NATIONAL INSTITUTE OF TECHNOLOGY SIKKIM

INVITATION OF TENDERS/BIDS

Ravangla Campus, Barfung, South Sikkim 77139 www.nitsikkim.ac.in/ (Ph): 03595-260042

Tender No: 01/NITS /ME-LAB PURCHASE/2015-16/24

Date: 17.09.15

SUPPLY & INSTALLATION OF EQUIPMENTS FOR FLUID MECHANICS LABORATORY OF MECHANICAL ENGINEERING DEPARTMENT AT NIT SIKKIM (under Two Bid Open Tender)

National Institute of Technology (NIT) Sikkim, Ravangla, South Sikkim invites sealed tenders, as per "Two Bid System", from reputed manufacturers or their authorized Indian Agents/representatives, on the terms and conditions as per tender document, for procurement of following item(s):

SI. No.	Brief description of goods/equipments (detailed specification attach at Annexure-B	Quantity	Place of Delivery	Installation required , if any
1	Base Module for Experiments in Fluid Mechanics	1 no	NIT Sikkim	Yes
2	Osborne Reynolds Experiment	1 no		
3	Bernoulli's Principle	1 no		
4	Methods of Flow Measurement	1 no		
5	Turbine Supply Module	1 no		
6	Francis and Pelton Turbine Models	1 no		
7	Universal Drive and Brake Unit	1 no		

All interested eligible tenderers/bidders are invited to submit their best competitive bids as per the criteria given in this tender document. Kindly submit your bids in two parts as under:

- a) Technical bid (Part-1) consisting of all technical details along with commercial terms and conditions, and
- b) Price bid (Part-2) indicating item-wise price for the items mentioned in the technical bid.

TENDER SUMMARY			
Date of commencement of sale of Tender	Document:	17.09.2015, 11Am onwards	
Last date of sale of Tender Document from office of Undersigned		06.10.2015, 4 pm	
Closing Date & Time for submission of	08.10.2015 ; 5 pm		
bid			
Opening Date & Time (Technical bid)	09.10.2015 ; 11 am		
Opening Date & Time (price bid)	To be informed later o	nly to Technically qualified bidders.	
Bid to be submitted to	Assistant Register, Nati	onal Institute of Technology Sikkim	
	Ravangla Campus, Barfu	ung Block, South Sikkim 737139.	
Place of opening of bid	Conference Hall, National Institute of Technology Sikkim, Ravangla		
	Campus, Barfung, Sout	h Sikkim, 737139	
Tender fee*	1000 (non refundable)	in form of a Demand	
	Draft drawn in favour o	of DIRECTOR, NIT Sikkim	
Earnest Money Deposit (EMD)*	1,50,000/- (One Lakh Fifty Thousand only) in the form of a Demand		
	Draft drawn in favour	of DIRECTOR, NIT Sikkim payable at Ravangla,	
	South Sikkim, and valid	d for a period of 45 days beyond the final bid	
	validity period		

Note*: The Bidder who had submitted the requisite Tender fee & EMD during earlier tender No: 01/NITS /ME-LAB PURCHASE/2015-16/14, Date: 21.07.15 can submit their bids without Tender fee & EMD.

The bidders are requested to read the tender document carefully and ensure compliance with all specifications/instructions herein. Noncompliance with specifications/ instructions in this document may disqualify the bidders from the tender process.

Assistant Register National Institute of Technology Sikkim Ravangla Campus, Barfung Block, South Sikkim 737139.

CHAPTER-1 INSTRUCTIONS TO BIDDER/TENDERER (ITB)

General Information: Tender documents can be brought from the Accounts section, National Institute of Technology Sikkim and are also available on institute website <u>www.nitsikkim.ac.in</u>. Interested tenderers may download from website and submit their offer along with tender fee Rs. 1000.00 each. (in the form of cross demand draft). While submitting your bids mark, Tender No and due date on the envelope.

1. Eligible Bidders/Tenderers :

(i) This Invitation for Bids is open to all registered Manufacturer, authorised Firms & suppliers.

2. Cost of Bidding:

The Bidder/Tenderer shall bear all costs associated with the preparation and submission of its bid, and "the Purchaser", will in no case be responsible or liable for these costs, regardless of the conduct or outcome of the bidding process.

3. Cost of Bidding Documents :

Interested eligible bidders/tenderers may purchase the bidding documents on payment of the cost of bidding documents as indicated in the invitation for bids; OR alternatively, the bidding documents can be downloaded from our website <u>www.nitsikkim.ac.in</u>, free of cost and submit tender fee in the form of DD at the time of bid submission.

3.A. Content of Bidding Documents

(i) The goods required, bidding procedures and contract terms are prescribed in the bidding documents which should be read in conjunction. The bidding documents, apart from the invitation for bids have been divided into Four chapters as under:

Chapter 1 : Instructions to Bidder/Tenderer (ITB)

Chapter 2: Specific Technical Conditions (STC), Specifications and Compliance Details (a) SPECIFIC TECHNICAL TERMS & CONDITIONS (STC)

- (b) SCOPE OF WORK
- (c) ANNEXURE: A Technical Specifications for "LAB EQUIPMENTS"
- (d) ANNEXURE: B: COMPLIANCE WITH ANNEXURE: A, as offered by the Bidder

(e) ANNEXURE: C: BIDDER"s COMPLIANCE STATEMENT FOR STC

Chapter 3 : Technical bid (Part-1)

- (a) Format A : Check List for Eligibility Criteria
- (b) Format B : Bid Proposal Sheet
- (c) Format C : Bidder"s Statement
- (d) Format D : Bill Of Material (BOM)
- (e) Format E : Deviation Statement
- (f) Format F : Manufacturers' Authorization Form (MAF)
- (g) Format G : Price Reasonability Certificate

Chapter 4 : Price Schedule Forms

(a) Annexure D: Price schedule for goods being offered from India

(b) Annexure E: Price schedule for goods being offered from Abroad

(ii) The Bidder/Tenderer is expected to examine all instructions, forms, terms, and specifications in the bidding documents. Failure to furnish all information required by the bidding documents or submission of a bid not substantially responsive to the bidding documents in every respect will be at the Bidder/Tenderer's risk and may result in rejection of its bid.

4. Fraud and corruption:

 (i) The purchaser requires that the Bidder/Tenderer"s suppliers and contractors observe the highest standard of ethics during the procurement and execution of such contracts. In pursuit of this policy, the following are defined:

(a) *"Corrupt practice"* means the offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the action of a public official in the procurement process or in contract execution;

(b) *"Fraudulent practice"* means a misrepresentation or omission of facts in order to influence a procurement process or the execution of a contract;

(c) "*Collusive practice*" means a scheme or arrangement between two or more bidders/tenderers, with or without the knowledge of the purchaser, designed to establish bid prices at artificial, noncompetitive levels; and

(d) "*Coercive practice*" means harming or threatening to harm, directly or indirectly, persons or their property to influence their participation in the procurement process or affect the execution of a contract;

(ii) The purchaser will reject a proposal for award if it determines that the Bidder/Tenderer, recommended for award, has directly or through an agent, engaged in corrupt, fraudulent, collusive or coercive practices in competing for the Contract.

5. Clarification of bidding documents:

In case the bidder requires any clarification regarding the tender documents, they are requested to contact Dr. Shambhunath Barman (e-mail: shambunath.barman@nitsikkim.ac.in, Assistant Professor, NIT Sikkim on or before 06.10.2015.

- 6. Documents Comprising the Bid: The bid prepared by the Bidder/Tenderer shall include:
 - (i) Bid Security (BS)/Earnest Money Deposit (EMD) and Tender fee, as specified in the Invitation to Bids.
 - (ii) Documents establishing goods eligibility & conformity to tender documents, Compliance statements for specifications.
 - (iii) Service support details Form; Deviation Statement Form; Performance Statement Form; Manufacturer's Authorization Form etc.
 - (iv) All required documentary evidence establishing that the Bidder/Tenderer is eligible to bid and is qualified to perform the contract if its bid is accepted.
 - (v) Bid form and applicable Price Schedule Form.For further details, please refer the details clauses of tender document.

7. Language of Bid

- (i) The bid prepared by the Bidder/Tenderer shall be written in English language only.
- (ii) The Supplier shall bear all costs of translation, if any, to the English language and all risks of the accuracy of such translation, for documents provided by the Supplier.

8. Period of Validity of Bids

(i) Bids shall remain valid for 120 days after the date of bid opening prescribed by the Purchaser. A bid valid for a shorter period may be REJECTED by the Purchaser as non-responsive.

(ii) In exceptional circumstances, the Purchaser may solicit the Bidder/Tenderer's consent to an extension of the period of validity. The request and the responses thereto shall be made in writing (or by cable, telex, fax or e-mail). The Bid Security (BS)/Earnest Money Deposit (EMD) provided shall also be suitably extended. A Bidder/Tenderer may refuse the request without forfeiting its Bid Security (BS)/Earnest Money Deposit (EMD). A Bidder/Tenderer granting the request will not be required nor permitted to modify its bid.

(iii) Bid evaluation will be based on the bid prices without taking into consideration the above corrections.

9. Submission

The Bidders/Tenderers may submit their bids by registered/speed post/currier service or by hand, at the following address: "Assistant Registrar, National Institute of Technology Sikkim, Ravangla Campus, 737139, INDIA"

10. Warranty:

i. The Supplier warrants that all the Goods are new, unused, and of the most recent or current models, and that they incorporate all recent improvements in design and materials, unless provided otherwise in the Contract.

ii The Supplier further warrants that the Goods shall be free from defects arising from any act or omission of the Supplier or arising from design, materials, and workmanship, under normal use in the conditions prevailing in India.

iii Unless otherwise specified in the SCC, the warranty shall remain valid for twelve (12) months after the Goods, or any portion thereof as the case may be, have been delivered to and accepted at the final destination indicated in the SCC, or for eighteen (18) months after the date of shipment from the port or place of loading in the country of origin, whichever period concludes earlier.

iv The Purchaser shall give notice to the Supplier stating the nature of any such defects together with all available evidence thereof, promptly following the discovery thereof. The Purchaser shall afford all reasonable opportunity for the Supplier to inspect such defects.

v Upon receipt of such notice, the Supplier shall, within a reasonable period of time expeditiously repair or replace the defective Goods or parts thereof, at no cost to the Purchaser.

vi If having been notified, the Supplier fails to remedy the defect within a reasonable period of time; the Purchaser may proceed to take within a reasonable period such remedial action as may be necessary, at the

Supplier"s risk and expense and without prejudice to any other rights which the Purchaser may have against the Supplier under the Contract.

