

INDIAN INSTITUTE OF TECHNOLOGY DELHI

HAUZ KHAS, NEW DELHI - 110016

NAME OF	:	Comprehensive Maintenance of M/s
WORK		Voltas make water cooled screw chillers
		and operation of HVAC system at Lecture
		Hall Complex at IIT Delhi.
ESTIMATED	:	₹ 34,26,480.00
COST		
EMD	:	₹ 68,530.00(No exemption allowed)
N.I.T. No.	:	9814/20/IITD/EW/2020-21
Date of Opening	:	26-10-2020 at 15.00 PM

C.....Nil I.....Nil O.....



Name of Work:- Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.

NIT for the above work has been prepared with the following: -

	i lui lile abuve wurk has been prepareu v	/vici	r the following.
1	Amount of NIT	•	₹ 34,26,480.00
2	Earnest money	• •	₹68,530.00(No
	-		exemption allowed)
3	Completion time	••	12 Months
4	Last date of submission (online)	:	Upto 3:00 PM of 26-10-2020
5	Date of opening	:	27-10-2020 at 15.00 PM
6	Form of NIT	:	IITD - 8
7	Schedule applicable	:	DSR/Market Rate
8	Material stipulated	:	As per Schedule of Work
9	Chargeable head	:	NPN-18/23
10	Estimate no.	:	IITD/DB/9814
11	Work Code no.	•	WO3499
12	NIT No.	•	9814/20/IITD/EW/2020-21
13	Type of work	•	Maintenance works including works of up-gradation,aesthetic, special repair, addition/alteration.

Certified that this NIT contains **1** to 56 pages.

NIT amounting to ₹34,26,480.00is approved.

AEE (E)

Sr. F.I.

Sr. TS [Plg]

Executive Engineer [E]

C.....Nil I.....Nil O.....



INDIAN INSTITUTE OF TECHNOLOGY DELHI

HAUZ KHAS, NEW DELHI - 110016

NOTICE INVITING E-TENDER

IITD/WORKS(SP-3189)/2020

Executive Engineer (Electrical), Indian Institute of Technology Delhi, Hauz Khas, New Delhi – 110016, Ph. No. 011-2659 1742 on behalf of Board of Governors invites online Item Rate Tender from the Contractors of Repute [Class - 1 Local Supplier / Service provider as per Gol Orders No. P-45021/2/2017-PP (BE-II) dated 04-06-2020] as per details given below.

1	Name of work	:	Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.
2	NIT No.	:	9814/20/IITD/EW/2020-21
3	Estimated Cost (₹)	:	34,26,480.00
4	Earnest Money Deposit (₹)	:	68,530.00(No exemption allowed)
5	Period of completion	:	12 months
6	Last date & time of bid submission	:	Upto 3 PM of 26-10-2020
7	Performance Bank Guarantee	:	5 percent of the tendered amount

The bid forms and other details may be downloaded from Central Public Procurement Portal (<u>http://eprocure.gov.in/eprocure/app</u>). Aspiring bidders who have not enrolled / registered in e-procurement should enrol / register themselves before participating through web site <u>http://eprocure.gov.in/eprocure/app</u>. The portal enrolment is free of cost. Bidders are advised to go through instructions provided at "Instructions for online bid submission."

Bidders can access quotation / tender documents on the website (for searching in the NIC site), kindly go to quotation search option and type 'IIT'. Thereafter, click on "GO" button to view all IIT quotations. Select the appropriate quotation / tender and fill them with all relevant information and submit the completed Quotation / Tender document online on the website http://eprocure.gov.in/eprocure/app as per the schedule given in the next page.

No manual bids will be accepted. All bids (both Technical & Financial) should be submitted in the e-procurement portal.

Executive Engineer (Electrical) For & on behalf of BOG, IIT Delhi

Ch. Head : NPN18/23 Work Code : WO3499

Copy to:-

- 1. Assistant Executive Engineer (E)
- 2. D.A. (Works Accounts)
- 3. D.R. (A/C)
- C.....Nil 4. A!R: NStore Purchase Section) 5. Notice Board

D'Man 6. Website Administrator, IIT Delhi A.E.E /



7. Office copy

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SCHEDULE

1	Name of organisation	:	Indian Institute of Technology Delhi
2	Tender / Quotation type (open / limited	• • •	Open
	/ EOI / auction / single)		
3	Tender / Quotation category (services /	•••	Goods & Works
	goods / works)		
4	Type of Contract (work / supply /	:	Work & Supply
	auction / service / buy / empanelment /		
	sell)		
5	Form of contract (IITD – 7/8)	:	IITD – 8
6	Work Category (civil / electrical / fleet	:	Electrical
	management / computer systems)		
7	Is multi-currency allowed?	:	No
8	Date of publishing / issue / start	:	12/10/2020 at 15:00 Hrs
9	Document download start date	:	12/10/2020 at 15:00 Hrs
10	Document download end date	:	26/10/2020 at 15:00 Hrs
11	Date & time of pre-bid meeting	:	No pre-bid meeting be held
12	Venue of pre-bid meeting	:	Not applicable
13	Last date & time of uploading of bids	:	26/10/2020 at 15:00 Hrs
14	Date & time of opening of Technical	:	27/10/2020 at 15:00 Hrs
	bids		
15	Tender fee	:	Free of cost
16	Earnest Money Deposit (EMD)	:	Rs. 68,530.00
			To be paid through RTGS / NEFT.
			IIT Delhi Bank details are as under:
			Name of Bank A/C: IITD Revenue A/C
			SBI A/C No. – 10773572622
			Name of Bank: State Bank of India, IIT
			Delhi, Hauz Khas, New Delhi – 110016
			IFSC Code: SBIN0001077
			MICR Code: 110002156
C1	Nil I Nil O		Swift No.: SBININBB547
			This is mandatory that UTR number is
D/M-			provided in the online quotation / bid
D'Ma	n A.E.E /		E.E.

Can and a second	ý -		Page 5 of 47
			(Refer UTR column in the Declaration sheet at Annexure – 1) OR In the form of Banker's Cheque or Demand Draft or FDR of scheduled bank in favour of Registrar , IIT Delhi (scanned copy of the same to be uploaded with the bid, date of issue shall be within the NIT period)
17	No. of bids / covers (1 / 2 / 3 / 4)	:	2
18	Address for communication	:	Executive Engineer (Electrical), Works Department, IIT Delhi, Hauz Khas, New Delhi - 110016
19	Contact No.	:	011 2659 1742
20	e-mail address	:	a26335@admin.iitd.ac.in; a26318@admin.iitd.ac.in

INSTRUCTIONS FOR ONLINE BID SUBMISSION

As per the directives of Department of Expenditure, this quotation / tender document has been published on the Central Public Procurement Portal (URL: <u>http://eprocure.gov.in/eprocure/app</u>). The bidders are required to submit softcopies of their bids electronically on the CPP portal, using valid Digital Signature Certificates (DSC). The instructions given below are meant to assist the bidders in registering on the CPP portal, prepare their bids in accordance with the requirements and submitting their bids online on the CPP portal.

More information useful for submitting online bids on the CPP portal may be obtained at <u>http://eprocure.gov.in/eprocure/app</u>

REGISTRATION

- 1. Bidders are required to enrol on the e-procurement module of the Central Public Procurement portal (URL: <u>http://eprocure.gov.in/eprocure/app</u>) by clicking on the link, "click here to enrol". Enrolment on the CPP portal is free of charge.
- 2. As part of the enrolment process, the bidders will be required to choose a unique user name and assign a password for their accounts.
- 3. Bidders are advised to register their valid e-mail address and mobile number as part of the registration process. These would be used for any communication from the CPP Portal.
- 4. Upon enrolment, the bidders will be required to register their valid Digital Signature Certificate (class 2 or class 3 certificates with signing key usage) issued by any certifying authority recognised by CCA India (e.g. Sify / TCS / nCode / eMudhra etc.) with their profile.
- 5. Only one valid DSC should be registered by a bidder. Please note that bidders are responsible to ensure that they do not lend their DSCs to others which may lead to misuse.
- 6. Bidder then logs into the site through the secured log-in by entering their user

^{C.....Nil} ID / pastword and the password of the DSC / eToken.



- 2. Once the bidders have selected the tenders they are interested in, they may download the required documents / tender schedules. The tenders can be moved to the respective "My Tenders" folder. This would enable the CPP portal to intimate the bidders through SMS / e-mail in case there is any corrigendum issued to the tender document.
- 3. The bidder should make a note of the unique Tender ID assigned to each other, in case they want to obtain any clarification / help from the Helpdesk.

PREPARATION OF BIDS

- 1. Bidder should take into account any corrigendum published on the tender document before submitting their bids.
- 2. Please go through the tender advertisement and the tender document carefully to understand the documents required to be submitted as part of the bids. Please note the number of covers in which the bid documents have to be submitted. Any deviations from these may lead to rejection of the bids.
- Bidder, in advance, should get ready the bid documents to be submitted as indicated in the tender document / schedule and generally, they can be in PDF / XLS / RAR / DWF formats. Bid documents may be scanned with 100 dpi with black & white option.
- 4. To avoid the time and effort required in uploading the same set of standard documents which are required to be submitted as a part of every bid, a provision of uploading such standard documents (e.g. PAN card copy, annual reports, auditor's certificates, etc.) has been provided to the bidders. Bidders can use "My Space" area available to them to upload such documents. These documents may be directly submitted from the "My Space" area while submitting a bid, and need not be uploaded again and again. This will lead to a reduction in the time required for bid submission process.

