

#### **Vessel Dilators**

- Vessel dilator flat straight 11 cm long 9 mm wide 0.3 mm tip
- Vessel dilator flat handle straight 13.5 cm long 7 mm wide 0.2 mm tip
- Vessel dilator flat curved 13.5 cm, 9 mm wide 0.2 mm tip
- Vessel dilator round 15 cm, 8 mm wide 0.3 mm tip

#### **Needle Holders**

- Micro needle holder flat handle straight 14 cm 8 mm wide 0.4 mm tip

Micro needle holder curved flat handle 14 cm 8 mm wide 0.4 mm tip  
 Micro needle holder round handle straight 15 cm 8 mm wide 0.4 mm tip  
 Micro needle round handle curved 15 cm 8 mm wide 0.4 mm tip  
 Micro needle holder round handle straight 18 cm 8 mm wide 0.4 mm tip  
 Micro needle holder straight 18 cm 10 mm wide 0.5 mm tip  
 Approximator micro clamp  
 Strength 10-14 gm, pressur approximator  
 Approximator micro clamp strength 17-23 gm pressure  
 Approximator micro clamp strength 35-44 gm pressure  
 Approximator micro clamp strength 35-44 gm  
 Approximator clamp strength 60-75 gm HD-D  
 Single Micro Clamp  
 Closing pressure 10-14 gm for Artery  
 Single micro clamp closing pressure 10-14 gm for vein  
 Micro single clamp closing pressure 17-23 gm for artery  
 Micro single clamp closing pressure 17-23 gm for vein  
 Micro single clamp closing pressure 35-44 gm for artery  
 Micro single clamp closing pressure 35-44 gm for vein  
 Micro clamp single closing pressure 60-75 gm  
 Micro Scissors  
 Micro scissors round handle 12 cm, 7 mm wide 11 mm blade length  
 Micro scissors round handle 15 cm, 8 mm wide 12 mm blade length  
 Micro scissors round handle 15 cm, 8 mm wide 12 mm blade length  
 Micro scissors round handle 15 cm, 8 mm wide 19 mm blade length  
 Micro scissors flat handle, cross serrated st 15 cm, 8 mm wide 19 mm blade length  
 Micro scissors flat handle curved 15 cm, cross serrated 9 mm width blade 19 mm blade length  
 Micro scissors round handle straight 18cm, 9 mm wide & 14 mm blade  
 Micro scissor flat handle curved 18 cm, 8 mm width 20 mm blade length

**Instruments Rack**

Instrument rack for 8 instrument 9-15 cm with clamp box  
 Instrument case for 8 instruments  
 Clamp applying forceps 13 cm, 8 mm width  
 Abrasive stone Triangular

**Note: The above instruments should be very high quality, light weight, rust proof stainless steel, matt finish, handling qualities and also having inscriptions on the instruments indicating manufacturer & catalogue number. Also provide details of users (Government hospitals/ corporate hospitals) with satisfactory performance report from users. International quality USFDA or European CE supported by documentary certificates & should have guarantee for 5 years.**

**Note:- The bidder must quote all the items/ instruments otherwise bid will be treated as unresponsive and will be rejected. After due evaluation of the bid(s) Institute will award the contract to the lowest evaluated responsive tendered on composite basis.**

**4. HYPERTHERMIC INTRA-PERITONEAL CHEMOTHERAPY SYSTEM – 1 No**

**TECHNICAL SPECIFICATIONS**

The equipment should be dedicated to perform hyperthermic perfusion of sterile solutions in situations like open and/or closed method of intraoperative Hyperthermic Intraperitoneal Chemotherapy (HIPEC) and hyperthermic intra thoracic chemotherapy (HITOC). It should also be possible to use the equipment for performing isolated limb perfusion (ILP).

**It should have the following features:**

- a. The equipment must have a water bath/ heat exchanger system to heat sterile solutions like

peritoneal dialysis fluid, 5% dextrose etc. to an operational temperature range of 36°C to 47°C, in 0.1°C increments. It should have a capacity for prewarming the fluid and be able to rapidly achieve the desired intra-abdominal temperature. The system must have automatic shut-off of the heater if the temperature exceeds specified limits.

b. The equipment should have minimum one roller type pump for infusion.

c. The equipment pump should have a perfusion solution flow rate that is adjustable from 100 to 2200 ml/minute.

d. The equipment should have a user friendly interactive touch Screen display monitor for viewing and/or easily controlling all operational parameters like the heat exchanger temperature, intra-abdominal temperatures, flow rates, timer and preferably circulating volume and pressure. It should prompt the user from initial set-up through the entire operation.

e. The equipment must have provisions to connect upto 4 temperature probes to measure inflow and outflow temperature and also intra-abdominal temperature at various locations. The probe connectors should be preferably colour coded or numbered/labelled.

f. The equipment must have the facility to adjust the volume of circulating fluid during the treatment (increasing or decreasing the volume). The entire set-up process should be in a simple and easy manner such that the theatre technicians will be able to perform it themselves.

g. The equipment should have safety system to monitor parameters like temperature and pressure and give visual & audio alarms in case of a potential risk.

h. The procedure time with the machine should be as per international norms in order to avoid damage to the viscera.