11. Literature must: All the quotations must be supported by the printed technical data sheet/ literature and the specifications mentioned in the quotation must be reflected/ supported by such printed technical data sheet/ literature. The model no. and specifications quoted should **invariably be highlighted** in the data sheets/ literature for easy reference.

12. **Details of supply** of similar items to Institutes of National Importance in the NE region must be provided.

13. After Sales Service: Vendor should clearly state the available nearest after sales service facilities in the region, without which the offer will be rejected.

14. **Dealership Certificate:** Dealers or Agents quoting on behalf of Manufacturer must enclose valid dealership certificate.

15. **Quality Certificates**: Valid certificate to prove the genuineness of the products and of International standard, as mentioned below, must be enclosed.

(a) Manufacturer's certificate.

(b) ISO/ISI certificate.

16. **End user list**: Vendor should provide end user list of their products at least for last 3 years with documentary evidences.

17. **Performance Bank Guarantee (PBG):** The successful bidder shall furnish an unconditional PBG for 10% of the Purchase Order value from a scheduled Bank of India, before release of the payment. Else 10% of the billed amount will be deducted as security deposit. Where the PBG is obtained by a foreign bank, it shall be got confirmed by a Schedule Indian bank and shall be governed by Indian Laws and be subject to the jurisdiction of courts at Sikkim. The PBG shall guarantee that,

- The Vendor guarantees satisfactory operation of the Equipment & components against poor workmanship, bad quality of materials used, faulty designs and poor performance.
- The Vendor shall, at his own cost, rectify the defects/replace the items supplied, for defects identified during the period of guarantee.
- This guarantee shall be operative from the date of installation till 60 days after the warranty period.

18. Delivery:

- **Time Limit: Maximum within 150(one hundred fifty) days** from the date of issue of this purchase order.
- **Safe Delivery:** All aspects of safe delivery shall be the exclusive responsibility of the vendor. At the destination site, the package will be opened only in the presence of NIT user/representative and vendor's representative. The intact condition of the package and the

seal/indicators for not being tempered with, shall form the basis for certifying the receipt in good condition.

- Insurance: The supplier is to establish 'All Risk Transit Insurance' coverage till door delivery at NIT SIKKIM.
- Part Delivery: Acceptance of part delivery shall be a prerogative of the institute.
- **Penalty for delay in delivery:** The date of delivery should be strictly adhered to otherwise the Director, NIT **SIKKIM** reserves the right not to accept delivery in part or full.

Liquidated Damage:

• If the bidder fails to deliver and place any or all the Equipment or perform the service by the specified date, penalty at the rate of 2% per month of the total order value subject to the maximum of 10% of total order value will be deducted.

- 19. **Genuine Pricing**: Vendor is to ensure that quoted price for the particular item is not more than the price quoted to any other customer in India, particularly to IITs/NITs and other Government Organization. Copy of the latest price list for the quoted item, applicable in India, must be enclosed with the offer.
- 20. Conditional tenders not acceptable: All the terms and conditions mentioned herein must be strictly adhered to by all the vendors. Conditional tenders shall not be accepted on any ground and shall be rejected straightway. Conditions mentioned in the tender bids submitted by vendors will not be binding on NIT SIKKIM.
- 21. Entry Tax: Sikkim Govt. CESS usually charge @1% of total value of equipments has to be added by the tenderers/bidders in the financial bid and cost of way bill/permit to entering Sikkim [to be paid by NIT SIKKIM, not by the vendor], with advance intimation to NIT Sikkim supplied by vendors from outside the State.
- 22. VAT deduction at source: In case of suppliers within SIKKIM, VAT deduction at source, as per Order/ notification of the Govt. of SIKKIM will be applicable.

23. Payment:

- (a) 70% payment on delivery and balance on installation, acceptance and submission of PBG, wherever applicable In case of suppliers are from **INDIA**.
- **24.** Payment for Imported Goods: By an 100% Irrevocable Letter of Credit at CIF/CIP Kolkata value negotiable through any overseas of Bank from India/ any Schedule Bank of India.
- 25. Enquiry during the course of evaluation not allowed: No enquiry from the bidder(s) shall be entertained during the course of evaluation of the tender till final decision is conveyed to the successful bidder(s). However, the Purchase Committee or its authorized representative may make enquiries/seek clarification from the bidders. In such a case, the bidder must extend full co-operation. The bidders may also be asked to arrange demonstration of the offered items, in a short period of notice.

26. Force Majeure:

If the performance of the obligation of either party is rendered commercially impossible by any of the events hereafter mentioned that party shall be under no obligation to perform the agreement under order after giving notice of 15 days from the date of such an event in writing to the other party, and the events referred to are as follows:

- Any law, statute or ordinance, order action or regulations of the Government of India,
- Any kind of natural disaster, and
- Strikes, acts of the Public enemy, war, insurrections, riots, lockouts, sabotage.

27. Termination for default: Default is said to have occurred

- (a) If the equipment or any of its component is found having poor workmanship, faulty designs, poor performance and bad quality of materials used.
- (b) If the supplier fails to deliver any or all of the services within the time period(s) specified in the purchase order or any extension thereof granted by NIT.
- (c) If the supplier fails to perform any other obligation(s) under the contract.
- (d) Under the above circumstances NIT may terminate the contract / purchase order in whole or in part and forfeit the EMD/PBG as applicable. In addition to above, NIT may at its discretion also take the following actions: NIT may procure, upon such terms and in such manner, as it deems appropriate, goods similar to the undelivered items/products and the defaulting supplier shall be liable to compensate NIT for any extra expenditure involved towards goods and services obtained.

28 Applicable Law:

- (a) The contract shall be governed by the laws and procedures established by Govt. of India and subject to exclusive jurisdiction of Competent Court and Forum in **SIKKIM** / India only.
- (b) Any dispute arising out of this purchase shall be referred to the Director NIT SIKKIM, and if either of the parties hereto is dissatisfied with the decision, the dispute shall be referred to the decision of an Arbitrator, who should be acceptable to both the parties, to be appointed by the Director of the Institute. The decision of such Arbitrator shall be final and binding on both the parties.

29. Sealing and Marking of Bids

As the Bidders/Tenderers are invited in Tenders in Two Parts, i.e., <u>Part I – Technical Bid</u>, and <u>Part II – Price Bid</u>; all Bidders/Tenderers are requested to follow carefully the following instructions before preparing their offer.

I- Part I: TECHNICAL BID -

(i) This part should contain detailed specifications of the items quoted by you along with

technical literature and leaflets if any.

- (ii) A compliance statement showing the compliance of the item quoted by you with that of item tendered by us should be prepared and enclosed to this.
- (iii) Any other information called for in the tender related technical and commercial specifications can also come in this part.
- (iv) Prices SHOULD NOT be indicated in TECHNICAL BID (Part-1).

NOTE: Technical part as described above shall be prepared and put it in a sealed cover & marked and addressed as follows:

Tender No. :	
Due Date :	
PART I : TECHNICAL BID	
To, T	he Assistant Registrar
٩	National Institute of Technology Sikkim
F	Ravangla Campus, South Sikkim, 737139
From :	

II- Part II : PRICE BID-

- (i) The prices applicable for the items, item-wise in response to the tender shall come into this part.
- (ii) Tenderer shall indicate very clearly item-wise prices with applicable taxes with reference to their technical offer.
- (iii) Price part prepared as above shall be enveloped and marked as follows:

Tender No. :
Due Date :
PART II : PRICE BID
To, The Assistant Registrar
National Institute of Technology Sikkim
Ravangla Campus, South Sikkim, 737139
From
From :

III- These two separate SEALED ENVELOPES containing "Technical Bid (Part I)" and Price Bid (Part II), prepared as above along with "Tender fee" (if applicable) should be inserted in another envelope and marked as follows:

Tender No. :
Due Date :
PART I & PART II ARE INDIVIDUALLY SEALED AND KEPT INSIDE
(DD towards Tender fee with Covering Letter is also kept inside, in separate envelope)
To, The Assistant Registrar
National Institute of Technology Sikkim
Ravangla Campus, South Sikkim, 737139
From :

IMPORTANT NOTE:

- (i) Being a Two-Part Tender, fax quotations will not be accepted.
- (ii) Please ensure your offers are received before due date and time.
- (iii) In case you are going to download the documents from our website www.nitsikkim.ac.in and submitting the offer, you are requested to submit the DD towards Tender fee in a separate

envelope along with a covering letter duly marked on the cover "Tender fee for Tender No. "

30. Deadline for Submission of Bids

(i) Bids must be received by the Purchaser at the address specified in Invitation for bids no later than the time and date specified therein. In the event of the specified date for the submission of Bids being declared a holiday for the Purchaser, the Bids will be received upto the appointed time on the next working day.

(ii) The Purchaser may, at its discretion, extend the deadline for submission of bids by amending the bid documents in accordance with Clause relating to Amendment of Bidding Documents in which case all rights and obligations of the Purchaser and Bidders/Tenderers previously subject to the deadline will thereafter be subject to the deadline as extended.

31. Late Bids

(i) Any bid received by the Purchaser after the deadline for submission of bids prescribed by the Purchaser will be rejected.

(ii) Such tenders shall be marked as late and not considered for further evaluation. They shall not be opened at all and be returned to the bidders/tenderers in their original envelope without opening.