SUBMISSION OF BIDS

- 1. Bidder should log into the site well in advance for bid submission so that he / she upload the bid in time i.e. on or before the bid submission time. Bidder will be responsible for any delay due to other issues.
- 2. The bidder has to digitally sign and upload the required bid documents one by one as indicated in the tender document.
- 3. Bidder has to select the payment option as "on-line" to pay the tender fee / EMD as applicable and enter details of the instrument. Whenever, EMD / Tender fees is sought, bidders need to pay the tender fee and EMD separately on-line through RTGS (Refer to Schedule, Page no. 3)
- 4. A standard BOQ Format has been provided with the tender document to be filled by all the bidders. Bidders are requested to note that they should

C.....Nil necessarily submit their financial bids in the format provided and no other format is acceptable. Bidders are required to download the BOQ file, open it and complete the white coloured [unprotected] cells with their respective A.E.E/



financial quotes and other details (such as name of the bidder). No other cells should be changed. Once the details have been completed, the bidder should save it online, without changing the filename. If the BOQ file is found to be modified by the bidder, the bid will be rejected.

OR

In some cases financial bids can be submitted in PDF format as well (in lieu of BOQ).

- 5. The server time (which is displayed on the bidders' dashboard) will be considered as the standard time for referencing the deadlines for submission of the bids by the bidders, opening of bids etc. The bidders should follow this time during bid submission.
- 6. All the documents being submitted by the bidders would be encrypted using PKI encryption techniques to ensure the secrecy of the data. The data entered cannot be viewed by unauthorised persons until the time of bid opening. The confidentiality of the bids is maintained using the secured Socket Layer 128 bit encryption technology. Data storage encryption of sensitive fields is done.
- 7. The uploaded tender documents become readable only after the tender opening by the authorised bid openers.
- 8. Upon the successful and timely submission of bids, the portal will give a successful bid submission message & a bid summary will be displayed with the bid no. and the date & time of submission of the bid with all other relevant details.
- 9. Kindly add scanned PDF of all relevant documents in a single PDF file of compliance sheet.

ASSISTANCE TO BIDDERS

- 1. Any queries relating to tender document and the terms and conditions contained therein should be addressed to the tender inviting authority for a tender or the relevant contact person indicated in the tender.
- Any queries relating to the process of online bid submission or queries relating to CPP portal in general may be directed to the 24 x 7 CPP Portal Help Desk. The contact number of the helpdesk is 18002337315.

GENERAL INSTRUCTIONS TO THE BIDDERS

- 1. The tenders will be received online through portal <u>https://eprocure.gov.in/eprocure/app</u>. In the technical bids, the bidders are required to upload all the documents in PDF format.
- 2. Possession of a valid class II / III Digital Signature Certificate (DSC) in the form of smart card / e-token in the company's name is a prerequisite for registration and participating in the bid submission activities through https://eprocure.gov.in/eprocure/app. Digital Signature Certificates can be obtained from the authorised certifying agencies, details of which are available in the website <u>https://eprocure.gov.in/ep</u>

3. Tenderers are advised to follow the instructions provided in the "Instructions

C.....Nil to the tenderer" for the e-submission of the bids online through the Central



Public Procurement Portal for e-procurement https://eprocure.gov.in/eprocure/app.

INFORMATION & INSTRUCTION TO BIDDERS FOR E-TENDERING

Executive Engineer (Electrical), Indian Institute of Technology Delhi, Hauz Khas, New Delhi – 110016, Ph. No. 011-2659 1742 on behalf of Board of Governors invites online Item Rate Tender from the Contractors of Repute [Class - 1 Local Supplier / Service provider as per Gol Orders No. P-45021/2/2017-PP (BE-II) dated 04-06-2020]as per details given below:

Sr. No.	NIT No.	Name of Work & Location	Estimated cost put to bid (₹)	Earnest money (≹)	Period of completion	Last date & time of submission of bid	Time & date of opening of Technical Bid	Time & date of opening of Financial Bid
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)
1	9814/20/IITD/EW/2020-21	Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.	34,26,480.00	68,530.00	12 months	Upto 3 PM of 26-10-2020	27-10-2020 at 15:00 Hrs	To be decided after assessing Technical Bids

- 1. The bidder whose bid is accepted shall be required to submit a performance guarantee of 5 percent of the tendered amount in the form of Bank Guarantee or FDR from a nationalised / scheduled bank within the period specified in Schedule F. in case the bidder fails to deposit the said performance guarantee within the period as indicated in Schedule 'F', including the extended period if any, the Earnest Money deposited by the bidder shall be forfeited automatically without any notice to the bidder. The Performance Guarantee shall initially be kept valid upto the stipulated date of completion plus sixty days beyond that.
- 2. Contractors who fulfil the following requirements shall be eligible to apply. Joint ventures are not accepted.
 - a. Should have satisfactorily completed the works as mentioned below during the last Seven years ending previous day of last date of submission of bids.
 - i. **Three** similar works each costing not less than ₹13,70,592.00, or **two** similar works each costing not less than ₹ 20,55,888.00, or one similar work costing not less than ₹27,41,184.00(all figures rounded to nearest thousand)
 - ii. Earnest money of ₹68,530.00 to be deposited either online or scanned copy of Banker's Cheque or Demand Draft or FDR as indicated in the Schedule at pg 3. 0.....

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at



- 3. The value of executed work shall be brought to current costing level by enhancing the actual value of work at simple rate of 7% per annum; calculated from the date of completion to last date of submission of financial bid.
- 4. Similar work means Maintenance and operation of water cooled screw chillers and HVAC system with capacity Not less than (3 X 275 TR).
- 5. Work means work done under Government / Public Sector Undertaking / Central Autonomous bodies.
- 6. Completion certificates are required to be got issued by an officer not below the rank of Executive Engineer of similar works completed by the Firm. The work experience certificates submitted by the bidders shall clearly indicate that:
 - a. The similar work executed shall be as per '4' above
 - b. The completed cost of the work
 - c. Actual date of completion of the work
- 7. IITD is committed to follow the principle of transparency, equity and competitiveness in public procurement. Before submission of bid, each bidder should sign integrity pact at respective places and submit the bid. If duly signed integrity pact is not submitted by bidder, such bid shall not be considered.
- 8. The intending bidder must read the terms and conditions [both commercial & Additional] & IITD 6 carefully which will be the part of the Contract. He should only submit his bid if he considers himself eligible and he is in possession of all the documents required.
- 9. Information and Instructions for bidders posted on website shall form part of bid document.
- **10.** The bid document consisting of plans, specifications, the schedule of quantities of various types of items to be executed and the set of terms and conditions of the contract to be complied with and other necessary documents can be seen and downloaded from website e-procure.gov.in free of cost.
- **11.** But the bid can only be submitted after depositing requisite EMD as specified in the "Schedule".
- 12. Copy of all mandatory documents as desired in the NIT shall be scanned and up-loaded to the e-Tendering website within the period of bid submission. However, certified / original copy of all the scanned and up-loaded documents shall have to be submitted by the lowest bidder only within a week physically in the office of e-tendering authority, if so desired, by the tender inviting authority.
- **13.** Online bid documents submitted by intending bidders shall be opened only of those bidders, who has deposited requisite EMD / attached scanned copy and other documents scanned and uploaded are found in order.
- **14.** Those contractors not registered on the website mentioned above, are required to get registered beforehand. Bidders should refer "Instruction for Online Bid Submission" given earlier for further assistance.
- **15.** When bids are invited in two / three stages systems and if it is desired to submit revised financial bid it shall be mandatory to submit revised financial bid. If not submitted then the bid submitted earlier shall become invalid.
- **16.** The department reserves the right to reject any prospective application without assigning any reason and to restrict the list of qualified contractors to any number deemed suitable by it, if too many bids are received satisfying the laid down criterion.
- **17.** Contractors must ensure to quote rate of each item.
- **18.** 'Class 1 Local Supplier' means a supplier or service provider, whose goods, services or works offered for procurement has local content equal to or more than 50% as defined under
- C.....Ni of Industry and Internal Trade (Public Procurement Section), Ministry of Commerce and Industry, Govt of India.



Page 10of a. 'Local Content' means the amount of value added in India which shall unless and otherwise prescribed by the nodal ministry, be the total value of the item procured (excluding net domestic indirect taxes) minus the value of imported content in the item (including all domestic duties) as a proportion of the total value, in percent.

- b. For the purpose of verification of 'Local Content', the Class-1 Local Supplier / Service Provider at the time of bidding, tender or solicitation shall be required to indicate percentage of local content and provide self-certification that the items offered meet the local content requirement for Class – 1 Local Supplier. They shall also give details of the location(s) at which the local value addition is made.
- c. In cases of procurement for a value in excess of 10 crore, the Class 1 Local Supplier shall be required to provide a certificate from the statutory auditor or cost auditor of the company (in case of the companies) or from a practicing cost accountant or practicing chartered accountant (in respect of suppliers other than companies) giving the percentage of local content.
- d. Nodal Ministries may constitute committees with internal and external experts for independent verification of self-certifications and auditor's / accountant's certificates on random basis and in the case of complaints.
- e. False declarations will be in breach of Code of Integrity under rule 175(1)(i)(h) of the General Financial Rules for which a bidder or its successors can be debarred for upto two years as per Rule 151 (iii) of the General Financial Rules along with such other actions as may be permissible under law.

List of Mandatory Documents to be scanned and uploaded within the period of bid submission:

- 1. Annexure I duly filled in and duly mentioning UTR No. for EMD deposition or Banker's Cheque or Demand Draft or FDRnumber with date of issue and got signed
- 2. Declaration on firm letter head if the bidder has uploaded scanned copy of Banker's Cheque or Demand Draft or FDR for EMD "The physical EMD shall be deposited by me / us with the authority inviting tender, in case I / we become the lowest tenderer within a week of the opening of financial bid, otherwise, department may reject the tender and also take action to debar me / us from tendering in any form in IIT Delhi"
- **3.** Self-certification on company letter head for the purpose of verification of 'Local Content', (refer clause 18 above) the 'Class-1 Local Supplier / Service Provider'indicating -
 - a. Percentage of local content
 - b. Items offered meet the local content requirement for 'Class 1 Local Supplier'
 - c. Details of the location(s) at which the local value addition is made
- 4. Certificate of work experience as desired (vide clause 4 above)
- 5. Certificate of GST Registration of the State in which the work is to be taken up, if already obtained by the bidder. If the bidder has not obtained GST registration in the State in which the work is to be taken up, or as required by GST authorities then in such a case the bidder shall scan and upload following undertaking alongwith other bid documents.