There should be provisions for easily connecting OEM's disposable pre-assembled circuit/HIPEC kits. Vendor must supply 50 nos. (fifty) single use disposable HIPEC sets/kits along with the main equipment. Each kit should contain a soft reservoir of 5-7 litres capacity, at least 1 inflow tubes (preferably two) and at least 2 outflow tubes, high-flow heat exchanger, at least four temperature probes (1 each for monitoring inflow and outflow temperature and two for monitoring intra-peritoneal temperature), pressure sensor and filters to filter cell fragments.

j. The price of disposable kits should be quoted separately

k. The equipment should be European CE and US FDA certified and must comply with universal safety regulations and directives and international manufacturing standards.

l. The equipment should have facility to store and transfer treatment details of HIPEC from the machine via a USB port or its equivalent.

m. The equipment should be sturdy but portable & Mobile.

n. Should be able to run on 220V/240V, 50 Hz and the electrical connections must suit Indian conditions or the necessary adapters must be provided.

o. An U.P.S. of adequate configuration for power back-up of the machine must be provided.

p. The cost of comprehensive maintenance contract should be quoted separately.

q. The vendor should have installed at least 3 machines in India in the past 3 years and the OEM should have at least 100 installations worldwide. Proof of the same must be provided.

r. Preference may be given to equipments of OEM who show a long-term commitment to manufacture the disposable HIPEC kits in India.

s. Suppliers must confirm clearly that:

1) All required spare parts will be available for a period of at least 10 years

2) Extensive hands-on training will be provided to the O.T. staff for operation and cleaning of the system.

3) There must be at least a 3 year usable period before expiry of consumables, disposable and nondisposable items.

4) Service and logistic support must be available in Chennai and provided as and when required within 24 hours.

5) A stand by equipment will be provided in case of non-functioning of the purchased machine till such time the defect is rectified.

Final approval of technical bid will be done only after the proper demonstration of quoted product



## **5. Binocular Loupes with LED Loupe Light**

### **Technical Specification**

1. High Resolution 2.5X Binocular loupes which give bright, colour corrected crisp image with super wide at least 130mm view and super deep view at least 180mm.
2. The working distance should be 340 -420mm with individual adjustment (Left & right side optics) of Inter Pupillary adjustment.
3. Optics should be super light with weight not more than 42 grams and mounted on spectacle which is light In weight approx 25gramswith ear temples mouldable to take any shape of head.
4. The Loupes should have option of customisation also and LED light should also be fitted along with loupeslight intensity of 50,000 lux at 30cm distance along with 6V Li ion rechargeable battery
5. Battery life lasting for 17 hrs when fully charged and also shows charge level indicator supplied in a case which can be attached to belt
6. Equipment should be U\$FDA or European CE approved / certified.

## **Group-D: Radiation Oncology (SCI)**

1.	Head rest with Head & Neck Base plate	02 Sets	<ol style="list-style-type: none"> <li>1. Low absorption through the material (Carbon fibre) and a very stable position of the patients.</li> <li>2. All head rest have different elevation contours to suit treatments requirements and are marked from A to F for easy identification.</li> <li>3. Head &amp; Neck Base plate indexable to any table top of Telegamma unit and Medical Linear accelerator.</li> </ol>
2.	Breast Board	02	<ol style="list-style-type: none"> <li>1. Breast Board is made of strong, light weight, Low absorption through the material (Carbon fibre) and a very stable position of the patients.</li> <li>2. Breast Board indexable to any table top of Telegamma unit and Medical Linear accelerator.</li> </ol>
3.	Thermoplastic Sheet (Head & Neck )	50 Pc.	<ol style="list-style-type: none"> <li>1. Thermoplastic masks (Head &amp; Neck ) can be provide positioning and immobilization from imaging through treatment</li> <li>2. It can be reusable up to seven times.</li> </ol>
4.	Microwave Oven for thermoplastic sheet	01	<ol style="list-style-type: none"> <li>1. Digitally controlled (LED) Microwave Oven can accommodate largest thermoplastic sheets up to hip pelvic of any brand.</li> <li>2. Microprocessor controlled temperature setting drainage valve, stainless steel construction are standard features.</li> <li>3. Optimum Temp. Range – 70 Degree Celsius.</li> </ol>
5.	Heat Gun	01	It can correct minor mistakes or modifications while making thermoplastic mould.
6.	Separation meter (Calliper)	04	For Central axis and off axis measurements. The reversing calliper orientation assists in determining separations such as laterals, oblique and off table measurements. Wide base ensures perpendicularity to table top. Straight scale