32. Opening of Bids by the Purchaser

(i) The Purchaser will open all bids one at a time in the presence of Bidder/Tenderers' representatives who choose to attend, as per the schedule given in invitation for bids. The Bidder/Tenderers' representatives who are present shall sign the quotation opening sheet evidencing their attendance. In the event of the specified date of Bid opening being declared a holiday for the Purchaser, the Bids shall be opened at the appointed time and location on the next working day.

(ii) In two part system, the Price bid shall be opened only for technically acceptable (short listed) bids, found **RESPONSIVE** after technical evaluation.

(iii). Price bids of only short-listed RESPONSIVE bidders/tenderers will be opened in presence of the representatives of the bidders/tenderers who decide to remain present during the bid opening. The date of opening of the price bid will be notified only to the short listed vender

(iv) It may be noted that the dates of opening of Technical bid (Part I) and Price bid (Part II) are DIFFERENT.

(v) Bids that are received late shall not be considered further for evaluation, irrespective of the circumstances

33. Confidentiality

(i) Information relating to the examination, evaluation, comparison, and post qualification of bids, and recommendation of contract award, shall not be disclosed to bidders/tenderers or any other persons not officially concerned with such process until publication of the Contract Award.

(ii) Any effort by a Bidder/Tenderer to influence the Purchaser in the examination, evaluation, comparison, and post qualification of the bids or contract award decisions may result in the rejection of its Bid.

34. Responsiveness of Bids

(i) Prior to the detailed evaluation, the purchaser will determine the substantial responsiveness of each bid to the bidding documents. For purposes of this clause, a substantive responsive bid is one, which conforms to all terms and condition and Seal of Bidder/Tenderer bidding documents without material deviations, reservations or omissions. A material deviation, reservation or omission is one that:

(a) affects in any substantial way the scope, quality, or performance of the Goods and Related Services specified in the Contract; or

(b) limits in any substantial way, inconsistent with the Bidding Documents, the Purchaser"s rights or the Bidder/Tenderer"s obligations under the Contract; or

(c) if rectified, would unfairly affect the competitive position of other bidders/tenderers presenting substantially responsive bids.

(ii) The purchasers" determination of a bid"s responsiveness is to be based on the contents of the bid itself without recourse to extrinsic evidence.

(iii) If a bid is not substantially responsive, it will be rejected by the Purchaser and may not subsequently be made responsive by the Bidder/Tenderer by correction of the material deviation, reservation or omission.

35. Non-Conformity, Error and Omission

(i) Provided that a Bid is substantially responsive, the Purchaser may waive any non-conformities or omissions in the Bid that do not constitute a material deviation.

(ii) Provided that a bid is substantially responsive, the Purchaser may request that the Bidder/Tenderer submit the necessary information or documentation, within a reasonable period of time, to rectify non-material non-conformities or omissions in the bid related to documentation requirements. Such omission shall not be related to any aspect of the price of the Bid. Failure of the Bidder/Tenderer to comply with the request may result in the rejection of its Bid.

(iii) Provided that the Bid is substantially responsive, the Purchaser shall correct arithmetical errors on the following basis:

(a) if there is a discrepancy between the unit price and the line item total that is obtained by multiplying the unit price by the quantity, the unit price shall prevail and the line item total shall be corrected, unless in the opinion of the Purchaser there is an obvious misplacement of the decimal point in the unit price, in which case the line item total as quoted shall govern and the unit price shall be corrected;

(b) if there is an error in a total corresponding to the addition or subtraction of sub-totals, the sub-totals shall prevail and the total shall be corrected; and

(c) if, there is a discrepancy between words and figures, the higher of the two would be taken as the bid price, unless the amount expressed in words is related to an arithmetic error, in which case the amount in figures shall prevail subject to (a) and (b) above.

(iv) If the Bidder/Tenderer that submitted the lowest evaluated Bid does not accept the correction of errors, its Bid shall be disqualified and its Bid Security (BS)/Earnest Money Deposit (EMD) may be forfeited.

36. Negotiations

There shall not be any negotiation normally. Negotiations, if at all, shall be an exception and only in the case of items with limited source of supply. Negotiations shall be held with the lowest evaluated responsive Bidder/Tenderer. Counter offers tantamount to negotiations and shall be treated at par with negotiations

37. Purchaser's right to accept Any Bid and to reject any or All Bids

The Purchaser reserves the right to accept or reject any bid, and to annul the bidding process and reject all bids at any time prior to award of Contract, without thereby incurring any liability to the affected Bidder/Tenderer or Bidders/Tenderers.

38. Notification of Award

(i) Prior to the expiration of the period of bid validity, the Purchaser will notify the successful Bidder/Tenderer in writing by registered letter or by cable or telex or fax or e-mail that the bid has been accepted by way of a purchase order/contract.

(ii) Until a formal contract is prepared and executed, the notification of award should constitute a binding contract.

(iv) Upon the successful Bidder/Tenderer"s furnishing of the signed Contract Form and performance security pursuant to Clause the Purchaser will promptly notify each unsuccessful Bidder/Tenderer and will discharge its Bid Security (BS)/Earnest Money Deposit (EMD).

38. Evaluation of Bids: The bid Evaluation shall be done together for all the equipments/machinery.

CHAPTER-2

A: SPECIFIC TECHNICAL TERMS & CONDITIONS (STC)

Please find enclosed herewith the technical terms & conditions to be made compliant with:

1. The Bidder/Tenderer is required to supply the items as per detailed specifications given in Annexure: A.

2. These items will be processed as "Two-Parts tendering processes. The first part is Technical- (Bill of Materials WITHOUT the price bids) and second part consisting of ONLY PRICE bids. All the technical terms and conditions of the offer must be mentioned in the technical proposal and no additional terms will be accepted at a later stage. They should also submit the Technical Compliance Table for these items, as given in Annexure: B.

3. Bidders/Tenderers are required to note that they should substantiate the compliance statement, as given in Annexure: B with necessary and relevant documents, wherever applicable. They should not merely write a "Yes" or "No" in the "Bidder/Tenderer's Response" column but bring out salient features/limitations of their proposed equipments.

4. The Bidder/Tenderer should provide on-site comprehensive five (5) years OR three (3) years warranty for this proposed equipments. (OPTIONAL)

5. The Bidder/Tenderer is required to quote for supply, installation, integration, testing and maintenance for all the hardware systems and software as listed in specifications along with compliance of the terms and conditions.

6. Original copy of latest, currently dated, authorization letter from parent or OEM is required to be submitted, which should address authorization to submit this bid to NIT & supply spare parts and maintenance support for a minimum period of FIVE (5) years, after warranty period, that is total of 6 years.

7. The Bidder/Tenderer has to install the equipments at NIT site with its associated systems, devices and software.

8. The Bidder/Tenderer may be required to give their technical presentation of their proposed equipments as part of the technical qualification criteria. Bidders/Tenderers should ensure full compliance to all the requirement/specification mentioned in these documents.

9. The Bidder/Tenderer should submit the technical brochures, data sheets, etc. describing various technical aspects of offered equipments with hardware and software (if applicable), operational performance etc. This should be substantiated with line diagrams, sub-system connectivity, detailing salient features covered in the proposed equipments, along with technical proposal.

10. The Bidder/Tenderer should submit along with the technical proposal detailed list of Bill of Materials (BoM) and bring out clearly that the proposed equipments as per the BoM will be satisfying all the requirements listed in the technical specifications. Bidder/Tenderer should give detailed justification on how the performance is going to be achieved in the offered equipments, with the submitted BoM.

11. Payment Terms: Since, the configuration offered by you for required items is based upon the performance/throughput/features parameters, NIT will give 100% of total payment only on successful installation, acceptance and demonstration of operational aspects achieved at NIT site. Compliance to these terms should be submitted along with technical proposal itself.

12. Performance Bank Guarantee: Bidders /Tenderers should submit Performance Bank Guarantee for 10% of order value, valid till 60 days after the warranty period, on receipt of the notification of Award / Purchase Order.

13. Installation, integration and acceptance will be done at NIT site.

14. The entire responsibility of installation, integration and operational performance of the required equipments will be of the Bidder/Tenderer.

15. The Bidder/Tenderer is required to quote the LATEST system available in market, meeting the required specifications and supported by the OEMs. The offered equipments should be configured in such a way that any component is NOT to its end-of-life within the assured support period as given in point no. 6 above.

16. At the time of installation and commissioning of the configuration, if it is found that some additional hardware accessories and/or software items with licenses are required to complete the configuration to meet the operational performance requirement of the required equipments, which are not included in your original list of deliverables then you are required to supply such items to ensure the completeness of the equipment/machine at NO EXTRA COST TO NIT. Bidder/Tenderer should ensure completeness of the list of deliverables in the offer to avoid such discovery during installation, in strict consultation with respective OEMs.

17. Bidder/Tenderer and its OEM will arrange for giving onsite technical training of at least three days for operations of the offered equipments. All salient features of operation for these equipments and day to day troubleshooting should be covered in the training.

18. The Bidder/Tenderer should provide all original user"s manuals, technical documents, operating manual, system toolkit, application notes, user guides, software CDs and DVDs, Driver CDs and DVDs, and all printed / electronic media that comes with the offered equipments.

19. The Bidder/Tenderer should provide the following mandatory information:

i. Bidder/Tenderer must provide the information on the similar equipments supplied and installed in last 3 years. Bidder/Tenderer must submit satisfactory documentary proof from end-user.

ii. List of Organizations/Customers dealt by them with respect to above point no. (i).

iii. Latest copy of Income Tax Return Form and PAN number, as per government norms.

iv. Copy of Registration of Firm with CST/GST Nos.

v. List of all past supplies of such similar equipments and their satisfactory performance certified by their users.

20. The Bidder/Tenderer must be an Authorized System Integrator having a direct purchase and support agreement with the OEM of the EQUIPMENTS. The bidder/tenderer should have integrated, tested and supplied the equipment of similar type specified in the "schedule of requirements" of an educational institute / organization.

21. The bidder/tenderer should be either a manufacturer or authorized agent of the foreign/Indian manufacturer. In latter case please enclose the authorization certificate.