"if work is awarded to me, I/we shall obtain GST registration certificate of the State, in which work is to be taken up within one month from the date of receipt of award letter or before release of any payment by IIT Delhi, whichever is earlier, failing which I/we shall be responsible for any delay in payments which will be due towards me/us on a/c of the work executed and/or for any action taken by IIT Delhi or GST department in this regard."

- 6. Affidavit as per provision of the clause 1.2.2 of IITD-6 [To be submitted on stamp paper]
- 7. Acceptance to execute INTEGRITY PACT [see integrity pact]

8.^{C...}II^{*}D 7 / 8 duly^Nsigned ^{O.....}

9, EPFO & ESIC Registration proof



10. Valid Electrical Licence

- 11. Attested certificate of Engineer along with experience certificate to deployed for the work as per clause 36 (i) Schedule 'F".
- 12. Any other document as specified in the NIT

[N.B. -- As per CPWD Works Manual 2019, "MSME firms registered in NSIC under PP policy are exempted from payment of EMD for supply of goods and services only" Hence, there is no applicability of EMD exemption for this work. BID without EMD will summarily be rejected]

> Executive Engineer [Electrical] For & on Behalf of BOG, IIT Delhi

> > **IITD – 6**

INDIAN INSTITUTE OF TECHNOLOGY DELHI **NOTICE INVITING E-TENDER**

- 1.0 Item rate tenders are invited on behalf of The Board of Governors, IIT Delhi, Hauz Khas, New Delhi - 110016 from Contractors of Repute [Class - 1 Local Supplier / Service provider as per Gol Orders No. P-45021/2/2017-PP (BE-II) dated 04-06-2020] as per details given below for the work of Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.
- 1.1 The work is estimated to cost ₹34,26,480.00. This estimate, however, is given merely as a rough guide.
- 1.2 Intending bidder is eligible to submit the bid provided he has definite proof from the appropriate authority, which shall be to the satisfaction of the competent authority, of having satisfactorily completed similar works of magnitude specified below:-
- 1.2.1 Criteria of eligibility for submission of bid documents: Conditions for intending bidders / contractors
- 1.2.1.1 Three similar works each costing not less than ₹13,70,592.00, or two similar works each costing not less than ₹ 20,55,888.00, or one similar work costing not less than ₹27,41,184.00 in last 7 years ending previous day of last date of submission of bids. The value of executed work shall be brought to current costing level by enhancing the actual value of work at simple rate of 7% per annum; calculated from the date of completion to last date of submission of financial bid.
- 1.2.2 To become eligible for issue of bid, the bidders shall have to furnish an affidavit as under: -"I / We undertake and confirm that eligible similar works(s) has/have not been got executed through another contractor on back to back basis. Further that, if such a violation comes to the notice of Department, then I / we shall be debarred for bidding in IIT Delhi in future forever. Also, if such a violation comes to the notice of Department before date of start of work, the Engineer-in-Charge shall be free to forfeit the entire amount of Earnest Money Deposit/Performance Guarantee (Scanned copy to be uploaded at the time of submission of bid)"
- 2.0 Agreement shall be drawn with the successful bidders on prescribed Form No. IITD 7/8 which is available as IIT Delhi Publication. Bidders shall quote their rates as per various terms and conditions of the said form which will form part of the agreement.
- The time allowed for carrying out the work will be **12 months** from the date of start as **3.0**..Nil defined in schedule 'F' or from the first date of handing over of the site, whichever is later, in accordance with the phasing, if any, indicated in the bid documents. A.E.E / $\ensuremath{\mathsf{A}}$



5.0

The site for the work is available.

The bid document consisting of plans, specifications, the schedule of quantities of various types of items to be executed and the set of terms and conditions of the contract to be complied with and other necessary documents except Standard General Conditions of Contract Form can be seen from the web Site **e-procure.gov.in**.

- 6.0 After submission of the bid the contractor can re-submit revised bid any number of times but before last time and date of submission of tender as notified.
- **7.0** While submitting the revised bid, contractor can revise the rate of one or more item(s) any number of times (he need not re-enter rate of all the items) but before last time and date of submission of tender as notified.
- **8.0** If it is desired to submit revised financial bid then it shall be mandatory to submit revised financial bid. If not submitted, then the tender submitted earlier shall become invalid.
- 9.0 Earnest Money as specified to be paid through RTGS / NEFT. IIT Delhi Bank details are as under: Name of the Bank A/C: IITD Revenue Account; SBI A/C No.: 10773572622; Name of the Bank: State Bank of India, IIT Delhi, Hauz Khas, New Delhi-110016; IFSC Code: SBIN0001077; MICR Code: 110002156; Swift No.: SBININBB547(This is mandatory that UTR Number is provided in the on-line quotation/bid. Kindly refer to the UTR Column of the Declaration Sheet at Annexure-1) ORIn the form of Banker's Cheque or Demand Draft or FDR of scheduled bank in favour of Registrar, IIT Delhi(scanned copy of the same to be uploaded with the bid, date of issue shall be within the NIT period)Interested contractor who wish to participate in the bid has to ensure payment of EMD within the period of bid submission.
- 9.1 Copy of all 'mandatory documents' and other documents as specified in the press notice shall be scanned and uploaded to the e-tendering website within the period of bid submission. *However, Original EMD and certified copy of all the scanned and uploaded documents as specified in press notice shall have to be submitted by the lowest bidder only within a week physically in the office of tender opening authority.*
- **10.0** The bid submitted shall become invalid, if:
- 10.1 The bidder is found ineligible.
- 10.2 The bidder does not upload all the documents (including GSTIN Registration) as stipulated in the bid document.
- 10.3 EMD not deposited as specified
- 10.4 If any discrepancy is noticed between the documents as uploaded at the time of submission of bid and hard copies as submitted *physically by the lowest bidder* in the office of the bid opening authority.
- 11.0 The contractor whose bid is accepted will be required to furnish **performance guarantee** of 5% (Five Percent) of the bid amount within the period specified in Schedule F. This guarantee shall be in the form of Deposit at Call receipt of any scheduled bank / Banker' cheque of any scheduled bank/ Demand Draft of any scheduled bank/Pay order of any Scheduled Bank (in case guarantee amount is less than Rs.1,00,000/-) or Government Securities or Fixed Deposit Receipts or irrevocable Bank Guarantee Bonds of any Scheduled Bank or the State Bank of India in accordance with the prescribed form. In case the contractor fails to deposit the said performance guarantee within the period as indicated in Schedule 'F' including the extended period if any, the Earnest Money deposited by the contractor shall be forfeited automatically without any notice to the contractor.The earnest money deposited alongwith bid shall be returned after receiving the aforesaid performance guarantee.
- 12.0 Intending Bidders are advised to inspect and examine the site and its surroundings and satisfy themselves before submitting their bids as to the nature of the ground and subsoil (so far as is practicable), the form and nature of the site, the means of access to the site, the accommodation they may require and in general shall themselves obtain all necessary information as to risks, contingencies and other circumstances which may influence or affect their bid. A bidder shall be deemed to have full knowledge of the site whether he inspects it or not and no extra charge consequent on any misunderstanding or otherwise shall be allowed. The bidders shall be responsible for arranging and maintaining at his own cost all materials, tools & plants, water, electricity access, facilities for workers and all other services required for executing the work unless otherwise specifically provided for in the contract documents. Submission of a bid by a bidder E.E.



Page 13of implies that he has read this notice and all other contract documents and has made himself aware of the scope and specifications of the work to be done and of conditions and rates at which stores, tools and plant, etc. will be issued to him by the Government and local conditions and other factors having a bearing on the execution of the work.

- **13.0** The competent authority on behalf of the Board of Governors does not bind itself to accept the lowest or any other bid and reserves to itself the authority to reject any or all the bids received without the assignment of any reason. All bids in which any of the prescribed condition is not fulfilled or any condition including that of conditional rebate is put forth by the bidder shall be summarily rejected.
- **14.0** Canvassing whether directly or indirectly, in connection with bidders is strictly prohibited and the bids submitted by the contractors who resort to canvassing will be liable for rejection.
- **15.0** The competent authority on behalf of the Board of Governors reserves to himself the right of accepting the whole or any part of the bid and the bidder shall be bound to perform the same at the rate quoted.
- **16.0** The contractor shall not be permitted to bid for works in the IITD responsible for award and execution of contracts, in which his near relative is posted a Divisional Accountant or as an officer in any capacity between the grades of Superintending Engineer and Junior Engineer (both inclusive). He shall also intimate the names of persons who are working with him in any capacity or are subsequently employed by him and who are near relatives to any Gazetted officer in the IIT Delhi. Any breach of this condition by the contractor would render him liable to be debarred from bidding process in future in IIT Delhi.
- **17.0** No Engineer of Gazetted rank or other Gazetted Officer employed in Engineering or Administrative duties in an Engineering Department of the Government of India is allowed to work as a contractor for a period of one year after his retirement from Government service, without the prior permission of the Government of India in writing. This contract liable to be cancelled, if, either the contractor or any of his employees is found any time to be such a person who had not obtained the permission of the Government of India as aforesaid before submission of the bid or engagement in the contractor's service.
- **18.0** The bid for the works shall remain open for acceptance for a period of **ninety daysfrom the date of opening of financial bids**, if any bidder withdraws his bid before the said period or issue of letter of acceptance, whichever is earlier, or makes any modifications in the terms and conditions of the bid which are not acceptable to the department, then the IIT Delhi shall, without prejudice to any other right or remedy, be at liberty to forfeit 50% of the said earnest money as aforesaid. Further the bidder shall not be allowed to participate in the re-bidding process of the work.
- **19.0** This notice inviting bid shall form a part of the contract document. The successful bidder / contractor, on acceptance of his bid by the Accepting Authority shall within fifteen days from the stipulated date of start of the work, sign the contract consisting of:-
- 19.1 The Notice Inviting Bid, all the documents including additional conditions, specifications and drawings, if any, forming part of the bid as uploaded at the time of invitation of bid and the rates quoted online at the time of submission of bid and acceptance thereof together with any correspondence leading thereto.
- 19.2 Standard IITD Form –7/8 or other Standard IITD Form as applicable.
- 20.0 In case any discrepancy is noticed between the documents as uploaded at the time of submission of the bid online and hard copies as to be submitted physically in IIT Delhi, if so desired by the accepting authority, then the bid submitted shall become invalid and the IIT Delhi shall, without prejudice to any other right or remedy, be at liberty to forfeit 50% of the said earnest money as aforesaid. Further the bidder shall not be allowed to participate in the bidding process of the work.