			with 55,45 & 24 Cm length.
7.	Shoulder Retractor for Head & Neck Patients	02	Shoulder Retractor for Head & Neck Patients made by flexible fibre with high flexibility.
8.	Bolus (0.5cm thickness )	02	<ol style="list-style-type: none"> <li>1. For enhancement dose build-up to skin.</li> <li>2. Conforms well to patient's contour.</li> <li>3. Maintains uniformity of thickness.</li> <li>4. Will not dry out.</li> <li>5. Reusable can be washed with water.</li> <li>6. Size in square of 30 x 30 with 0.5 thickness.</li> </ol>

## **Group-E: NELS Skill Lab**

### **1. Syringe Infusion Pump- 1 Nos.**

#### **Technical Specifications of Syringe Infusion Pump-**

##### **1. Description of Function-**

1.1 The Syringe Infusion Pump provides uniform flow of fluid by Precisely driving the plunger of a syringe down its barrel. It provides accurate and continuous flow rate for precise delivery of I.V. medication in critical medical care.

##### **2. Operational Requirements-**

2.1 The syringe pump should be programmable, user friendly, safe to use and should have battery backup and comprehensive alarm system.

2.2 Demonstration of the equipment is a must.

##### **3. Technical Specifications-**

3.1 Flow rate programmable from 0.1 to at least 999 ml/hr or more in steps of 0.1 ml/hr with user selectable flow set rate option.

3.2 Bolus rate should be programmable from 0.1 to at least 999 ml/hr or more with infused volume display.

Reminder audio after every 0.5 ml delivered bolus.

3.3 Display of Drug Name with a provision of memorizing 10~15 names by the operator with drug calculations

3.4 Keep Vein Open (KVO) must be available 1.0 ml/hr or set rate if lower than 1.0 ml. User should have choice to disable KVO whenever desired.

3.5 Occlusion pressure trigger three levels

3.6 Should be European CE/USFDA APPROVED/CERTIFIED

3.7 Should work with standard disposable syringes of 10, 20, 50/60 ml sizes of different makes.

3.8 Automatic detection of syringe size & proper fixing. Must provide alarm for wrong loading of syringe such as flanges out of slot; disengaged plunger, unsecured barrel etc.

3.9 Anti bolus system to reduce pressure on sudden release of occlusion

3.10 Should have comprehensive alarm package including: Occlusion limit exceed alarm, Near end of infusion pre-alarm & alarm, Volume limit pre-alarm & alarm, KVO rate flow, Low battery pre alarm and alarm, AC power failure, Drive disengaged.

3.10 Power input to be 220-240 VAC, 50 Hz. Rechargeable Battery having at least 4~6 hour backup for about 5ml/hr flow rate with 50ml syringes. Larger battery life and indication of residual life will be preferred.

##### **4. System should include-**

4.1 Syringe Infusion Pump – 01

##### **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 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 degree Celsius to 50 degree Celsius and relative humidity of 15-90%

5.4 Demonstration is a must.

##### **5.5 ESSENTIAL TO SEPARATELY MENTION THE PRICE OF EACH CONSUMABLE**

5.6 Should be USFDA/ European CE approved

5.7 Warranty of 3 years followed by CAMC of 7 years.

- 5.8 Electrical safety norms: should be compatible with Indian electricity supply.
- 5.9 Rate of accessories to be quoted separately.

## **2. Flexible Spine Model- 1 Nos.**

### **Technical Specifications of Flexible Spine Model-**

1. Size: complete Spine model, standing Height 74.00cm approx.
2. Fully flexible mounting throughout spine. Flexibly mounted for effective demonstration on a stand
3. Full pelvis and occipital plate
4. Spinal nerve exits
5. Cervical vertebral artery
6. Durable and of good quality
7. Demonstration is must
8. Warranty of 2 years followed by CAMC of 5 years.

## **3. Cervical Spine Anatomic Model- 1 Nos.**

### **Technical Specifications of Cervical Spine Anatomic Model-**

1. This Model features a detailed occipital cervical vertebral column, which is mounted on a sturdy white base.
2. Model weighs .55 lbs. Model measures 6” H X 3” W X 4” L (without stand).
3. Model measures 8” H X 4” W X 5” L (including stand).
4. Warranty of 2 years followed by CAMC of 5 years.