22. The "manufacture"s authorization from (MAF)" each of the product quoted should be submitted in the enclosed format.

23. The principal vendor should have local offices in India.

24. The principal of the bidder/tenderer should have a 24 x 7 technical assistance center in India and the bidder must have service centers of their own in Eastern India with engineers qualified to handle the repair & maintenance work.

25. The bidder/tenderer must have supplied the quoted model to the institutions of repute respectively NITs/IITs/Central Universities/IISERs/CSIR laboratories etc. and must have conducted a demo at these places.

26. The principal of the bidder/tenderer should have annual average turnover, for last three financial years, of at least 300 Lakh and should have at least 3 logistics support centers in India, to service/replace the faulty equipment within a time frame of 48 hours. The principal vendor should also have the valid sales tax registration number for the logistic support center in India for spare and replenishment.

27. To establish the goods" eligibility, the documentary evidence of the goods and services eligibility shall consist of a statement on the country of origin of the goods and services offered which shall be confirmed by a certificate of origin at the time of shipment.

28. To establish the conformity of the goods and services to the specifications and schedule of requirements of the bidding document, the documentary evidence of conformity of the goods and services to the bidding documents may be in the form of literature, drawings and data, and shall consist of:

(i) A detailed description of the essential technical and performance characteristics of the goods;

(*ii*) A list giving full particulars, including available sources and current prices, of spare parts, special tools, etc., necessary for the proper and continuing functioning of the goods during the warranty period following commencement of the use of the goods by the Purchaser in the Priced- bid; and

(iii) An item-by-item commentary on the Purchaser's Technical Specifications demonstrating substantial responsiveness of the goods and services to those specifications or a statement of deviations and exceptions, in the format enclosed as "deviation statement form" to the provisions of the Technical Specifications.

29. For purposes of the commentary to be furnished pursuant to above, the Bidder/Tenderer shall note that standards for workmanship, material and equipment, designated by the Purchaser in its Technical Specifications are intended to be descriptive only and not restrictive. The Bidder/Tenderer may substitute these in its bid, provided that it demonstrates to the Purchaser's satisfaction that the substitutions ensure substantial equivalence to those designated in the Technical Specifications.

30. Bidder/Tenderer should also provide the specimen and other material needed for training and demonstration of the system.

31. Compliance to above Specific Technical Conditions (points 1-31), given as **Annexure: C**, will be considered for overall evaluation of the bid and <u>non-compliance of any of the above technical terms & conditions/specifications may turn into rejection.</u>

(B.) SCOPE OF WORK

The work includes the following:

(1.) The supply and installation of equipment with accessories.

(2.) Testing of equipment.

(3.) to provide, one copy each of following documentation (on CD/DVD and printed manual, both) a) installation manual, b) operating manual, and c) Service Manual.

(4.) Repair/Refurnishing work to restore the damage caused due to cabling or any other work related to installation.

(5.) Any other work required for equipment making functional up to the satisfaction of NIT Sikkim.

Place:

Date:

Annexure A

TECHNICAL SPECIFICATIONS FOR "EQUIPMENTS FOR FLUID MECHANICS LABORATORY"

	Specification		Quantit
tem No: 01- Base Mo	odule for Experiments in Fluid Mechanic	S	
the supply of water in positioning of the exp collection of dripping tank with a powerful s returning water shoul volumetric flow rates enable the various exp	module should provide the basic equipment in the closed circuit; the determination of ver- perimental unit on the working surface of water. The closed water circuit should consi- ubmersible pump and the measuring tank a d collected. The measuring tank should se A measuring beaker should used for very sma- should be measured using a stopwatch. The perimental units to be easily and safely posit urface, in which experiments with weirs should	blumetric flow rate and the the base module and the st of the underlying storage rranged above, in which the tep, for larger and smaller all volumetric flow rates. The ne top work surface should ioned. A small flume should	1 No
	Specification		
Closed waMeasuring	le for supporting experimental units in fluid n ter circuit with storage tank, submersible pur g tank for volumetric flow rate measurements g beaker with scale for very small volumetric f	np and measuring tank	
MeasurenWork surf	nent of volumetric flow rates by stopwatch ace with integrated flume for experiments wi ace for collecting the dripping water		
Storage ta	nk, measuring tank, work surface made of Gla	ass Reinforced Plastic (GRP).	
Storage ta	nk, measuring tank, work surface made of Gla Technical Data	ass Reinforced Plastic (GRP).	
Storage ta		250 W	
Storage ta	Technical Data		
Storage ta	Technical Data power consumption	250 W	
	Technical Data power consumption maximum flow rate	250 W 150 litres/min	
Pump	Technical Data power consumption maximum flow rate maximum head	250 W 150 litres/min 7.6 m	
	Technical Data power consumption maximum flow rate maximum head Storage tank, capacity	250 W 150 litres/min 7.6 m 180 Litres	
Pump	Technical Data power consumption maximum flow rate maximum head Storage tank, capacity at large volumetric flow rates	250 W 150 litres/min 7.6 m 180 Litres 40 Litres	
Pump	Technical Data power consumption maximum flow rate maximum head Storage tank, capacity at large volumetric flow rates at small volumetric flow rates	250 W 150 litres/min 7.6 m 180 Litres 40 Litres 10 Litres	
Pump Measuring tank	Technical Data power consumption maximum flow rate maximum head Storage tank, capacity at large volumetric flow rates at small volumetric flow rates L x W x H Measuring beaker with scale for very	250 W 150 litres/min 7.6 m 180 Litres 40 Litres 10 Litres 530 x 150 x 180 mm	

Item No: 02-Osborne Rey	nolds Experiment Apparatus		
flows. It should be possib limiting velocity. Reynolds turbulent. The streamlines an injected contrast medi critical Reynolds number. through which water flows rate in the pipe section. A turbulence flow. Alternati	le to observe the transition from la s number should be able to assess during laminar or turbulent flow sho um (ink). The experiment results should consi , with flow-optimized inlet. A valve s ayer of glass beads in the water tank vely, the experimental unit could	aminar to turbulent flow after a s whether a flow is laminar or ould be displayed with the aid of hould be able to determine the st of a transparent pipe section should be used to adjust the flow a should ensure an even and low- be operated by the laboratory	01 No
	Learning Objectives / Experimer	its	
Visualization cVisualization c	f the transition zone f turbulent flow		
Determination	Osborne Reynolds experiment should be able to display laminar and turbulent be possible to observe the transition from laminar to turbulent flow after a Reynolds number should be able to assess whether a flow is laminar or reamlines during laminar or turbulent flow should be displayed with the aid of rast medium (ink). The experiment results should be able to determine the number. The experimental unit should consist of a transparent pipe section atter flows, with flow-optimized inlet. A valve should be used to adjust the flow ection. A layer of glass beads in the water tank should ensure an even and low-Alternatively, the experimental unit could be operated by the laboratory should provide a step-by-step guide through the experiments. Learning Objectives / Experiments alization of laminar flow alization of the transition zone alization of the transition zone alization of the critical Reynolds number Specification lization of laminar and turbulent flow in the Osborne Reynolds experiment r as flowing medium and ink as contrast medium cal glass pipe section rate the flow rate in the pipe section can be adjusted via a valve rate determined by base module r supply using base module or via ratory supply Image: the end of the tarts atory of using base module or via r tarte with glass beads to stabilize the flow rate in the pipe section can be adjusted via a valve rate determined by base module r supply using base module or via		
 Water as flowin Vertical glass p Water tank wit Flow rate in the Flow rate determine 	ng medium and ink as contrast mediu ipe section h glass beads to stabilize the flow e pipe section can be adjusted via a v mined by base module sing base module or via ply	im	
Water tank	contents	2.2 L	
Pipe section	length	675 mm	
	diameter	10 mm	
Tank for ink	Contents	approx. 250 mL	

•	d include a pipe section with a tra		1 No	
movable pitot tube for measuring the total pressure. The pitot tube should be located within the				
	splaced axially. The position of the	pitot tube should be observed		
through the Venturi nozzle's t	ransparent front panel.			
pressures. The pressures are	e equipped with pressure measur displayed on the six tube manome e and displayed on another single tu	eters. The total pressure should		
	Learning Objectives / Experiment	S		
- Energy conversion i	n divergent/convergent pipe flow			
- Recording the press	ure curve in a Venturi nozzle			
- Recording the veloc	ity curve in a Venturi nozzle			
- Determining the flo	w coefficient			
- Recognizing friction	effects			
	Specifications			
static pressuresAxially movable pitot the Venturi nozzle	ransparent front panel and measuri tube for determining the total pres for displaying the static pressures			
Single tube manomet	ter for displaying the total pressure			
• Flow rate determined	d by the base module			
	Technical Data			
	Cross Sectional Area	84 – 338 mm²		
Venturi nozzle	angle at the inlet	10.5°		
	angle at the outlet	4°		
Pitot tube	movable range	0 - 200 mm		
	diameter	4 mm		
Pipes and pipe connectors:	Make : PVC			
Measuring ranges	static pressure	0 - 290mmWC		
2 2	total pressure	0 - 370mmWC		
2 2	total pressure	0 - 370mmW/C		

measuring devices should	be made transparent. The	rate measurement devices. The flow rate should be able to be flow meter, venture nozzle and	1 No
To determine the flow rate the venturi nozzle, there sh	ould be a differential press nultitube manometer so tl	orifice plate flow meter and with ure measuring device. This should nat the pressure curve along the	
	Learning Objectives / Exper	iments	
- Comparison of dif	ferent flow rate measuring o	devices	
- Flow rate measure	ement with measuring nozzl	e / orifice plate flow meter	
- Flow rate measure	ement with venturi nozzle		
- Flow rate measure	ement with rotameter		
- Determination of	corresponding flow rate coe	fficients	
- Familiarization wit	h differential pressure mea	surements	
- Calibration of flow	rate measuring devices		
	Specification		
base modulePipework made of pVariable-area flow	blastic meter 1600L/h	measurement, for use with the flow meter, orifice and nozzle	
	A	85338 mm ²	
Venturi nozzle	angle at inlet	10, 5°	
	angle at outlet	4°	
Orifice plate flow meter	diameter	14 mm	
Measuring nozzle	diameter	18,5 mm	
Rotameter		1.690 L/h	
6-tube manometer		390mm WC	
Pipes and fittings		PVC	