INTEGRITY PACT

То



Sub: NIT No. 9814/20/IITD/EW/2020-21 for the work of "Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi."

Dear Sir,

It is hereby declared that IITDelhi (IITD) is committed to follow the principle of transparency, equity and competitiveness in public procurement.

The subject Notice Inviting Tender (NIT) is an invitation to offer made on the condition that the Bidder will sign the Integrity Agreement, which is an integral part of the tender/bid documents, failing which the tender/bidder will stand disqualified from the tendering process and the bid of the bidder would be summarily rejected.

This declaration shall form part and parcel of the Integrity Agreement and signing of the same shall be deemed as acceptance and signing of the Integrity Agreement on behalf of the IITD.

Yours faithfully,

Executive Engineer

[TO BE SUBMITTED DULY SIGNED BY THE BIDDER ALONGWITH BID DOCUMENTS]

То

Executive Engineer (Elect.), IIT Delhi, Hauz Khas, New Delhi – 110016

Subject: Submission of Bid for the work of "Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi."

Dear Sir,

I / We acknowledge that IIT Delhi is committed to follow the principles thereof as enumerated in the Integrity Agreement enclosed with the tender/bid document.

I / We agree that the Notice Inviting Tender (NIT) is an invitation to offer made on the condition that I / We will sign the enclosed integrity Agreement, which is an integral part of tender / c...bidi documents, failing which...I / We will stand disqualified from the tendering process. I / We acknowledge that THE MAKING OF THE BID SHALL BE REGARDED AS AN UNCONDITIONAL AND ABSOLUTE ACCEPTANCE of this condition of the NIT.



I / We confirm acceptance and compliance with the Integrity Agreement in letter and spirit and further agree that execution of the said Integrity Agreement shall be separate and distinct from the main contract, which will come into existence when tender/bid is finally accepted by IITD. I / We acknowledge and accept the duration of the Integrity Agreement, which shall be in the line with Article 1 of the enclosed Integrity Agreement.

I / We acknowledge that in the event of my/our failure to sign and accept the Integrity Agreement, while submitting the tender/bid, IITD shall have unqualified, absolute and unfettered right to disqualify the tenderer /bidder and reject the tender/bid is accordance with terms and conditions of the tender/bid.

Yours faithfully,

(Hereinafter

(Duly signed by authorized signatory of the Bidder)

[To be signed by the bidder and same signatory competent / authorized to sign the relevant contract on behalf of IITD]

INTEGRITY AGREEMENT

This Integrity Agreement is made at on this day of..... 20.....

BETWEEN

The Board of Governors, IIT Delhi, Hauz Khas, New Delhi - 16 represented through Executive Engineer (Elect.), IIT Delhi

....., referred as the 'Principal/Owner',

(Address of Division)

'Principal/Owner', which expression shall unless repugnant to the meaning or context hereof include its successors and permitted assigns)

AND

(Name and Address of the Individual/firm/Company) Through..... (Details of duly authorized signatory)

to as the "Bidder/Contractor" and which expression shall unless repugnant to the meaning or context hereof include its successors and permitted assigns)

PREAMBLE

WHEREAS the Principal / Owner has floated the Tender (NIT No. 9814/20/IITD/EW/2020-21) (hereinafter referred to as "Tender/Bid") and intends to award, under laid down organizational procedure, contract for "Comprehensive Maintenance of M/s Voltas make water cooled screw A.E.E / E.E. D'Man



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chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi." (Name of work) hereinafter referred to as the "Contract".

AND WHEREAS the Principal/Owner values full compliance with all relevant laws of the land, rules, regulations, economic use of resources and of fairness/transparency in its relation with its Bidder(s) and Contractor(s) AND WHEREAS to meet the purpose aforesaid both the parties have agreed to enter into this Integrity Agreement (hereinafter referred to as "Integrity Pact" or "Pact"), the terms and conditions of which shall also be read as integral part and parcel of the Tender/Bid documents and Contract between the parties.

NOW, THEREFORE, in consideration of mutual covenants contained in this Pact, the parties hereby agree as follows and this Pact witnesses as under:

ARTICLE 1: COMMITMENT OF THE PRINCIPAL / OWNER

- 1. The Principal/Owner commits itself to take all measures necessary to prevent corruption and to observe the following principles:
 - **1.1.** No employee of the Principal / Owner, personally or through any of his / her family members, will in connection with the Tender, or the execution of the Contract, demand, take a promise for or accept, for self or third person, any material or immaterial benefit which the person is not legally entitled to.
 - **1.1.1.** The Principal/Owner will, during the Tender process, treat all Bidder(s) with equity and reason. The Principal/Owner will, in particular, before and during the Tender process, provide to all Bidder(s) the same information and will not provide to any Bidder(s) confidential / additional information through which the Bidder(s) could obtain an advantage in relation to the Tender process or the Contract execution.
 - **1.1.2.** The Principal/Owner shall Endeavour to exclude from the Tender process any person, whose conduct in the past has been of biased nature.
- 2. If the Principal/Owner obtains information on the conduct of any of its employees which is a criminal offence under the Indian Penal code (IPC)/Prevention of Corruption Act, 1988 (PoC Act) or is in violation of the principles herein mentioned or if there be a substantive suspicion in this regard, the Principal/Owner will inform the Chief Vigilance Officer and in addition can also initiate disciplinary actions as per its internal laid down policies and procedures.

ARTICLE 2: COMMITMENT OF THE BIDDER(S) / CONTRACTOR(S)

- It is required that each Bidder/Contractor (including their respective officers, employees and agents) adhere to the highest ethical standards, and report to the Government / Department all suspected acts of fraud or corruption or coercion or collusion of which it has knowledge or becomes aware, during the tendering process and throughout the negotiation or award of a contract.
- 2. The Bidder(s)/Contractor(s) commits himself to take all measures necessary to prevent corruption. He commits himself to observe the following principles during his participation in the Tender process and during the Contract execution:
 - **2.1.** The Bidder(s)/Contractor(s) will not, directly or through any other person or firm, offer, promise or give to any of the Principal/Owner's employees involved in the Tender process or execution of the Contract or to any third person any material or other benefit which he/she is not legally entitled to, in order to obtain in exchange any advantage of any kind whatsoever during the Tender process or during the execution of the Contract.
 - **2.2.** The Bidder(s)/Contractor(s) will not enter with other Bidder(s) into any undisclosed agreement or understanding, whether formal or informal. This applies in particular to prices, specifications, certifications, subsidiary contracts, submission or non-submission of bids or any other actions to restrict competitiveness or to cartelize in the bidding process.
 - **2.3.** The Bidder(s) / Contractor(s) will not commit any offence under the relevant IPC/PoC Act. Further the Bidder(s) / Contractor(s) will not use improperly, (for the purpose of competition or personal gain), or pass on to others, any information or documents provided by the
- C.....Nil Prindipalv/I Owner as part of the business relationship, regarding plans, technical proposals and business details, including information contained or transmitted electronically.
- **2.4.** The Bidder(s) / Contractor(s) of foreign origin shall disclose the names and addresses of D'Man A.E.E / E.E.



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agents / representatives in India, if any. Similarly Bidder(s) / Contractor(s) of Indian Nationality shall disclose names and addresses of foreign agents/representatives, if any. Either the Indian agent on behalf of the foreign principal or the foreign principal directly could bid in a tender but not both. Further, in cases where an agent participate in a tender on behalf of one manufacturer, he shall not be allowed to quote on behalf of another manufacturer along with the first manufacturer in a subsequent/parallel tender for the same item.

- **2.5.** The Bidder(s)/Contractor(s) will, when presenting his bid, disclose any and all payments he has made, is committed to or intends to make to agents, brokers or any other intermediaries in connection with the award of the Contract.
- **3.** The Bidder(s)/Contractor(s) will not instigate third persons to commit offences outlined above or be an accessory to such offences.
- 4. The Bidder(s)/Contractor(s) will not, directly or through any other person or firm indulge in fraudulent practices means a wilful misrepresentation or omission of facts or submission of fake/forged documents in order to induce public official to act in reliance thereof, with the purpose of obtaining unjust advantage by or causing damage to justified interest of others and/or to influence the procurement process to the detriment of the Government interests.
- 5. The Bidder(s)/Contractor(s) will not, directly or through any other person or firm use Coercive Practices (means the act of obtaining something, compelling an action or influencing a decision through intimidation, threat or the use of force directly or indirectly, where potential or actual injury may befall upon a person, his/ her reputation or property to influence their participation in the tendering process).