## **4. Basic Life Support Trainer (Half Torso)- 4 Nos.**

### **Technical Specifications of Basic Life Support Trainer (Half Torso)**

1. It should have all anatomical landmarks relevant to adult CPR.
2. Should be able to perform mouth to mouth with option of nose pinching, mouth to mask and bag mask ventilation.
3. Chest rise should be with correct ventilations.
4. Should be able to mimic airway obstruction which can be relieved by HT-CL and jaw thrust.
5. It should have realistic chest compression resistance .
6. It should be capable of generating bilateral carotid pulse.
7. There should be feedback about adequate chest compressions.
8. Demonstration of quoted model is a must.
9. Warranty for 2 years and 5 years CAMC
10. Accessories: 5 - Face, 5 - Lungs, 5 - Airway, 10 – bottles Cleaning Spray
11. Rate and list of accessories to be quoted separately
12. Should be USFDA/ European CE approved
13. The unit shall be capable of operating continuously in ambient temperature of 10 -50 deg C and relative humidity of 15-90%.
14. After sales service should be available locally.

## **5. Anatomical Torso Trauma Manikin-2 Nos.**

### **Technical Specifications of Anatomical Torso Trauma Manikin-**

It should allow needle and surgical cricothyroidotomy, needle decompression of chest, thoracic tube drainage and pericardiocentesis.

A. Cricothyroidotomy

1. Puncture site should include airway, cricoid cartilage and thyroid cartilage
2. The cricothyroid membrane should allow surgical cricothyroidotomy

**B. Needle decompress of chest and thoracic tube drainage**

1. There should be facility to create tension pneumothorax of the right or left of the chest.
2. Distension of jugular vein should be simulated in conjunction with tension pneumothorax.
3. Landmarks like Sternal angle and second intercostal space should be identifiable for needle chest decompression.
4. On needle puncture in simulated tension pneumothorax, air should flow out when syringe is attached with puncture needle, air pressure should lift the plunger.
5. Skin should be made of good quality silicone material
6. Insertion of chest tube should be possible
7. 5th and sixth intercostals spaces should be present for use as landmark for insertion of chest tube on both left and right side.

**C. Pericardiocentesis**

2. Landmarks like Xiphisternum and costal arch should be identifiable to enable pericardial puncture.
2. Should be able to draw simulated blood after puncture with correct angle and depth.

**D. Demonstration is a must.**

1. The price and list of accessories to be quoted separately.
2. Should be European CE approved/ USFDA approved.
3. Electrical safety norms: should be compatible with Indian electricity supply.
4. Warranty of 2 years followed by CAMC for 5 years.
5. The unit shall be capable of operating continuously in ambient temperature of 10 -50 deg C and relative humidity of 15-90%.
6. Shall meet IEC-60601-1-2:2001 (or equivalent BIS) general requirements of safety for electromagnetic compatibility.
7. Demonstration of equipment is must.
8. After sales service should be available locally

**6. Central IV Manikin with Internal Jugular, Subclavin and Femoral Access- 2 Nos.**

**Technical Specification of Central IV Manikin with Internal Jugular, Subclavian and Femoral access-**

1. It should enable the practice of IV access to the: Internal jugular vein, Subclavian vein and Femoral vein.
2. There should be palpable arterial pulsation.
3. Long catheters may be placed into the training model.
4. Realistic tissue simulation should be provided.
5. Both Neck Pad and Femoral Pad are to be replaceable without use of any tools.
6. The simulated veins inside the pads are to provide a natural resistance during puncture and a natural flashback of blood.
7. Both veins and skin are to self-seal so that the site of puncture is not visible to the next student.
8. A carry case for easy transportation and storage is to be included.
9. Four neck pads and four femoral pads to be provided with each manikin.
10. List of all consumables required for full functioning of the trainer along with their costs are to be provided.
11. Warranty of 2 years followed by CAMC for 5 years.
12. The unit shall be capable of operating continuously in ambient temperature of 10 -50 deg C and relative humidity of 15-90%.
13. Shall meet IEC-60601-1-2:2001 (or equivalent BIS) general requirements of safety for electromagnetic compatibility.
14. Electrical safety norms: should be compatible with Indian electricity supply.
15. Demonstration of equipment is must.
16. After sales service should be available locally.