<u>tem 05:</u> Turbine Supp	ly Module			
behaviors should then be independent from the main pressure present at the to equipped with sensors for mechanical turbine output provision to adjust constan modes. Preferable to have	be used to operate a Pelton or Francis turbine, investigated. There should be closed water circu- ns water supply and can be used in mobile applic urbine should be adjusted by a flow control va- r pressure and flow rate so that measured va- t should be measured via Universal Drive and it speeds or torques, allowing experiments to be data acquisition software so that all measured v- tion of experiments with reliable results.	uit so that the trainer should be cations. The flow rate and/or the alve. The supply unit should be lues are displayed digitally. The Brake Unit which should have carried out in different operating	1 Nc	
	Learning Objectives / Experiments			
- determination o	of the mechanical output of the turbines			
	of the hydraulic output of the turbines			
- determine the e	fficiencies of the turbines			
 plot characterist 	tic curves			
	guide vane position on the characteristic curve w	-		
- influence of the	nozzle cross-section on the characteristic curve w	when using the Pelton turbine		
	Specification			
Specification				
	ırbines uit contains multi-stage centrifugal pump, tank, ir	nductive flow meter and flow		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured a acquisition via USB under Windows Vista or Win	pling		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature and speed measured	pling		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured a acquisition via USB under Windows Vista or Win	pling		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured a acquisition via USB under Windows Vista or Win Technical Data	pling dows 7		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured a acquisition via USB under Windows Vista or Win Technical Data power consumption	pling dows 7 4 kW		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured a acquisition via USB under Windows Vista or Win Technical Data	pling dows 7 4 kW 24 m³/hr		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data 	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature a speed measured a acquisition via USB under Windows Vista or Windows Technical Data power consumption maximum flow rate maximum head	pling dows 7 4 kW 24 m³/hr 72.5 m		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data Centrifugal Pump (5 stages)	uit contains multi-stage centrifugal pump, tank, in e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured acquisition via USB under Windows Vista or Win Technical Data power consumption maximum flow rate maximum head Speed	pling dows 7 4 kW 24 m³/hr 72.5 m 2900 min ⁻¹		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data Centrifugal Pump (5 stages)	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature nd speed measured acquisition via USB under Windows Vista or Win- Technical Data power consumption maximum flow rate maximum head Speed Storage tank, capacity	pling dows 7 4 kW 24 m³/hr 72.5 m 2900 min ⁻¹ 96 Litres		
 Closed water circl control valve Connection to the Drive Universal D Constant torques Digital display for Braking torque ar Software for data Centrifugal Pump (5 stages) Tank	uit contains multi-stage centrifugal pump, tank, ir e turbines via flexible hose with quick-release cou rive and Brake Unit and speeds can be adjusted flow rate, pressure and temperature acquisition via USB under Windows Vista or Win Technical Data power consumption maximum flow rate maximum head Speed Storage tank, capacity Pressure (turbine inlet)	pling dows 7 4 kW 24 m³/hr 72.5 m 2900 min ⁻¹ 96 Litres -18.9 bar		

Water ti		n Turbine Models		
energy a reaction for an in and com turbine control o constant controlle kinetic e outlet. T should p to meas	and mostly should be used turbines depending on th npulse turbine and a France apared with each other. The should be free-jet turbine device. As the complete pri- t in the impeller for which ed by adjusting the nozzle of mergy in the control device the turbine power should be provide the water supply, the ure the pressure at the turbine turbine and the turbine power and the turbine turbine turbine the turbine t	s utilizing water power. They should convert press d for driving electrical generators. Water turbines eir operating principle. The accessories should cor- tis turbine as an example for a reaction turbine. The e drive unit should offer the possibility to set const which converts the pressure energy of the water ressure difference should be reduced exclusively in the turbine can be called a constant pressure tu- cross-section. The Francis turbine should convert t e and in the impeller. The pressure at the wheel inle- be controlled by adjusting the vanes in the control he pressure measurement at the turbine inlet and bine outlet, the Francis turbine should be equipper should measure the braking torque and the speed.	should be divided into impulse and ntain a Pelton turbine as an example he two turbine types should examine ant speeds resp. torques. The Pelton er into kinetic energy entirely in the in the nozzle, the pressure should be be pressure energy of the water into et should be higher than at the wheel of device. The turbine supply module the flow rate measurement. In order d with an additional pressure sensor.	1 N
		Learning Objectives / Experiments		
	 determination of the e recording of characteri influence of the nozzle 	nechanical and hydraulic power fficiency		
	- innuence of the guide	· · · · · · · · · · · · · · · · · · ·		
		Specification		
• • • • • • • •	Constant torques and sp Transparent front panel Adjustable nozzle needle Adjustable guide vanes f Pressure sensor at the F Digital display for flow r	Universal Brake and Drive Unit	bine)	
	Translation	ratio between brake and turbine	1,44:1	
	Daldan tu di u	Output	1.5 kW at 2750 mim ⁻¹ at 6.5 bar	
	Pelton turbine	Wheel diameter	165 mm	
		Variable nozzle setting		
			1kW at 3500 min ⁻¹ and 4,2	
	_	output	bar	
	Francis turbine	output wheel diameter	bər 79 mm	
	Francis turbine			

t should enable experiments a	t the most varied engines and mach	ines, e.g. pumps, turbines or combustion	1 No
	-	the unit via a belt drive. Fasteners couple	TINO
		Ily. The main function of the unit should	
		the selected engines or machines. This	
		vith frequency converter. The energy that	
		in a load resistor. The drive and brake	
		force transducer. For this purpose the	
		To tighten the V-belt, the motor should	
e moved. The unit should incl	ude digital displays for speed and to	rque. The data transmission between the	
nit and the investigated engi	ne or machine takes place via a dat	a cable. All measuring signals should be	
vailable in electronic form and	d could be saved or further processe	d using the software for data acquisition	
rom the engine or machine.			
	Learning Objectives / Experim	ents	
Asynchronous motor	as drive		
- torque measure	ment		
- speed measuren	nent		
Asynchronous motor	as brake		
- torque measure	ment		
- speed measurem	ent		
	Specification		
Drive and brake unit f	for connecting to various engines and	l machines	
Asynchronous motor	with frequency converter		
Asynchronous motor	with pendulum bearing, torque meas	surement via lever arm and force	
transducer			
	by reflective light sensor at the moto	r shaft	
	via frequency converter		
 Measurements for sp 	eed and torque displayed digitally at	the equipment	
	Technical Data		
synchronous motor with	power	2,2 kW	
requency converter	max. speed: approx.	3.000 min ⁻¹	
	max. torque	approx. 6.99 Nm	
	V-belt length	1.157mm, 1.180mm, 1.250mm	
/-belt drive	V-belt type	SPA	
	V-belt pulley diameter	125 mm	
oad resistor		72 Ohm, 2.400 W	
Aeasuring ranges	speed	03.000 min ⁻¹	
	torque	07,5 Nm	

Tender No: 01/NITS/ME-LAB PURCHASE/15-16/24 17.09.2015

ANNEXURE: B

Slno	Name of	Specification	Whether	Quoted
	Equipment		meet the	model
			requirement	specificatio
	Dana Mandula		(Yes/No)	ns
1	Base Module for Experiments	• Base module for supporting experimental units in		
	in Fluid	fluid mechanics		
	Mechanics	Closed water circuit with storage tank, submersible		
		pump and measuring tank		
		Measuring tank for volumetric flow rate		
		measurements		
		Measuring beaker with scale for very small		
		volumetric flow rates		
		Measurement of volumetric flow rates by		
		stopwatch		
		Work surface with integrated flume for		
		experiments with weirs		
		 Work surface for collecting the dripping water 		
		• Storage tank, measuring tank, work surface made		
2	Osborne	of Glass Reinforced Plastic (GRP).		
2	Reynolds	Visualization of laminar and turbulent flow in the		
	Experiment	Osborne Reynolds experiment		
	-	 Water as flowing medium and ink as contrast 		
		medium		
		 Vertical glass pipe section 		
		 Water tank with glass beads to stabilize the flow 		
		 Flow rate in the pipe section can be adjusted via a 		
		valve		
		 Flow rate determined by base module 		
		 Water supply using base module or via 		
		Laboratory supply		
3	Bernoulli's Principle	learning Bernoulli's principle		
	Principle	• Venturi nozzle with transparent front panel and		
		measuring points for measuring the static pressures		
		• Axially movable pitot tube for determining the total		
		pressure at various points within the Venturi nozzle		
		• 6 tube manometers for displaying the static		
		pressures		
		Single tube manometer for displaying the total		
		pressure		
		Flow rate determined by the base module		

BIDDER' S COMPLIANCE STATEMENT FOR ANNEXURE: A

-	Math!f			1
4	Methods of Flow	Investigation of different methods of flow rate		
	Measurement	measurement, for use with the base module		
	weasurement	Pipework made of plastic		
		 Variable-area flow meter 1600L/h 		
		• Differential pressure measurement on venture flow		
		meter, orifice and nozzle		
5	Turbine Supply	Supply unit for turbines		
	Module	• Closed water circuit contains multi-stage centrifugal		
		pump, tank, inductive flow meter and flow control		
		valve		
		 Connection to the turbines via flexible hose with 		
		quick-release coupling		
		Drive Universal Drive and Brake Unit		
		 Constant torques and speeds can be adjusted 		
		 Digital display for flow rate, pressure and 		
		temperature		
		 Braking torque and speed measured 		
	Software for data acquisition via USB under Windows			
		Vista or Windows 7		
6	Francis and	Comparison of a Pelton turbine as impulse turbine		
	Pelton Turbine	and a Francis turbine as reaction turbine		
	Models	 Accessories for the Turbine Supply Unit 		
		• Operation by use of the Universal Brake and Drive		
		Unit		
		 Constant torques and speeds can be adjusted 		
		 Transparent front panel in the turbines for 		
		observing the operating area		
		 Adjustable nozzle needle for setting different 		
		nozzle cross-sections (Pelton turbine)		
		Adjustable guide vanes for setting different angles		
		of incidence (Francis turbine)		
		Pressure sensor at the Francis turbine for		
		measuring the pressure at the turbine outlet		
		Digital display for flow rate, pressures and		
		temperature		
		Braking torque and speed measured in Universal Drive and Brake Unit		
7	Universal Drive	Drive and Brake Unit		
	and Brake Unit	 Drive and brake unit for connecting to various options and machines 		
	and brake Unit	engines and machinesAsynchronous motor with frequency converter		
		 Asynchronous motor with pendulum bearing, torque measurement via lever arm and force 		
		transducer		
		 Speed measurement by reflective light sensor at 		
		the motor shaft		
		 4 quadrant operation via frequency converter 		
		 Measurements for speed and torque displayed 		
		digitally at the equipment		
	L	and the stand addition of the stand addition	l	1

ANNEXURE: C

BIDDER' S COMPLIANCE STATEMENT FOR SPECIFIC TECHNICAL TERMS AND CONDITIONS (STC)

Bidders/Tenderers should critically go through this specific technical terms & conditions and make themselves compliant. Bidders/Tenderers should NOT simply write Yes or No here but give detailed write-up after understanding the requirement of the feature described here and provide respective technical data sheets/brochure/documents.