ARTICLE 3: CONSEQUENCES OF BREACH

Without prejudice to any rights that may be available to the Principal /Owner under law or the Contract or its established policies and laid down procedures, the Principal/Owner shall have the following rights in case of breach of this Integrity Pact by the Bidder(s)/Contractor(s) and the Bidder/ Contractor accepts and undertakes to respect and uphold the Principal/Owner's absolute right:

- 1. If the Bidder(s)/Contractor(s), either before award or during execution of Contract has committed a transgression through a violation of Article 2 above or in any other form, such as to put his reliability or credibility in question, the Principal/Owner after giving 14 days' notice to the contractor shall have powers to disqualify the Bidder(s)/Contractor(s) from the Tender process or terminate/determine the Contract, if already executed or exclude the Bidder/Contractor from future contract award processes. The imposition and duration of the exclusion will be determined by the severity of transgression and determined by the Principal/Owner. Such exclusion may be forever or for a limited period as decided by the Principal/Owner.
- 2. Forfeiture of EMD/Performance Guarantee/Security Deposit: If the Principal/Owner has disqualified the Bidder(s) from the Tender process prior to the award of the Contract or terminated/determined the Contract or has accrued the right to terminate/determine the Contract according to Article 3(1), the Principal/Owner apart from exercising any legal rights that may have accrued to the Principal/Owner, may in its considered opinion forfeit the entire amount of Earnest Money Deposit, Performance Guarantee and Security Deposit of the Bidder/Contractor.
- **3. Criminal Liability**: If the Principal/Owner obtains knowledge of conduct a Bidder or Contractor, or of an employee or a representative or an associate of a Bidder or Contractor which constitutes corruption within the meaning of IPC Act, or if the Principal / Owner has substantive suspicion in this regard, the Principal/Owner will inform the same to law enforcing agencies for further investigation.

ARTICLE 4: PREVIOUS TRANSGRESSION

- 1. The Bidder declares that no previous transgressions occurred in the last 5 years with any other Company in any country confirming to the anticorruption approach or with Central Government or State Government or any other Central/State Public Sector Enterprises in India that could
- C....justify hislex dusion from the Tender process.

2. If the Bidder makes incorrect statement on this subject, he can be disqualified from the Tender process or action can be taken for banning of business dealings/ holiday listing of the D'Man



Bidder/Contractor as deemed fit by the Principal/ Owner.

3. If the Bidder/Contractor can prove that he has resorted / recouped the damage caused by him and has installed a suitable corruption prevention system, the Principal/Owner may, at its own discretion, revoke the exclusion prematurely.

ARTICLE 5: EQUAL TREATMENT OF ALL BIDDERS/CONTRACTORS/SUBCONTRACTORS

- 1. The Bidder(s)/Contractor(s) undertake(s) to demand from all subcontractors a commitment in conformity with this Integrity Pact. The Bidder/Contractor shall be responsible for any violation(s) of the principles laid down in this agreement/Pact by any of its Sub-contractors/sub-vendors.
- 2. The Principal/Owner will enter into Pacts on identical terms as this one with all Bidders and Contractors.
- **3.** The Principal/Owner will disqualify Bidders, who do not submit, the duly signed Pact between the Principal/Owner and the bidder, along with the Tender or violate its provisions at any stage of the Tender process, from the Tender process.

ARTICLE 6: DURATION OF THE PACT

- 1. This Pact begins when both the parties have legally signed it. It expires for the Contractor/Vendor 6 months after the completion of work under the contract or till the continuation of defect liability period, whichever is more and for all other bidders, till the Contract has been awarded.
- 2. If any claim is made/lodged during the time, the same shall be binding and continue to be valid despite the lapse of this Pacts as specified above, unless it is discharged/determined by the Competent Authority of IITDelhi.

ARTICLE 7: OTHER PROVISIONS

- 1. This Pact is subject to Indian Law, place of performance and jurisdiction is the Head Quarters of the Division of the Principal/Owner, who has floated the Tender.
- 2. Changes and supplements need to be made in writing. Side agreements have not been made.
- **3.** If the Contractor is a partnership or a consortium, this Pact must be signed by all the partners or by one or more partner holding power of attorney signed by all partners and consortium members. In case of a Company, the Pact must be signed by a representative duly authorized by Board Resolution.
- 4. Should one or several provisions of this Pact turn out to be invalid; the remainder of this Pact remains valid. In this case, the parties will strive to come to an agreement to their original intensions.
- 5. It is agreed term and condition that any dispute or difference arising between the parties with regard to the terms of this Integrity Agreement / Pact, any action taken by the Owner/Principal in accordance with this Integrity Agreement/ Pact or interpretation thereof shall not be subject to arbitration.

ARTICLE 8: LEGAL AND PRIOR RIGHTS

 All rights and remedies of the parties hereto shall be in addition to all the other legal rights and remedies belonging to such parties under the Contract and/or law and the same shall be deemed to be cumulative and not alternative to such legal rights and remedies aforesaid. For the sake of brevity, both the Parties agree that this Integrity Pact will have precedence over the Tender/Contact documents with regard any of the provisions covered under this Integrity Pact.

IN WITNESS WHEREOF the parties have signed and executed this Integrity Pact at the place and date first above mentioned in the presence of following witnesses:

C....NilJ....Nil......O..... (For and on behalf of Principal / Owner)



(For and on behalf of Bidder / Contractor)

WITNESSES:

1.

(signature, name and address)

2.(signature, name and address)

Place:

Dated :

C.....Nil I.....Nil O.....



INDIAN INSTITUTE OF TECHNOLOGY DELHI HAUZ KHAS, NEW DELHI - 110016

Percentage Rate Tender / Item Rate Tender & Contract for Works

Tender for the work of "Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi."

- 1. To be submitted online by Upto 3 PM of 26-10-2020
- 2. To be opened on 27-10-2020 at 15:00 PM online

e-TENDER

I / We have read and examined the Notice Inviting Tender, schedule, A, B, C, D, E & F, Specifications applicable, Drawings & Designs, General Rules and Directions, Conditions of Contract, Clauses of Contract, Special conditions, Schedule of Rate & other documents and Rules referred to in the conditions of contract and all other contents in the tender document for the work.

I / We hereby tender for the execution of the work specified for the Board of Governors, IIT Delhi within the time specified in Schedule 'F' viz., schedule of quantities and in accordance in all respect with the specifications, designs, drawing and instructions in writing referred to in Rule-1 of General Rules and Directions and in Clause 11 of the Conditions of contract and with such materials as are provided for, by, and in respect of accordance with, such conditions so far as applicable.

We agree to keep the tender open for ninety (90) days from the due date of its opening / ninety days from the date of opening of financial bid in case tenders are invited on 2/3 envelop system (**strike out as the case may be**) and not to make any modification in its terms and conditions.

A sum of ₹68,530.00 is hereby deposited in IIT Delhi Revenue Account No. 10773572622 or in the form of Banker's Cheque or Demand Draft or FDR of scheduled bank in favour of Registrar, IIT Delhi(scanned copy of the same to be uploaded with the bid, date of issue is within the NIT period) as earnest money (strike out which is not applicable). If I / We, fail to furnish the prescribed performance guarantee within prescribed period I / We agree that the said The Board of Governors, IIT Delhi, Hauz Khas, New Delhi - 16 or his successors, in office shall without prejudice to any other right or remedy, be at liberty to forfeit the said earnest money absolutely. Further, if I / We fail to commence the work as specified, I / We agree that The Board of Governors, IIT Delhi, Hauz Khas, New Delhi - 16 or the successors in office shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the said earnest money and the performance guarantee absolutely, otherwise the said earnest money shall be retained by him towards security deposit to execute all the works referred to in the tender documents upon the terms and conditions contained or referred to those in excess of that limit at the rates to be determined in accordance with the provision contained in Clause 12.2 and 12.3 of the tender form. Further, I / We agree that in case of forfeiture of Earnest Money & Performance Guarantee as aforesaid I / We shall be debarred for participation in the re-tendering process of the work.

I / We undertake and confirm that eligible similar work(s) has/have not been got executed through another contractor on back to back basis. Further that, if such a violation comes to the notice of Department, then I / We shall be debarred for tendering in IIT Delhi in future forever. Also, if such a violation comes to the notice of Department before date of start of work, the Engineer-in-Charge shall be free to forfeit the entire amount of Earnest Money Deposit/Performance Guarantee.

I / We hereby declare that I / We shall treat the tender documents drawings and other crecords connected with the₀work as secret/confidential documents and shall not communicate information/derived there from to any person other than a person to whom I / We am/are authorized to communicate the same or use the information in any manner prejudicial to the safety D'Man A.E.E / E.E.



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Signature of Contractor

Witness:

Dated:

Postal Address

Address:

Occupation:

ACCEPTANCE

The above tender (as modified by you as provided in the letters mentioned hereunder) is accepted by me for an on behalf of The Board of Governors, IIT Delhi, Hauz Khas, New Delhi -110016 for sum of а (Rupees.....). The letters referred to below shall form part of this contract agreement: -

- (a)
- (b)
- (c)

For & on behalf of Board of Governors, IIT Delhi

Signature

Dated:

Designation **PROFORMA OF SCHEDULES**

SCHEDULE "A"

Schedule of Quantities (enclosed)

SCHEDULE "B"

Schedule of materials to be issued to the contractor

Sr. No.	Description of item	Quantity	Rates in figures & words at which the materials will be charged from the	Place of issue
CNil	I Nil	o	contractor	
(1)	(2)	(3)	(4)	(5)
	NIL			
D'Man			1	E E



SCHEDULE "C"

Tools and Plants to be hired to the contractor

Sr. No.	Description	Hire charges per day	Place of issue
(1)	(2)	(3)	(4)
	NIL		

SCHEDULE "D"

Extra schedule for specific requirements / documents for the work, if any.



SCHEDULE "E"

Reference to General Conditions of Contract

1	Name of work	:	Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.
2	Estimated cost of work (₹)	:	34,26,480.00
3	Earnest Money (₹)	:	68,530.00
4	Performance Guarantee	:	5 percent of tendered value
5	Security Deposit	:	5 percent of tendered value

SCHEDULE "F"

GENERAL RULES & DIRECTIONS:

Officer inviting tender	:	Executive Engineer (E)
Maximum percentage for quantity of items of work to be executed beyond which rates are to be determined in accordance with Clauses 12.2 & 12.3	:	See below

DEFINITIONS:

2 (V)	Engineer-in-charge	•••	Executive Engineer (E)
2 (viii)	Accepting authority	•••	Executive Engineer (E)
2 (x)	Percentage on cost of materials	•••	15 percent
	and labour to cover all overheads		
	and profits		
2 (xi)	Standard Schedule of Rates	•••	Market, DSR 2019
2 (xii)	Department	:	Estate & Works, IIT Delhi
9 (ii)	Standard IITD Contract Form	:	IITD Form 7 / 8 as modified and
. ,			corrected upto date

C.....Nil I.....Nil O.....