## **7. AED Trainer with Simulator-4 Nos.**

### **Technical Specifications of AED Trainer with Simulator -**

1. Manikin should be with realistic anatomical landmarks and lightweight adult CPR/AED trainer with all the essential features for adult CPR/AED learning.
2. Realistic feel when performing chest compressions with Vertical movement in the manikin's chest.
3. It should give feedback on chest compressions
4. Should allow for ventilation with mouth to mouth with facility of nose pinching, mouth to mask and pocket mask.
5. Natural obstruction of the airway should allows students to learn the important technique of opening the airway.
6. Head tilt/chin lift and jaw thrust allow students to correctly practice all maneuvers necessary when resuscitating a real victim.
7. Realistic airway functions- that the airway remains obstructed without proper head tilt/chin lift or jaw thrust.
8. Chest rise should be seen with correct ventilations
9. It should give feedback on correct placement of electrodes
10. Anatomically correct landmarks and sternal notch should allow the student to practice identification of all anatomical landmarks relevant to adult CPR.
11. Consumables: 6 sets of pads each for adult and pediatric to be provided with the equipment.
12. Demonstration is a must
13. The list and price for the consumables to be quoted separately and price to remain fixed for 3 years.
14. Should be USFDA/ European CE approved
15. Warranty of 2 years followed by CAMC of 5 years.
16. Electrical safety norms: should be compatible with Indian electricity supply.
17. Rate of accessories to be quoted separately.
18. Shall meet IEC – 60601 – 1 -2: 2001 (or equivalent BIS) general requirements of safety for electromagnetic compatibility.
19. The unit shall be capable of operating continuously in ambient temperature of 10 degree Celsius to 50 degree Celsius and relative humidity of 15% to 90%.
20. After sales service should be available locally.

## **Group-F: Medical Oncology**

### **1. Vertical Laminar Safety Cabinet (Class II Type B) – No. 4**

#### **Technical Specification**

- Direction of Flow : Vertical
- Working Size: W1800 x D 600 x H 600 mm
- Overall size: W 1900 x D750 x H 2050 mm
- System should have one HEPA filter with 99.999% efficiency for particles > 0.3 µm.
- HEPA filter should have H14 according EN 1822
- Exhaust HEPA Filter for 100 % exhaust of air from workspace
- Exhaust module of suitable capacity to discharge HEPA filtered air into the atmosphere
- Exhaust module shall be connected to the bio safety cabinet through PVC pipe duct
- System should have a prefilter for > 0.5 µm with 85% efficiency
- Pre filter should have G4 Class according to EN779
- System should have illumination level > 800 lux
- Noise level should be < 55 dBA

- Working chamber should be made from AISI 304 stainless steel
- External and internal structure should be made from 2.00 mm electrostatically painted steel
- System should have Hour Counter up to 100.00 Hours
- System should have 0.4 m/sec. Flow velocity flow should be vertical
- System should have 2100 metre cube / hour capacity, high quantity blower with double suction.
- System should have 2 pieces covered and fuse protected

## 2. Chemotherapy Couch / Recliners

- Blood Donor Couch is a completely automatic enveloping, variable till Chair and specially designed to make blood withdrawals easier, safe and functional, and also for other diagonally and therapeutic areas.
- Variable positioning for either arm will comfortably wide arm-rests with swinging out as well as up and down moving facility
- Reclining and upright body positions with a smooth shifting to any position.
- Both sides should have supporting brackets for material required for blood collection
- Ergonomically designed comfortable chair type for donor comfort mattress should be comfortably cushioned with elegantly thick washable upholstery
- Seat, back rest and leg rest size designed for donor comfort. It should have step less electric remote controlled height adjustment
- Easily tilted to head low position, electrically operated
- Should be mobile with lockable wheels
- Comfortable working level for the operator. Lifting capacity – approx 200 kg
- Certifications:
  - Product certification: CE Class II A or USFDA certified
  - Quality Certification : ISO Certified
  - Electrical Safety: Equipment meets electrical safety specifications such as that of IEC (Class - I)

## Group-G: Reproductive Biology

### 1. Rate Contract for MEDIA AND CONSUMABLES OF IVF LAB for two years

Sl. No.	NOMENCLATURE
1.	Follicle Flush Buffer Media. Washing media having both optimal and a stable pH environment for flushing ovarian follicles during oocytes collection, suitable for flushing needles. Specially having HEPES-buffer. Medium is ready to use and must be supplemented with protein. Store at 2-8 °C. Protect from light.
2.	Fertilization Media. Media used for fertilization and for culture until 2-8 cell stage and for embryo transfer. Uses a bicarbonate buffered medium for both short and long insemination. Provides a glucose rich environment for efficient cumulus oocyte complex and sperm cell metabolism. Provides an optimized environment for gamete fusion. Antibiotic. Medium is ready to use. Store at 2-8 °C. Protect from light.
3.	Cleavage Media