. SI No	Compliance Statement for Specific Technical Terms and Conditions	Bidder/Tenderer's Response
1	Is the Bidder/Tenderer is ready to supply these items as per detailed specifications given in Annexure: A?	
2	The procurement of these equipments will be processed as Two-Parts tendering process. The first part is Technical-Commercial "Complete set of deliverables without the price bid" and second part consisting of ONLY PRICE bids. Has Bidder/Tenderer submitted this tender response in two-parts as directed?	
	Has Bidder/Tenderer agreed to all the technical terms and conditions of the offer, as mentioned in the technical proposal and no such additional terms & conditions from Bidder/Tenderer will be accepted, at a later stage? Has the Bidder/Tenderer submitted the Technical Compliance Table for these items, as given in	
	Annexure: B?	
3	Has the Bidder/Tenderer substantiated the Compliance Statement, as given in Annexure: B?, with necessary and relevant documents, wherever applicable? Bidder/Tenderer should not merely write a "Yes" or "No" in the "Bidder's Response" column but bring out salient features/limitations of their proposed equipments.	
4	Has the Bidder/Tenderer provided on-site comprehensive five (5) years OR three (3) years warranty for offered equipments and has quoted for both these options separately ?	
5	Has the Bidder/Tenderer quoted for supply, installation, integration, testing of the "These equipment" and maintenance for all the hardware systems and software as listed in this RFP along with compliance of the terms and conditions?	
6	Has Bidder/Tenderer provided ORIGINAL copy of latest, currently dated, authorization letter from parent or OEM, <u>with authorization issued to submit this bid, provide these equipments to NIT & supply/ spare parts</u> and maintenance support for a minimum period of FIVE (5) years, after ONE (01) year warranty period, that is total of ELEVEN (6) years?	
7	Is the Bidder/Tenderer ready to install these equipments at NIT site and integrate them in respective laboratories at NIT, with its associated systems, components, devices and software?	
8	Is the Bidder/Tenderer ready to give their technical presentation of the proposed equipments, as part of the technical qualification criteria? Does the Bidder/Tenderer ensure full compliance to all the requirement/specification mentioned in	
	these documents? Is the Bidder/Tenderer ready to provide all contents of technical discussion/presentation to NIT along with soft copy?	
9	Is the Bidder/Tenderer ready to submit the proposal specific to these equipments along with documents (technical brochures, data sheets, etc.) describing various technical aspects like integrated working of offered equipments with hardware and software, operational performance etc, substantiated with line diagrams, sub-system connectivity, detailing salient features covered in the proposed equipments, along with technical proposal?	
10	Has the Bidder/Tenderer submitted, along with the technical proposal, "the detailed list of deliverables" and has bring out clearly that the offered equipments, as per the BOM submitted, will be satisfying all the requirements listed in the technical specifications?	
	Has Bidder/Tenderer given detailed justification on how the performance is going to be achieved in the offered equipments with the submitted BOM?	
11	Payment Terms: Since, the configuration offered by bidder/Tenderer for these equipments, is based upon the performance/ throughput/ features parameters. Does Bidder/Tenderer agree that NIT will give 100% of total payment only on successful installation, acceptance and demonstration of operational aspects finally achieved at NIT site?	
12	Has Bidder/Tenderer submitted compliance to these terms along with technical proposal itself? Performance Bank Guarantee: Does Bidder/Tenderer agree to submit Performance Bank Guarantee	
	for 10% of order value, valid till 60 days after the warranty period, on receipt of the notification of Award / Purchase Order / Agreement?	
13	Has Bidder/Tenderer included the "list of deliverables", without the prices, for the offered equipments, along with technical proposal, i. e., Technical Bid (part-1)?	
14 15	Does Bidder/Tenderer agree that Installation, integration and acceptance will be done at NIT site? Does the Bidder/Tenderer agree that the entire responsibility of installation, integration and	
15	operational performance of the "Technical Specifications of required equipments" will be of the bidder/tenderer?	

16 Is the Bidder/Tenderer ready to quote the LATEST system available in market, meeting the required specifications and supported by the OEMs? Are these equipments configured in such a way that any component is NOT to its end-of-life within the assured support period as given in point no. 6 above? 17 Does Bidder/Tenderer agree that at the time of installation and commissioning of the configuration, if it is found that some additional hardware accessories and/or software items with licenses are required to complete the configuration to meet the operational performance requirement of the configuration, which are not included in their original list of deliverables then they are required to supply such items to ensure the completeness of the configuration at NO EXTRA COST TO NIT? Does the Bidder/Tenderer ensure the completeness of the list of deliverables in the offer to avoid such discovery during installation, in strict consultation with respective OEMs? 18 Do Bidder/Tenderer and its OEM agree to arrange for "Technical training on the operation of the offered equipments for THREE days or more, as may be necessary to ensure a reasonable degree of comfort with the instrument"? 19 Is the Bidder/Tenderer ready to provide all original user"s manuals, technical documents, operating manual, system tookit, application notes, user guides, software CDs and DVDs, Driver CDs and DVDs, and all printed / electronic media comes with the offered equipments"? 20 Does the Bidder/Tenderer agree to provide the following mandatory information? : i. Bidder/Tenderer agree to provide the following mandatory information? : i. Bidder/Tenderer must provide the information of similar equipmen	
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III. The PAN No., as per dovernment records.	
iv. Copy of Registration of Firm with CST/GST Nos	
21 The Bidder/Tenderer is an Authorized Equipment Supplier having a direct purchase and support	
agreement with the OEM of the EQUIPMENTS.	
Has the bidder/tenderer integrated, tested and supplied the equipments of similar type specified in	
the "schedule of requirements" of any other educational institute / organization.	
22 The bidder/tenderer should be either a manufacturer or authorized agent of the Foreign/Indian manufacturer. In latter case please mention the authorization certificate, reference no. and date.	
 Has the Bidder/Tenderer submitted the "Manufacture"s Authorization Form (MAF)" for each of the 	
product quoted, in the enclosed format	
24 Does the principal vendor have local offices in India. Please give no. of offices & their addresses?	
25 The principal of the bidder/tenderer have a 24 x 7 technical assistance center in India and the bidder	
has service centers of their own in northern India with engineers qualified to handle the repair &	
26 maintenance work. Please give details. 26 Has the Bidder/Tenderer supplied the quoted model to the institutions of repute respectively	
NITs/IITs/Central Universities/IISERs/CSIR laboratories etc. and conducted a demo at these	
places. Please give details?	
27 Has the principal of the Bidder/Tenderer have annual average turnover, for last three financial	
years, of at least 300 Lakh and have at least "a support centre, capable of serving/replacing the	
equipment at NIT, within a time frame of 48 Hrs". Please give details. The principal vendor has the valid trade tax registration number for the logistic support center in	+
India for spare and replenishment. Please give details.	
28 To establish the goods" eligibility, the documentary evidence of the goods and services eligibility shall	
consist of a statement on country of origin of the goods and services offered which shall be confirmed	
by a certificate of origin at the time of shipment. Is it attached here? Please mention reference no.	
and date.	
 29 Does the Bidder/Tenderer agree to provide the following documents: (i) A detailed description of the essential technical and performance characteristics of the goods; 	
 (ii) A list giving full particulars, including available sources and current prices, of spare parts, 	
special tools, etc., necessary for the proper and continuing functioning of the goods during	
the warranty period following commencement of the use of the goods by the purchaser in	
the Priced- bid ; and	
(iii) An item-by-item commentary on the Purchaser's Technical Specifications demonstrating	
substantial responsiveness of the goods and services to those specifications or a statement of deviations and exceptions, in the format enclosed as "deviation statement form" to the	
provisions of the Technical Specifications.	
30 Does the Bidder/Tenderer agree with Clause 29 of STC? For purposes of the commentary to be	
furnished pursuant to above, the Bidder/Tenderer shall note that standards for workmanship,	
material and equipment, designated by the Purchaser in its Technical Specifications are intended to	
be descriptive only and not restrictive. The Bidder/Tenderer may substitute these in its bid, provided	1
that it demonstrates to the Purchaser's satisfaction that the substitutions ensure substantial	
that it demonstrates to the Purchaser's satisfaction that the substitutions ensure substantial equivalence to those designated in the Technical Specifications.	
that it demonstrates to the Purchaser's satisfaction that the substitutions ensure substantial	

CHAPTER-3

TECHNICAL BID (PART-1)

Technical Bid (Part-1) will be the compilation of following documents, *along with required supporting documents*. No document in support of minimum eligibility criteria will be accepted / entertained after opening of tender.