E.E.

		: age eej
i)	Time allowed for submission of Performance Guarantee from the date of issue of letter of acceptance	 15 days
ii)	Maximum allowable extension beyond the period provided in (i) above with late fees @0.1% per day of performance guarantee	10 days

CLAUSE 2

(i)	Authority for fixing compensation	:	Institute Engineer
	under Clause 2		

CLAUSE 2A

(i)	Whether	Clause	2A	shall	be	:	No
	applicable						

CLAUSE 5

(i)	Number of days from the date of	:	10 days
	issue of letter of acceptance for		
	reckoning date of start		

TABLE OF MILE STONE(S):

Sr. No.	Description of Milestone (physical)	Time allowed in days (from date of start)	Amount to be with-held in case of non- achievement of milestone
(1)	(2)	(3)	(4)
	NOT SPECIFIED		

Time allowed for execution of work : 12 months

Authority to	Extension of time	:	Engineer-in-charge
decide:	Rescheduling of milestones	:	Institute Engineer

CLAUSE 6, 6A

Clause applicable – (6 or 6A)	: 6 A
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CLAUSE 7

Gross work to be done together with net payment /	:	
adjustment of advances for materials collected, if any, since		Not Applicable
the last such payment for being eligible to interim payment		

CLAUSE 10ANil O.....

List of testing equipment to be provided by the contractor at site lab

)				Page 24 of
1	NIL	2	NIL	3	NIL
4	NIL	5	NIL	6	NIL

CLAUSE 10B (ii)

Whether Clause 10 B (ii) shall be applicable (Yes /	:	No
No)		

CLAUSE 10 C

Component of labour expressed as percent of value of	:	15 Percent
work		

CLAUSE 10 CA

Materials covered under this clause	Nearest materials (other than cement, reinforcement bars & structural steel) for which All India Wholesale Price index to be followed	materials covered
1 NIL		
2 NIL		
3 NIL		
4 NIL		
*hann price of all m	atorials covered under clause 10 CA is to	he mentioned at the

*base price of all materials covered under clause 10 CA is to be mentioned at the time of approval of NIT

CLAUSE 10CC(Not Applicable)

Clause 10 CC to be applicable in contracts with stipulated period of completion exceeding the period shown in next column	:	NIL
Schedule of component of other Materials, Labour, P.O.L. etc. for price escalation.		
Component of Civil (except materials covered under clause 10 CA) / Electrical construction materials - expressed as percent of total value of work	:	X _m = percent
Component of labour - expressed as percent of total value of work	:	Y = percent
Component of P.O.L. – expressed as percent of total value of work	:	Z= percent

CLAUSE 11

Specification to be execution of work	followed	for			Specifications Workwith other		
			as amended upto date				•

CLAUSE 12

12.2& 12.3	Deviation limit beyond which clauses 12.2 & 12.3 shall apply for building work	:	50%
12.3 A	Type of work	:	Maintenance works including works of up-gradation, aesthetic, special repair,



			addition / alteration
12.5	Deviation limit beyond which clauses 12.2 & 12.3 shall apply for foundation work	:	50%

CLAUSE 16

Competent authority for deciding reduced rates	: Executive Engineer	
--	----------------------	--

CLAUSE 18

	List of mandatory machine	ery,	tools & plants to be deploye	ed b	by the contractor at site
1	NIL	2	NIL	3	NIL
4	NIL	5	NIL	6	NIL

CLAUSE 36 (i)

Requirement of Technical Representative (s) and recovery rate

Sr. No.	Minimum qualification of Technical Representative	Discipline	Designation Principal Technical / Technical representative)	Minimum experience	Number	shall be m contractor i not fulfilling	ich recovery ade from the n the event of g provision of e 36 (i)
			1)			Figures	Words
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)
1	Graduate or	Electrical / Mechanical	Site Engineer	2 years for	1	₹15000 per month	Fifteen thousand only
	Diploma	mechanica	Ligilleei	Graduate		month	per month
	Engineer			& 5			
				years for Diploma			

Assistant Engineers retired from Govt. / IIT Delhi services that are holding Diploma will be treated at par with Graduate Engineers.

C.....Nil I.....Nil O.....



INVENTORY DETAILS

S.No.	Name of Equipment	Motor (KW) 3 Phase	Motor Current (Amp.)	Blower Air Quantity (CFM)	Filter Suction Area (Sq. Ft.)	Room no. & Area Served by AHU	Motor capacity Supply + Fresh air in (HP)	Make
			Mezz	anine Floor			m (m)	
1	AHU-MZ-1, LH-204	2.2	4.2	4600	14.4	Lab., LH-202 & 203	3 + 1.5	Siemer
2	AHU-MZ-2, LH-201	2.2	4.2	5000	13.2		3+1	Siemer
3	AHU-GF-1, LH-208	5.5	10	11000	29.6	LH-108 (300 seater)		Siemer
4	AHU-GF-2, LH-208	3.7	7.3	5500	14.9		5+1	Siemer
5	AHU-GF-3, LH-210	3.7	7.6	5500	14.9	LH-111 (300 seater)	5+1	Siemer
6	AHU-GF-4, LH-211	5.5	10	11000	29.6	LH-114 (300 seater)	7.5 +1	Siemer
7	AHU-GF-5, LH-221	5.5	10	10000	21.4	LH-121 (500 seater)	-	Siemer
8	AHU-GF-6, LH-218	5.5	10	10000	21.4	(*********		Siemer
9	AHU-GF-7, LH-214A	1.5	3	2500	8.3	LH-212 seater& LH-		Siemer
10	AHU-GF-8, LH-214B	1.5	3	2500	8.3	213 (60 seater)	2 + 1	Siemer
r		1	F	First Floor	0	1	T	T
11	AHU- FF-1, LH-303	3.7	7.6	9000	21.6	LH-302(Physics Lab.)	5 + 1	Siemer
12	AHU- FF-2, LH-307	2.2	4.2	4800	11.9	LH-308 (150 Seater)	3 +	Siemer
13 14	AHU- FF-3, LH-309	2.2	4.2	4800	11.9	LH-310 (150 Seater) LH-316 (150	3 + 1	Siemer
14	AHU- FF-4 , LH-315	2.2	4.2	4800	11.9	Seater)	3 + 1	Siemer
10	AHU- FF-5 , LH-319	2.2	4.2	4800	11.9	Seater)	3+1	Siemer
	,		Sec	ond Floor		, ,		
16	AHU- SF-1 , LH-403	5.5	10	10500	21.9	LH-401 & LH-402 (Elec.Lab)	7.5 + 1	Siemei
17 18	AHU- SF-2 , LH-407	2.2	4.2	4800	11.9	LH-408(150 Seater) LH-410(150	3 + 1	Siemei
10	AHU- SF-3 , LH-409	2.2	4.2	4800	11.9	Seater)	3 + 1	Siemer
20	AHU- SF-4 , LH-417	2.2	4.2	4800	11.9	Seater) LH-418(150	3+1	Siemer
	AHU- SF-5, LH-419	2.2	4.2	4800	11.9	Seater)	3 + 1	Siemer
21	AHU- FF-6 , LH-428	3.7	7.6	9000	21.6	LH-325(500	5 + 1	Siemer
22	AHU- FF-7 , LH-427	3.7	7.6	9000	21.6	Seater)	5 + 1	Siemei
23	AHU-SF-6,LH-423A	1.5	3	2500	8.3	LH-421 LH-422	2 + 1	Siemer
24	AHU-SF-7,LH-423B	1.5	3	2500	8.3	(Conf. Room)	2 + 1	Siemer
			T	hird Floor				
25	AHU- TF-1 , LH-506	5.5	10	10500	21.9	LH-503,504 & 505Comp.Lab.	7.5 + 1	Sieme
	ahu- t <u>i⊧-</u> 2 _N µH-511	0 2.2	4.2	4800	11.9	LH-510(150 Seater)	3 + 1	Siemei
27	AHU- TF-3 , LH-513	2.2	4.2	4800	11.9	LH-512(150	3 + 1	Siemer

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						Seater)		
28	AHU- TF-4 , LH-522					LH-520(30 S) LH-		
		2.2	4.2	4800	11.9	521(60) seat	3 + 1	Siemens
29	AHU- TF-5 , LH-516					LH-517,519 (60		
		5.5	10	10000	21.4	seat) 518(30 S)	7.5 + 1	Siemens
30						LH-526(150		
	AHU- TF-6, LH-527	2.2	4.2	4800	11.9	Seater)	3 + 1	Siemens
31	AHU- TF-7 , LH-528	2.2	4.2	4800	11.9	LH-527(150 Seater)	3 + 1	Siemens
32						LH-538 (Graphics		
	AHU- TF-8 , LH-539	5.5	10	10000	21.4	Lab.)	5 + 1	Siemens
33						LH-535 (Language		
	AHU- TF-9 , LH-533	3.7	7.6	8500	17.8	Lab.)	5 + 1	Siemens
			Fo	ourth Floor				
34	AHU- FH-1 , LH-607					LH-605 (30 S),		
						LH-606(60)		<u>.</u>
0.5		2.2	4.2	4800	11.9	Seat	3 + 1	Siemens
35	AHU- FH-2 , LH-601	5.5	10	10000	21.4	LH-602,604(60	75+1	Siemens
36	AHU- FH-3 , LH-610	5.5	10	10000	21.4	S),LH-603(30 S) LH-611,613(60	7.5 + 1	Siemens
50	AII0-111-3, LI1-010	5.5	10	10000	21.4	S),LH-612(30 S)	7.5 + 1	Siemens
37	AHU- FH-4 , LH-616	0.0	10	10000	21.1	LH-614(30		
01						S),LH-615(60)		
		2.2	4.2	4800	11.9	Seat	3 + 1	Siemens
38	AHU- FH-5 , LH-624					LH-622(30		
						S),LH-623(60)		
		2.2	4.2	4800	11.9	Seat	3 + 1	Siemens
39	AHU- FH-6 , LH-625		40	40000		LH-619,621(60		<u>.</u> .
10		5.5	10	10000	21.4	S),LH-620(30 S)	7.5 + 1	Siemens
40	AHU-TF-10, LH-602		4.0	2000	11.0	LH-502	2.1	Ciamaaraa
		2.2	4.2	3600	11.6	(Computer Lab.)	3 + 1	Siemens

C.....Nil I.....Nil O.....