	A bicarbonate buffered media for the specific development of zygotes to 8-cell embryos. Recommended for ICSI procedure to reduce oocytes stress as cumulus cell metabolism and sperm cell movement are not longer critical. Low in glucose and high in pyruvate to optimize early cleavage stage development. Endotoxin tested less then 0.1 EU/ml. Medium having sodium pyruvate, hyaluronate, amino acids, vitamins for day 2-3 embryo culture & Antibiotics. Medium is ready to use and must contain Hyaluronidase. Store at 2-8 °C. Protect from light.
4.	<b>Blastocyst Culture Media.</b> A bicarbonate-buffered media with an increased glucose concentration to maximize blastocyst metabolism and energy production. Includes essential and non-essential amino acids for improved blastocyst development. Ideal for use in low oxygen environment that replicates the human reproductive tract. Antibiotics. Medium is ready to use and must contain Hyaluronidase. Store at 2-8 °C. Protect from light.
6.	<b>Embryo Vitrification Pack.</b> Sterility tested & DMSO based/DMSO Free media. Mouse Embryo Assay tested. Medium is ready to use. Store at 2-8 °C. Protect from light.
7.	<b>Embryo Vitrification Thaw Pack.</b> Sterility tested. Mouse Embryo Assay tested. Contains Sucrose, Sodium lactate, Sodium Bicarbonate. Antibiotics. Medium is ready to use. Store at 2-8 °C. Protect from light.

### 1. Andrology Media

Sl. No.	NOMENCLATURE
1.	<b>Sperm Preparation Media.</b> Supplemented with: Human Serum Albumin. Sodium pyruvate. A Bicarbonate based buffer for sperm preparation and storage. HEPSES Buffer. Contain Antibiotics. Medium is ready to use. Store at 2-8°C. Protect from light. Media should be in alkaline Ph(8-8.5) for better results
2	<b>Density Gradient Media.</b> Designed specifically for sperm preparation and isolation of viable spermatozoa using density gradient separation. Each packaged in a kit with one vial of each 40% and 80% densities. Antibiotics. Medium is ready to use. Store at 2-8°C. Protect from light. Media should be in alkaline Ph(8-8.5) for better results
3	<b>Sperm Freezing Medium</b> Sterility tested. Mouse Embryo Assay tested. Sperm survival tested. pH 7.3-7.5. A HEPES buffered cryopreservation medium with glycerol as the cryoprotectant used for freezing washed sperm, MESA and TESA samples. Antibiotics. Medium is ready to use. Store at 2-8°C. Protect from light.

### 2. Micro technique Media

Sl. No	NOMENCLATURE
1.	<b>Culture Oil</b> Ensures a high-quality culture system with extensive washing and testing during manufacture. Reduces osmotic stress caused by evaporation. Helps maintain pH stability and used as an oil overlay for culture media during IVF and ICSI procedures. Sterility tested. Medium is ready to use. Store at 2-8 °C. Protect from light.
2	<b>PVP Medium</b> This solution used to reduce the motility of sperm making it easier to catch them with an ICSI pipette with bicarbonate buffered medium containing 7% polyvinyl pyrrolidone. Sperm survival tested. Sperm immobilization tested. Antibiotics. Medium is ready to use. Store at 2-8°C. Protect from light.
3.	<b>Natural Alternate to PVP Media (SpermSlow Media)</b>
4.	<b>Hyaluronidase</b> One step immobilization and selection of mature sperm for ICSI. A semi viscous medium containing

	Hyaluronan for slowing down the movement and for the selection of an individual sperm with enhanced genetic and developmental integrity. Medium is ready to use. Store at 2-8°C. Protect from light.
5.	Alternate to Hyaluronidase – (Human Hyaluronidase for Human Oocytes) – ICSI Cumulase Media

### 3. Other Important and Special IVF Media

Sl. No	NOMENCLATURE
1	Theophylline Media for Activation of Immotile Sperm and Ensuring Sperm Viability. Media use for activation of immotile sperm or poor motile sperm from ejaculates, testicular biopsies or Freezed sperm. Activation start after a few minutes and last for one hour. Maintain a stable environment during. Washing testicular tissue. Antibiotics Medium is ready to use. Store at 2-8 C .Protect from light.
2	In Vitro Maturation Media. Media use for maturation of oocytes. Maintain a stable environment during culture of oocytes. Antibiotics Medium is ready to use. Store at 2-8°C. Protect from light.
3	PGD. Culture Media. Combination of Ca <sup>++</sup> & Mg <sup>++</sup> free MOPS buffered media. MEA Tested & maintains pH, Antibiotics. Store at 2-8°C. Protect from light.
4	Human Serum Albumin (HSA) media. Human Serum Albumin contains amino acid residues derived from the prototypical human serum albumin sequence. Suitable for use in biochemical, culture media. Medium is ready to use.
5	Single Step Media A single step media for uninterrupted embryo culture up-to blastocyst stage. Sterility Tested, Mouse Embryo Assay Tested, Contain Antibiotics, Medium Ready to use, Store at 2-8°C.
6	Transfer Media Based on buffered with HEPES, Transfer media having hyaluronate Endotoxin level <0.1 EU/ML, Antibiotics, Storage : 2-8°C
7	Acidified Tyrodes Solution Media use for blastomere biopsy of cleavage embryos, Maintain a stable environment during procedure, Sterility tested, Mouse Embryo Assay Tested, Contain Antibiotics, Medium Ready to use.
8	Special Media with GMCSF Cytokines for RIF cases Unique Sequential media or Single Step Media for tough cases like RIF, Recurrent Pregnancy loss, Women above age 38 years. Ready to use media.