SINo	Documents		
1	Cover letter by bidder (On the Letter Head of the Bidder)		
2	Format – A : Check List for Eligibility Criteria (On the Letter Head of the Bidder)		
3	Format – B : Bid Proposal Sheet (On the Letter Head of the Bidder)		
4	Format – C : Bidder"s Statement (On the Letter Head of the Bidder)		
5	Format – D : BILL OF MATERIAL (BOM) (On the Letter Head of the Bidder)		
6	Format – E : DEVIATION STATEMENT (On the Letter Head of the Bidder)		
7	Format – F : MANUFACTURERS" AUTHORIZATION FORM (MAF)		
8	Format – G : PRICE REASONABILITY CERTIFICATE		
9	ANNEXURE: A TECHNICAL SPECIFICATIONS FOR "EQUIPMENTS FOR FLUID MECHANICS LABORATORY"		
10	ANNEXURE: B: COMPLIANCE WITH ANNEXURE: A, as offered by the Bidder		
11	ANNEXURE: C : BIDDER"S COMPLIANCE STATEMENT FOR SPECIFIC TECHNICAL TERMS AND CONDITIONS (STC)		

[NOTE: The Technical Bid (Part-1) must be submitted in an organized and structured manner. None of the documents/brochures/ leaflets etc. should be submitted in loose form.]

Format – A

CHECK LIST FOR ELIGIBILITY CRITERIA

(ON THE LETTER HEAD OF THE BIDDER)

SLNO	PARTICULARS	To be f	be filled by Bidder			
		YES	NO	N.A	Enclosure No. (If YES)	
1	Enclose a copy, if registered with a.					
	a. NSIC					
	b. SSI					
	c. DGS&D					
2	Required Tender Fees (in the form of DD)					
3	Required Earnest Money deposit (in the form of DD)					
4	Format – A : Check List for Eligibility Criteria (On the Letter Head of the Bidder)					
5	Format – B : Bid Proposal Sheet (On the Letter Head of the Bidder)					
6	Format – C : Bidder"s Statement (On the Letter Head of the Bidder)					
7	Format – D : BILL OF MATERIAL (BOM) (On the Letter Head of the Bidder)					
8	Format – E : DEVIATION STATEMENT (On the Letter Head of the Bidder)					
9	Format – F : MANUFACTURERS' AUTHORIZATION FORM (MAF)					
10	Format – G : PRICE REASONABILITY CERTIFICATE (On the Letter Head of the Bidder)					
11	ANNEXURE: A TECHNICAL SPECIFICATIONS FOR "EQUIPMENTS FOR FLUID MECHANICS LABORATORY"					
12	ANNEXURE: B: COMPLIANCE WITH ANNEXURE: A, as offered by the Bidder					

13	ANNEXURE: C : BIDDER"s COMPLIANCE STATEMENT FOR STC		
13	Copy of Firm's Registration (REF.: Item 4 of FORMAT-C)	1	
15	Copy of Firm's Registration for VAT/CST/LST/TIN/		
16	Copy of the PAN no. of the Firm (REF.: Item 7 of FORMAT-C)		
17	Copy of the TIN no. of the Firm (REF.: Item 8 of FORMAT-C)		
18	Copy of the Service Tax Registration No. of the Firm (REF.: Item 9 of FORMAT-C)		
19	Supporting Document showing Annual Turnover for the last 3 years (REF.: Item 10 of FORMAT-C)		
20	List of Types of equipments supplied during preceding THREE years, as on date of signing the bid (REF.: Item 13 of FORMAT-C)		
21	List and Details of supplying similar equipments, supplied to reputed Indian organizations, especially NITs/ IITs/IIITs/ Central Universities/ IISERs/CSIR labs etc., during preceding THREE years, as on date of signing the bid. (REF.: Item 14 of FORMAT-C)		
22	All documentary proofs showing satisfaction of the eligibility criteria, as laid down in the Tender document, are attached.		
23	All prices quoted, for products and services, are valid for a period of 120 calendar days from the last date of submission of bids. No upward change in prices and 'terms and conditions' will be permitted to the bidder.		
24	The quoted prices are in Indian Rupees, and F.O.R. "NIT Sikkim", inclusive of Packing, Forwarding, Freight/Cartage and insurance charges. Please note that NIT Sikkim is an educational institution and is exempted from payment of Custom Duty and certain taxes, as per rules of Government of India for which necessary certificates will be provided by the NIT Sikkim		
25	In Price Bid (Part 2), all applicable taxes, duties etc are mentioned, clearly and separately. If taxes are not mentioned, it would be assumed that the rates quoted are inclusive of taxes.		
26	The bidder agrees that Price Bid (Part-2) conforms to NIT's price bid format, as given in CHAPTER-5: PRICE SCHEDULE FORM of tender document.		
27	All relevant Technical Literature/Catalogue/Pamphlets/Technical Literature is attached along with Technical Bid (Part-1).		
28	Please provide your delivery schedule, attached along with Technical Bid (Part-1), failing which your quotation will NOT be considered. The successful bidders are required to supply the goods within prescribed delivery schedule from the date of purchase order.		
29	In case of becoming success bidder, the bidder agrees to submit a performance Bank Guarantee of 10% of the cost of the material, as per the Purchase Order of NIT Sikkim, along with the Acceptance.		
30	The bidder agrees that In case the equipment/accessories are not supplied within specified delivery period, or the installation and commissioning is delayed beyond the specified time, a penalty @2% of the Purchase Order value for each month or part thereof, will be charged from the supplier. The same would be deducted from the final payment.		
31	The equipment must be warranted against all manufacturing defects for the standard warranty period from the date of successful installation and acceptance. In case, a part thereof or the whole equipment is found defective the same will have to be rectified/replaced on free of charge basis without lapse of time. In case the equipments are not repaired/ replaced within the "Service Time" quoted, the bidder agrees that suitable action may be taken by the NIT Sikkim.		
32	The bidder agrees that all disputes, if arising related to this tender, shall be in courts of Sikkim.		
33	The bidder agrees that the NIT Sikkim reserves the right to reject lowest quotation or all the quotations or accept any quotation or part thereof without assigning any reason. Further, Bill of Material (BOM) as indicated in this Tender Document is subject to change, determined by the needs of the NIT.		

Place:

Date:

Signature and seal of the Manufacturer/Bidder

FORMAT-B BID PROPOSAL SHEET (ON THE LETTER HEAD OF THE BIDDER)

То

Assistant Registrar National Institute of Technology Sikkim Ravangla Campus, Barfung Block, South Sikkim 737139.

Subject: SUPPLY & INSTALLATION OF **EQUIPMENTS FOR FLUID MECHANICS LABORATORY** OF MECHANICAL ENGINEERING DEPARTMENT AT NIT SIKKIM, Ravangla Campus, Barfung Block, South Sikkim 737 139.

Dear Sir,

We, the undersigned Tenderers, having read and examined in detail the specifications and scope of the work as specified in this document in respect of Supply and Installation of "EQUIPMENTS FOR FLUID MECHANICS LABORATORY" OF MECHANICAL ENGINEERING DEPARTMENT AT NIT SIKKIM, Ravangla Campus, Barfung Block, South Sikkim do hereby propose to supply the required products and services.

Tender No:					
Tender Fee : Subm	nitted	YES/NO (Please	strike off whatever is	s not applicable)	
Amount	Mode	Date of Issue	Name of Bank	Valid up to	
	Demand Draft				
EMD : Submitted		YES/NO (Please	strike off whatever is	s not applicable)	
Amount	Mode	Date of Issue	Name of Bank	Valid up to	
	Demand Draft				

 PRICE AND VALIDITY: All the prices mentioned in our proposal are in accordance with the terms as specified in bidding documents. All prices quoted by us for the products and services shall remain valid respectively for a period of 120 days from the last date of submission of bids.

- 2. **DEVIATIONS**: We declare that all the services shall be performed strictly in accordance with the Technical specifications mentioned in the Tender document. No Technical deviation will be acceptable and any technical deviation is liable to the rejection of tender.
- 3. ADDITIONAL PURCHASE/WORK ORDER: We understand that the NIT Sikkim, in case of the requirements may also place repeat purchase order/work order on the company. In such cases, we shall accept and execute all the purchase/work order placed on us by NIT Sikkim.
- 4. **BID PRICING**: We further declare that the prices stated in our proposal are in accordance with your Terms & Conditions in the bidding document. We further understand that the quantities as specified in this Tender may increase or decrease at the time of Award of Purchase Order as per the requirements of NIT Sikkim.
- 5. **QUALIFYING DATA**: We confirm that we satisfy the qualifying criteria and have attached the requisite documents as documentary proofs. In case you require any further information/documentary proof in this regard during evaluation of our bid, we agree to furnish the same in time to your satisfaction.

- 6. **CONTRACT PERFORMANCE SECURITY**: We hereby declare that in case the contract is awarded to us, we shall submit the performance Guarantee Bond in the form of Bank Guarantee for the amount of 10% of the total order value.
- 7. **PAYMENT TERMS**: We hereby declare that in case the contract is awarded to us, we agree with payment terms specified in the tender documents
- 8. CERTIFICATE AND DECLARATION:

a) I/We certify that no addition/modification/alteration has been made in the Original Tender Document. If at any stage addition /modification /alteration is noticed in the Original Document, I/We will abide by the terms and conditions contained in the original tender document, failing which NIT Sikkim reserves the right to reject the tender and/or cancel the contract

b) It has been certified that all information provided in tender form is true and correct to the best of my knowledge and belief. We hereby declare that our proposal is made in good faith, without collusion or fraud. No forged /tampered document(s) are produced with tender form for gaining unlawful advantage. We understand that NIT Sikkim is authorized to make enquiry to establish the facts claimed and obtain confidential reports from clients/Manufacturer.

c) In case it is established that any information provided by us is false / misleading or in the circumstances where it is found that we have made any wrong claims. Further NIT Sikkim is also authorized to blacklist our firm/company/agency and debar us in participating in any tender/bid in future.

d) I / We assure the Institute that neither I / We, nor any of my /our workers, will do any act which is improper / illegal during the execution in case the tender is awarded to us.

e) I / We assure the Institute that I / We will NOT be outsourcing any work specified in the tender document, to any other firm.

f) Neither I / We, nor anybody on my / our behalf will indulge in any corrupt activities /practices in my /our dealing with the Institute.

g) Our Firm / Company / Agency is not been blacklisted or banned by any Govt. Department, PSU, University, Autonomous Institute or any other Govt. Organization.

h) I/We certify that, I have understood all the terms & conditions as indicated in enquiry of the tender document, and hereby accept all the same completely.

i) I/We, further certify that I/We, possess all the statutory /non-statutory registrations, permissions, approvals, etc., from the Competent Authority for providing the requisite services,

j) We understand that you are not bound to accept the lowest or any bid you may receive.

k) I/We hereby declare that this tender on acceptance communicated by you shall constitute a valid and binding contract between us.