Ventilation Fans (Normal & Smoke Exhaust Fans)

S. No.	Fan Description	Fan Ref.	Fan Capacity	Motor kw	Location	HP	MAKE
			Basement (Block			00115	
1	Exhaust Air Fan	In case of Fire	34300 CFM	15 KW	Zone1, C Block	20HP	ABB
2	Centrifugal Ex. Air Unit	Normal case	34300 CFM	15 KW	Zone1, C Block	20HP	ABB
3	Centrifugal Ex. Air Unit	Normal case	34300 CFM	15 KW	Zone1, C Block	20HP	ABB
4	Exhaust Air Fan	In case of Fire	34300 CFM	15 KW	Zone1, C Block	20HP	ABB
5	Centrifugal Ex. Air Unit	Normal case	8600 CFM	2.2 KW	A-Block	3 HP	ABB
6	Centrifugal Ex. Air Unit	Normal case	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
7	Centrifugal Ex. Air Unit	Normal case	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
8	Exhaust Air Fan	In case of Fire	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
9	Exhaust Air Fan	In case of Fire	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
10	Centrifugal Ex. Air Unit	Normal case	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
11	Centrifugal Ex. Air Unit	Normal case	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
12	Exhaust Air Fan	In case of Fire	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
13	Exhaust Air Fan	In case of Fire	2200 CFM	11 KW	Zone4, D Block	15 HP	ABB
			Basement (Bloc	.k - B)		1	1
14	Fresh Air Fan	In case of Fire	27200 CFM	15 KW	Zone2, B1 Block	20HP	ABB
15	Fresh Air Fan	In case of Fire	27200 CFM	15 KW	Zone2, B1 Block	20HP	ABB
16	Centrifugal Fr. Air Unit	Normal case	27200 CFM	15 KW	B1 Block	20HP	ABB
17	Centrifugal Fr. Air Unit	Normal case	27200 CFM	15 KW	B1 Block	20HP	ABB
18	Exhaust Air Fan	In case of Fire	27200 CFM	15 KW	B2 Block	20HP	ABB
19	Exhaust Air Fan	In case of Fire	27200 CFM	15 KW	B2 Block	20HP	ABB
20	Centrifugal Ex. Air Unit	Normal case	27200 CFM	15 KW	Zone2, B2 Block	20HP	ABB
21	Centrifugal Ex. Air Unit	Normal case	27200 CFM	15 KW	Zone2, B2 Block	20HP	ABB
22	Exhaust Air Fan	In case of Fire	29200 CFM	15 KW	B2 Block	20HP	ABB
23	Exhaust Air Fan	In case of Fire	29200 CFM	15 KW	B2 Block	20HP	ABB
24	Centrifugal Ex. Air Unit	Normal case	29200 CFM	15 KW	Zone3, B2 Block	20HP	ABB
25	Centrifugal Ex. Air Unit	Normal case	29200 CFM	15 KW	Zone3, B2 Block	20HP	ABB
			Basement (Bloc				
26	Fresh Air Fan	In case of Fire	29200 CFM	15 KW	Zone3 B3 Block	20HP	ABB
27	Fresh Air Fan	In case of Fire	29200 CFM	15 KW	Zone3, B3 Block	20HP	ABB
28	Centrifugal Fr. Air Unit	Normal case	29200 CFM	15 KW	Zone3, B3 Block	20HP	ABB
29	Centrifugal Fr. Air Unit	Normal case	29200 CFM	15 KW	Zone3, B3 Block	20HP	ABB
30	Exhaust Air Fan	In case of Fire	11000 CFM	4 KW	Plant Room	5.5 HP	ABB
31	Exhaust Air Fan	In case of Fire	11000 CFM	4 KW	Plant Room	5.5 HP	ABB
32 Ni	_I Fresh Air Fan _{ull}	Normal case	11000 CFM	4 KW	Plant Room	5.5 HP	ABB
33	Fresh Air Fan	In case of Fire	11000 CFM	4 KW	Plant Room	5.5 HP	ABB
	-		ezzanine Floor (Bl			•	•
Sathan	Exhaust Air Fan	Free Cooling	460g GFM	1.1 KŴ	AHU-MZ1, C	1.5 HP	KRUGE

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25	Exhaust Air Ean	Free Cooling	5000 OFM		Block	200	
35	Exhaust Air Fan	Free Cooling	5000 CFM	1.5 KW	AHU-MZ2, C Block	2HP	HAVELLS
36	Exhaust Air Fan	In case of Fire	26600 CFM	11 KW	B1 Block	15 HP	ABB
37	Fresh Air Fan	In case of Fire	26600 CFM	11 KW	B1Block	15 HP	ABB
38	Exhaust Air Fan	Free Cooling	11000 CFM	4 KW	AHU-GF-1	5.5 HP	ABB
39	Exhaust Air Fan	Free Cooling	5500 CFM	1.1 KW	AHU-GF-2	1.5 HP	KRUGER
40	Exhaust Air Fan	In case of Fire	26600 CFM	11 KW	B2 Block	15 HP	ABB
41	Fresh Air Fan	In case of Fire	26600 CFM	11 KW	B2 Block	15 HP	ABB
42	Exhaust Air Fan	Free Cooling	5500 CFM	1.1 KW	AHU-GF-3	1.5 HP	KRUGER
43	Exhaust Air Fan	Free Cooling	1100 CFM	3.7 KW	AHU-GF-4	5 HP	ABB
44	Exhaust Air Fan	In case of Fire	26600 CFM	11 KW	B3 Block	15 HP	ABB
45	Fresh Air Fan	In case of Fire	26600 CFM	11 KW	B3 Block	15 HP	ABB
		Mezzanine Floor					
46	Exhaust Air Fan	Free Cooling	11000 CFM	2.2 KW	AHU-GF-5	3 HP	ABB
47	Fresh Air Fan	In case of Fire	18600 CFM	5.5 KW	Audi-1 Block	7.5 HP	ABB
48	Fresh Air Fan	In case of Fire	18600 CFM	5.5 KW	Audi-1 Block	7.5 HP	ABB
49	Exhaust Air Fan	Free Cooling	10000 CFM	3.7 KW	AHU-GF-6	5HP	ABB
50	Exhaust Air Fan	In case of Fire	18600 CFM	5.5 KW	Audi-1 Block	7.5 HP	ABB
51	Exhaust Air Fan	In case of Fire	18600 CFM	5.5 KW	Audi-1 Block	7.5 HP	ABB
		First Floor (Blo					
52	Exhaust Air Fan	Free Cooling	9000 CFM	2.2 KW	AHU-FF-1, C Block	3 HP	ABB
53	Hall-2 Exhaust Air Fan	In case of Fire	6200 CFM	2.2 KW	LH-310, B Block	3 HP	ABB
54	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW		1.5 HP	KRUGEF
55	Exhaust Air Fan	In case of Fire	6200 CFM	2.2 KW	LH-308	3 HP	ABB
56	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW		1.5 HP	KRUGEF
57	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	AHU-FF-2,		
					LH-307	1.5 HP	KRUGER
58	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	AHU-FF-2,	4 5 4 10	
-0				4.4.1014	LH-309	1.5 HP	KRUGER
59	Fresh Air Fan	Free Cooling	4800 CFM	1.1 KW	AHU-FF-4,	1.5 HP	KRUGER
60	Exhaust Air Fan	In case of Fire	6200 CFM	3 KW	LH-316, B3 Block	4 HP	ABB
61	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW	AHU-FF-5	1.5 HP	KRUGER
62	Exhaust Air Fan	Free Cooling	6200 CFM	3 KW	LH-318	4 HP	ABB
63	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	AHU-FF-4	1.5 HP	KRUGER
64	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	AHU-FF-5	1.5 HP	KRUGER
04			Second Floor (Blo		AI10-I I -5	1.3 HP	KRUGER
65	Hall-1 Exhaust Air Fan	In case of Fire	6200 CFM	1.5 KW	LH-408, B		
00	TIGHT LAHOUSLAH FAH	III CASE UI FILE		1.5 1.17	Block	2 HP	HAVELLS
66	Hall-1 Exhaust Air Fan	Free Cooling	4800 CFM	1.5 KW	AHU- SF2,	2 HP	HAVELLS
67	Hall-2 Exhaust Air Fan	In case of Fire	6200 CFM	1.5 KW	LH-410, B	- ' ' '	
5.					Block	2 HP	HAVELLS
68	Hall-2 Exhaust Air Fan	Free Cooling	4800 CFM	1.5 KW	AHU- SF3,	2 HP	HAVELLS
69	Fresh Air Fan	In case of Fire	6200 CFM	1.5 KW	AHU- SF3,	2 HP	HAVELLS
70	Fresh Air Fan	In case of Fire	6200 CFM	1.5 KW	AHU- SF3,	2 HP	HAVELL
71	Exhaust Air Fan	Free Cooling	4800 CFM	1.5 KW	AHU-SF4, LH-	<u> </u>	
		J		1.5 KW	417 LH-416, B3	2 HP	HAVELLS
72	Exhaust Air Fan	In case of Fire	6200 CFM		Block	2 HP	HAVELLS
73	Exhaust Air Fan	Free Cooling	4800 CFM	1.5 KW	AHU-SF-5,	2 HP	HAVELLS
74	Exhaust Air Fan	In case of Fire	6200 CFM	1.5 KW	LH-418, B3 Block	2 HP	HAVELLS
75	Fresh Air Fan	In case of Fire	6200 CFM	1.5 KW	AHU- SF4,	2 HP	HAVELLS
76	Fresh Air Fan	In case of Fire	6200 CFM	1.5 KW	AHU- SF5,	2 HP	HAVELLS
	- -		cond Floor (Bloc		,		
77	Exhaust Air Fan I I Nil	Free Cooling O	10500 CFM	3.7 KW	AHU-SF1, C-	5HP	ABB
CN	I I Nil	0 0			Block		
78	Exhaust Air Fan	Free Cooling	9000 CFM	3.7 KW	AHU-SF6, C-	5HP	ABB