### 4. Other Important and Special IVF Requirements

Sl. No	NOMENCLATURE
1	DNA Fragmentation kit. Ready to use. Storage: Room temperature.
2	Reactive oxygen species detection kit. Ready to use. Storage: Room temperature.
3	HBA Slides. Assessment of sperm quality maturity and fertilization potential. Ready to use. Storage: Room temperature.
4	Sterile water. Suited in IVF lab for the cell and tissue culture, co2 incubator , humidity pan, cleaning the surface of the laminar hood. Endotoxin tested limit less then 0.005 EU/ml. MEA up to 96 hours ≥80%. Storage : Room temperature.



5.	Laboratory disinfectant for co2 incubator and laminar hood. Non toxic, safe cleaning for co2 incubator and laminar hood. No alcohol, no odor. Effective against hepatitis B, HIV, rotavirus within 1-2 minutes, microbectrium within 4-6 minutes bacteria fungi between 12-17 minutes
6.	Laboratory Hand disinfectant. Non toxic, safe disinfection for hands. Non alcohol, no odor. Effective against hepatitis B, HIV, rotavirus within 1-2 minutes, microbectrium within 4-6 minutes bacteria, fungi. Neutralizes bacteria which causes bad smell does not dry the skin. Ready to use. Storage: Room temperature.

## 5. DISPOSABLES REQUIRED FOR ART FACILITY

Sl. No.	NOMENCLATURE
1.	IVF Test Tubes Polystyrene Round bottom 14ml. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non- pyrogenic at less then 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
2	IVF Test Tubes Polystyrene Round Bottom 6ml. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non- pyrogenic at less than 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
3	IVF Grade Conical Test Tubes 5ml. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
4	IVF Serological Pipette 1ml. USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
5	IVF Serological Pipette 5ml. USP class VI tested polystyrene. Non- pyrogenic at less than 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique. MEA using multipole endpoints, including 1-cell, expanded blastocyst on day 5 ≥80% and cell count. Storage: Room temperature.
6	IVF Transfer Pipette 3ml. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 end toxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
7	IVF Grade Semen Container. USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
8	IVF Grade Petri dish 35mm. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less then 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
9	IVF Grade Petri dish 60mm. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less then 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
10	IVF Grade Petridish 60mm. Centre Well Dish. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less then 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
11	IVF Grade Petri dish 90 mm. Sterility assurance level to be 10 <sup>6</sup> .USP class VI tested polystyrene. Non-pyrogenic at less then 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.

12	IVF Grade Four Well Dish. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
13	Ovum Pick up Needle. Single/Double lumen & Catheter Ovum Picks up Set (with valve) Tube 60-100 cms Needle 30-35 cms. Gauge 17. B. Thin tip. Storage: Room temperature.
14	Echo tip Ovum Pick up Needle. Single/Double lumen & Catheter Ovum Picks up Set (with valve) Tube 60-100 cms Needle 30-35 cms. Gauge 17. B. Thin tip.
15	Embryo Transfer Catheter 4.5 cms. a- Soft (visible on USG). b- Rigid (visible on USG). c- Trial embryo catheters. Storage : Room temperature.
16	ICSI Dish. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique. MEA tested.
17	PICSI Dish. - Sperm selection for ICSI. Dish with hyaluronan micro dot for sperm selection. Sterility assurance level to be 10 <sup>6</sup> . USP class VI tested polystyrene. Non-pyrogenic at less than 0.25 endotoxin units/ml. Qualified plastic ware for in vitro fertilization (IVF) and assisted reproductive technique.
18	Embryo Reduction Needle. Storage : Room temperature.
19	Cryo Vials 1-2 ml (semen freezing). Storage: Room temperature.
20	IVF Grade Syringes 1 ml. Storage: Room temperature.
21	IVF Grade Syringes 5 ml. Storage: Room temperature.
22	ICSI DISPOSABLES: Holding Pipettes (Same make as injecting pipette) Inner diameter 30 µm and outer diameter 120 µm with distal tip angle 35°. Better support for the oocyte or embryo and reduces distortion during micromanipulation.
23	Injecting Pipettes (Same make as holding pipette). To reduce sperm adhering to glass. Inner diameter 5.4 µm and outer diameter 7 µm with distal tip angle 35°. Precision injection pipette offer reduced tip flexibility and parallel walls for precise sperm control. Storage: Room temperature.
24	DENUDING PIPETTES. Denuding cumulus mass from the oocytes prior to ICSI to check fertilization or for micromanipulation of oocytes embryos, blastocyst and blastomeric. Flexible polycarbonate pipette are designed for use with reusable pipetting handles. Supplied sterile FLEXIPET/DENUDING PIPETTES Inner Diameter - 130/135 µm Inner Diameter - 140/150 µm Inner Diameter - 170/175 µm Inner Diameter - 225/250 µm Inner Diameter - 275/300 µm
25	Intra Uterine Insemination Kit. IUI catheter with 1 ml B. D. syringe Polystyrene. Transfer pipette 3 ml. Polystyrene. Semen container Polystyrene. Storage: Room temp.
26	Testicular Sperm Extraction Pipette. Inner diameter: 6-8 um. Outer diameter: 8-10 um. Angle degree: 35
27	Embryo Biopsy Pipettes/Needle. 30/35 degree angled blastomere biopsy pipette, beveled & polished for Day -3.