I) I/We certify that the submitted quotation is duly paginated and contains from page no. 1 to

Date:

Signature and Seal of the Manufacturer/Bidder

FORMAT-C BIDDER'S STATEMENT (ON THE LETTER HEAD OF THE BIDDER)

[NOTE: Tenderer MUST submit ALL required documents in support of minimum eligibility criteria along with the tender. No document in support of minimum eligibility criteria will be accepted / entertained after opening of tender. A list of all submitted documents should be provided.]

1	Name & Addres	ss of the Bidder				
2	Website of firm	ı				
3	Place & year of	the firm"s Incorp	ooration			
4	Registration No	. (Copy to be end	closed)			
5	Constitution of	the firm (Pvt. Ltd	l., Public,			
	Proprietary)					
6	Name of the Ch	nief Executive of t	he firm			
7	Permanent Acc	ount No. (Income	e Tax) (Attach			
	attested copy)					
8	Tax Identification	on No. (TIN) (Atta	ich attested			
	сору)					
9	Service Tax Reg	istration No (Atta	ach attested			
	сору)					
10	Annual Turn ov	er for the last 3 y		porting docume	ents)	
	2013-14		2012-13		2011-12	
	Rs		Rs	••••	Rs	
11	Classifications of	of Bidder				
А	Manufacturer					
В	Authorized Agent					
С	C Dealer					
D	Others (please s	pecify)				
12	Name and addr	ress of the contac	t person to whor	n all references	s shall be n	nade regarding this
	tender enquiry.					
А	Name					
В	Address					
С	Telephone No.					
D	Fax No.					
E	Mobile No					
F	e-Mail					
13	Types of equipr	ments supplied d	uring preceding T	HREE years, as	on date of	f signing the bid.
	(Attach support	ting documents)				
	Name of	Capacity size &	Name of	Total Nos	5.	No. of orders in
	equipment	model	Manufacture	rs supplied	in India	hand
			& Country of			
			origin			
А						
В						
С						
D						

14			•	•	upplied to re	•	-		•
	NITs/ IITs/IIITs/ Central Universities/ IISERs/CSIR labs etc., during preceding THREE years, as on								
		date of signing the bid. (Attach supporting documents)							
	Order Placed by (full address of Purchaser)	Order No. and date	Description and quantity of ordered equipment	Value of order	Date of completion of delivery as per contract	Date of actual completion of delivery	Remarks indicating reasons for late delivery, if any	Has the equipment been installed satisfactory? (Attach a certificate from the purchaser/ Consignee)	Contact person along with Telephone No., FAX No. and e mail address
А									
В									
С									
D									
E									
15	Details of Testing facilities available								
А	List of testing								
В	Give details offered.	of tests, w	hich can be	carried out	on items				
С	Details of the	e testing o	rganization	available					
16	Details of N	earest se	rvice cente	rs					
	Address								
	Phone No								
	Year of Estab	olishment							
	Name of con	-		ct details					
	Status of wo								
	No. of skilled								
	No. of Unskil	•	-						
	No. of Engine								
	No. of Admir								
	List of specia				ble				
	Storage spac		•	,					
	Value of min		-	available at	all the				
	service cente								
	Value of the serviced by t	-			oment				

Place:

Date:

Signature and seal of the Manufacturer/Bidder

FORMAT-D BILL OF MATERIAL (BOM) (ON THE LETTER HEAD OF THE BIDDER)

Name of EQUIPMENTS: EQUIPMENTS FOR FLUID MECHANICS LABORATORY

S. No	Item	Unit	Qty	Compliance (Yes/No)
1				
2				
3				
4				
5				

(A) Warranty Details for Equipments and accessories :

(B.) Period of Delivery for Equipments and accessories:

Signature and Seal of the Manufacturer/Bidder

FORMAT-E DEVIATION STATEMENT

(ON THE LETTER HEAD OF THE BIDDER)

The following are the particulars of deviations from the requirements of the tender specifications:

CLAUSE	DEVIATION	REMARKS (including justification)

[NOTE: Where there is no deviation, the statement should be returned duly signed with an endorsement indicating "No Deviations".]

Place:

Date:

Signature and seal of the Manufacturer/Bidder

FORMAT-F MANUFACTURERS' AUTHORIZATION FORM (MAF)

No.				
-				

Dated _____

То

.....

[The Bidder shall require the Manufacturer to fill in this Form in accordance with the instructions indicated. This letter of authorization should be on the letterhead of the Manufacturer and should be signed by a person with the proper authority to sign documents that are binding on the Manufacturer.

Date: [insert date (as day, month and year) of Bid Submission] Tender No.: [insert number from Invitation For Bids]

To: [insert complete name and address of Purchaser] WHEREAS

We [insert complete name of Manufacturer], who are official manufacturers of [insert type of goods manufactured], having factories at [insert full address of Manufacturer"s factories], do hereby authorize [insert complete name of Bidder] to submit a bid the purpose of which is to provide the following Goods, manufactured by us [insert name and or brief description of the Goods], and to subsequently negotiate and sign the Contract.

We hereby extend our full guarantee and warranty in accordance with <u>Clause 10</u> of the <u>Instruction to</u> <u>Bidder</u>, with respect to the Goods offered by the above firm.

Signed: [insert signature(s) of authorized representative(s) of the Manufacturer]

Name: [insert complete name(s) of authorized representative(s) of the Manufacturer]

Title: [insert title]

Duly authorized to sign this Authorization on behalf of: [insert complete name of Bidder]

Dated on ______ day of ______, ____ [insert date of signing]

Yours faithfully, (Name) (Name of manufacturers)

Note: This letter of authority should be on the letterhead of the manufacturer and should be signed by a person competent and having the power of attorney to legally bind the manufacturer. It should be included by the Bidder in its bid.

FORMAT-G PRICE REASONABILITY CERTIFICATE (ON THE LETTER HEAD OF THE BIDDER)

It is ce	rtified th	at the ra	ates quo	ted against Te	nder No	o dated	for
the	items	vide	our	Quotation	No.		dated
		are	e exclusi	vely for supply	to ACA	DEMIC and RESEARCH Institutions and are no	t more than as
charge	d to oth	er Govt	. /PSU"s	s for similar s	upplies	made in recent past. If they have been ap	proved by the
Direct	or, NIT S	ikkim ar	nd if at	any stage it	has bee	n found that the quoted rates are higher t	han the rates
applica	able to su	pply to	Governr	nent then in s	uch con	dition NIT Sikkim, will have the right to cance	I the approved
rates a	nd to tak	e legal a	ction ag	ainst the tend	erer.		

Yours faithfully,

(Name of manufacturers)

(Signature with date) (Name and designation) Duly authorized to sign tender for and on behalf of

CHAPTER-4

PRICE BID (PART-2)

Price Schedule Forms for Goods being offered from India & Abroad are given as follows in form of ANNEXURE-D and ANNEXURE-E:

(a) Annexure-D: Price Schedule for goods being offered from India

(b) Annexure-E: Price Schedule for goods being offered from Abroad

ANNEXURE-D PRICE SCHEDULE FORM FOR GOODS BEING OFFERED FROM INDIA (ON THE LETTER HEAD OF THE BIDDER)

Name of the Bidder/Tenderer_ Tender No. 7 2 3 5 6 8 9 10 11 1 4 (5x6) SIN Item Countr Uni Quantit Ex-works, Total VAT & Packing & Charges for Installation, Commissioni ο Descriptio y of Exprice: other forwardin inland t y n origin warehous ExWork taxes g up to transportatio ng and like station of n, insurance training e, Exshow s, Exroom off ware excise dispatch to ultimate Charges, If the shelf house, duty destination any price Ex-show payable i.e. NIT, (inclusive room , if Sikkim off the of all contrac shelf taxes t is price already awarde (inclusiv paid) d e of all + 1% taxes addl. already ECESS paid) (payabl e to Sikkim Govt.) Total Bid price in Indian currency Signature of Bidder..... In words: Name Business Address

Note: The cost of optional items shall be indicated separately.

ANNEXURE-E PRICE SCHEDULE FORM FOR GOODS BEING OFFERED FROM ABROAD (ON THE LETTER HEAD OF THE BIDDER)

Name of the Bidder/Tenderer								Tender No							
1	2	3	4	5	6			7 (5x6)	8		9		10	11	
SIN	Item	Count	Uni	Quanti	Unit Price		Total price:		Charges	for	Total price		Indian	Аррх.	
о	Descripti	ry of	t	ty						e &	(7+8)		Agents	Ship	
	on	origin							transpor	oortati			Commissi	ment	
									on to				on as a	weigh	
									port/place				percent	t and	
									of			of FOB	volu		
									destinat				/FCA	me	
					FOB	, FCA	FOB	, FCA	Ocean	A	CIF	CI	price		
					(named	(name	(named	(name		i		Р	included in the		
					port of	d place of	port of	d place of		r			Quoted		
					shipme nt	deliver	shipme nt	deliver					price		
					110	v)		v)					price		
						¥)		¥/							
Total Bid price in foreign currency Signature of Bidder											der				
In words: Name															
Business Address												s	•		
Indi	Indian Ageant Name & Address														
······································															

Note: The cost of optional items shall be indicated separately.