28	Embryo Biopsy Pipettes/Needle. 30/35 degree angled blastomere biopsy pipette flat and polished for Day-5.
29	Adjustable Pipette 1000 µl. Storage : Room temperature.
30	Adjustable Pipette 20-100 µl. Storage : Room temperature.
31	Adjustable Pipette 0.5-10 µl. Storage : Room temperature
32	Sterile Tips with white filter & RNase Dnase pyrogen free & DNA free should be fit out micropipette. (1000 µl). Storage: Room temperature (single pack).
33	Sterile Tips with white filter & Rnase Dnase pyrogen free & DNA free should be fit out micropipette ( 0.5-10µl) Storage : Room temperature (single pack).
34	Sterile Tips with white filter & Rnase Dnase pyrogen free & DNA free should be fit out micropipette ( 20-100µl). Storage: Room temperature (single pack).
35	Lint Free Tissue Paper. Storage : Room temperature.
36	Open Device for Vitrification. Storage of vitrified human oocytes and embryos. Mouse embryo assay tested. Storage: Room temperature.
37	Sticky Mat for IVF Lab/ IVF OT. Sticky mat has strong adhesive coating that removes dirt on contact to protect sanitary conditions in clean room areas. Mat made should be made from 2 mil polyethylene sheet and is non-allergenic, non-odorous, and will not age. Storage: Room temperature.
38	Polar Body Biopsy Pipette/Needle. Use for the aspiration of polar body. Internal diameter 18-20 µm and outer diameter 26-30 µm. Angle 30-35 degree angled Storage: Room temperature.
39	Testicular Sperm Aspiration Needle. Needle gaze 18-22, Needle length 2-5 cm. Tubing length 25-35 cm, Storage: Room temperature.
40	Stripper Micropipette Handle. Specialized micro tools for the manipulation and transfer of oocytes and embryos IVF procedure. Storage: Room temperature.
41	In Line Filter. To check contaminants of volatile organic compound and chemical active contaminant. To use inline between incubator and gas sources such as co2, O2, N2 etc. To be composed with HEPA and especially for active carbon filters. Activated carbon to be powdered and layered to present larger surface area and less air gap. To be CE marked and to be manufactured according to GMP and IVF rules. Room temperature.
42	Pipette Pump 2ml. Storage: Room temperature.
43	Pipette Pump 5ml. Storage: Room temperature.
44	Pipette Pump 10ml. Storage: Room temperature.
45	Repro Plates. Specialized plate for the freezing of oocytes and embryos IVF procedure, Storage: Room temperature.
46	Pasture Pipettes (Glass) 3 ml. Storage: Room temperature.
47	Pasture Pipettes (Glass) 5 ml. Storage: Room temperature.
48	Micro Tip 1ml (pack of 500). Storage: Room temperature.
49	Micro Tip 20-100ul (pack of 100). Storage: Room temperature.
50	Cryo Labels. Pre cut labels (white colour) Size: 1.28×0.50 inches. Precut, Peel off labels sized to fit micro centrifuge tubes and other container, Ideals for 1.5-2.0ml or lager tubes. Freezable in liquid nitrogen, Chemically resistant. Storage: Room temperature.
51	Cryo Marker. For marking cryo vials and straws. Alcohols free, Storage: Room temperature.

52	Liquid Nitrogen Gas.
53	Pre Mixed Gases. (CO2, O2, & N2)
54	Goblet: Goblet for frozen straws (oocytes and embryos), Storage: Room temperature.
55	Polystyrene Cooling Box for Vitrification. Compatible with liquid nitrogen gas. Use for freezing of oocytes and embryos etc. Storage : Room temperature.
56	Aluminium Canes

Should provide trained embryologist during each OPU for first 100 cases at IGIMS in the department of Reproductive Biology and train our embryologist.

\*\*\*\*\*