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79	Fresh Air Fan	In case of Fire	22750 CFM	7.5 KW	D- Block	10 HP	Page 30 of ABB
80	Fresh Air Fan	In case of Fire	22750 CFM	7.5 KW	D- Block	10 HP	ABB
81	Exhaust Air Fan	Free Cooling	9000 CFM	7.5 KW	AHU-SF7, LH- 427	10 HP	ABB
82	Exhaust Air Fan	In case of Fire	22750 CFM	7.5 KW	LH-420, D- Block	10 HP	ABB
83	Exhaust Air Fan	In case of Fire	22750 CFM	7.5 KW	LH-420, D- Block	10 HP	ABB
84	Exhaust Air Fan	Free Cooling	2500 CFM	1.1 KW	AHU-SF8, LH- 421	1.5 HP	KRUGER
85	Exhaust Air Fan	Free Cooling	2500 CFM	1.1 KW	AHU-SF8, LH- 421	1.5 HP	KRUGER
			hird Floor (Block-				
86	Exhaust Air Fan	Free Cooling	10000 CFM	3.7 KW	D-Block	5HP	ABB
87	Exhaust Air Fan	Free Cooling	8500 CFM	2.2 KW	AHU-TF9, D Block	3 HP	ABB
88	Hall-1 Exhaust Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-510, B Block	1.5 HP	KRUGER
89	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW	AHU-TF3, LH- 511	1.5 HP	KRUGER
90	Hall-2 Exhaust Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-512	1.5 HP	KRUGER
91	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW	AHU-TF4, LH- 513	1.5 HP	KRUGER
92	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	AHU-TF3, LH- 511	1.5 HP	KRUGER
93	Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-513	1.5 HP	KRUGER
04			Third Floor (Block				
94	Hall-1 Exhaust Air Fan	Free Cooling	5000 CFM	1.1 KW	LH-516	1.5 HP	KRUGER
95	Exhaust Air Fan	In case of Fire	2709 CFM	1.1 KW	LH-517	1.5 HP	KRUGER
96 97	Exhaust Air Fan	In case of Fire	2709 CFM 5000 CFM	1.1 KW	LH-519 LH-516	1.5 HP	KRUGER
97 98	Hall-2 Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW		1.5 HP	KRUGER
90 99	Hall-3 Exhaust Air Fan Exhaust Air Fan	Free Cooling In case of Fire	3236 CFM	1.1 KW 1.1 KW	TF-7, LH-522 LH-521	1.5 HP 1.5 HP	KRUGER KRUGER
100	Hall-1 Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-521	1.5 HP 1.5 HP	KRUGER
100	Hall-1 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-517	1.5 HP	KRUGER
102	Hall-2 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-519	1.5 HP	KRUGER
102	Hall-3 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-520	1.5 HP	KRUGER
103	Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-520	1.5 HP	KRUGER
104		Third Floor (B		1.1 1.1	LIT-520	1.5 HF	KNOGEN
105	Hall-1 Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW		1.5 HP	KRUGER
106	Hall-1 Exhaust Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-526	1.5 HP	KRUGER
107	Hall-2 Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW	LH-527	1.5 HP	KRUGER
108	Hall-2 Exhaust Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-527	1.5 HP	KRUGER
109	Hall-2 Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-526	1.5 HP	KRUGER
110	Hall-1 Fresh Air Fan	In case of Fire	6200 CFM	1.1 KW	LH-526	1.5 HP	KRUGER
111	Exhaust Air Fan	Free Cooling	10500 CFM	3.7 KW	TF-1, C-Block	1.5 HP	KRUGER
112	Fresh Air Fan	In case of Fire	4650 CFM	1.1 KW		1.5 HP	KRUGER
113	Exhaust Air Fan	In case of Fire	4650 CFM	1.1 KW		1.5 HP	KRUGER
		Fourth Floor	(Block-B1)				
114	Hall-1 Exhaust Air Fan	Free Cooling	5000 CFM	1.5 KW	AHU-FF2	2 HP	HAVELLS
115	Hall-2 Exhaust Air Fan	Free Cooling	5000 CFM	1.5 KW	AHU-FF3	2 HP	HAVELLS
116	Hall-1 Exhaust Air Fan	In case of Fire	2709 CFM	1.1 KW	LH-602	1.5 HP	KRUGER
117	Hall-1 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-602	1.5 HP	KRUGER
118	Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-603	1.5 HP	KRUGER
119	Hall-2 Exhaust Air Fan	In case of Fire	2709 CFM	1.1 KW	LH-604	1.5 HP	KRUGER
120	Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-604	1.5 HP	KRUGER
	I Fresh Air.FanNil	In case of Fire	2181 CFM	1.1 KW	LH-606	1.5 HP	KRUGER
122	Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-605	1.5 HP	KRUGER

Exhaust Air Fan

1.1 KW

LH-606

1.5 HP

In case of Fire

KRUGER E.E.

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124	Exhaust Air Fan	Free Cooling	4800 CFM	1.1 KW	LH-610	1.5 HP	KRUGER
		Fourth Floor	(Block- B1)				
125	Hall-1 Exhaust Air Fan	Free Cooling	5000 CFM	1.5 KW	AHU-FF4	2 HP	HAVELLS
126	Hall-1 Exhaust Air Fan	In case of Fire	2709 CFM	1.1 KW	LH-619	1.5 HP	KRUGER
127	Hall-1 Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-619	1.5 HP	KRUGER
128	Hall-1 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-619	1.5 HP	KRUGER
129	Hall-2 Exhaust Air Fan	In case of Fire	2709 CFM	1.1 KW	LH-621	1.5 HP	KRUGER
130	Hall-2 Exhaust Air Fan	Free Cooling	5000 CFM	1.5 KW	LH-621	2 HP	HAVELLS
131	Hall-2 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-621	1.5 HP	KRUGER
132	Hall-3 Exhaust Air Fan	Free Cooling	4800 CFM	1.5 KW	LH-621	2 HP	HAVELLS
133	Hall-3 Exhaust Air Fan	In case of Fire	3236 CFM	1.1 KW	LH-623	1.5 HP	KRUGER
134	Hall-3 Fresh Air Fan	In case of Fire	2181 CFM	1.1 KW	LH-623	1.5 HP	KRUGER
135	Hall-3 Fresh Air Fan	In case of Fire	1055 CFM	1.1 KW	LH-622	1.5 HP	KRUGER
		•	PUMPS				
136	Chiller Pump	Primary	1460 RPM				
		Pump		7.5 KW	1	10 HP	ABB
137	Chiller Pump	Primary	1460 RPM		_		
400		Pump	1100 0011	7.5 KW	2	10 HP	ABB
138	Chiller Pump	Primary Pump	1460 RPM	7.5 KW	3	10 HP	ABB
139	Chiller Pump	Secondary	1455 RPM				
140	Chiller Dump	Pump	1455 RPM	18.5 KW	1	25 HP	ABB
140	Chiller Pump	Secondary Pump	1400 RPIVI	18.5 KW	2	25 HP	ABB
141	Chiller Pump	Secondary	1455 RPM	10.3 KW	2	2311	ADD
141		Pump	14551111	18.5 KW	3	25 HP	ABB
142	Condenser Pump	Condenser		10.5 100	5	23111	7,88
		Pump	1470 RPM	30 KW	1	40 HP	ABB
143	Condenser Pump	Condenser					
		Pump	1470 RPM	30 KW	2	40 HP	ABB
144	Condenser Pump	Condenser					
		Pump	1470 RPM	30 KW	3	40 HP	ABB
4.45			Cooling Towe				
145	Cooling Tower	Make BELL	Make BELL	5.5 KW	1	7.5 HP	New India
146	Cooling Tower	Make BELL	Make BELL	5.5 KW	1	7.5 HP	New India
147	Cooling Tower	Make BELL	Make BELL	5.5 KW	2	7.5 HP	New India
148	Cooling Tower	Make BELL	Make BELL	5.5 KW	2	7.5 HP	New India
149	Cooling Tower	Make BELL	Make BELL	5.5 KW	3	7.5 HP	New India
150	Cooling Tower	Make BELL	Make BELL	5.5 KW	3	7.5 HP	New India
454	0.01.11		CHILLER PLAN	IT		075 75	T
151	Screw Chiller	Voltas	EGWFXR3002ML		1	275 TR	Voltas
152	Screw Chiller	Voltas	EGWFXR3002ML		2	275 TR	Voltas
153	Screw Chiller	Voltas	EGWFXR3002ML		3	275 TR	Voltas



1. Under this contract, the contractor shall provide fully comprehensive maintenance service of the Complete AC plant equipment AHUs, ventilation fans cooling tower etc., prescribed in the schedule of items and inventory and will lay emphasis on planned preventive maintenance practices, safety requirements and proper care of machinery & equipment's to achieve proper inside conditions.

2. The work shall be executed as per CPWD General Specifications for HVAC works 2004, CPWD general specifications for electrical works part I, II & IV as amended up to date, relevant IE rules, relevant IS and as per directions Engineer-in-charge.

- a) The plant will be serviced four times in the contract period. One of the service will be rendered positively before the onset of summer (January/February) to ensure trouble free working of the plant during the summer. The next service will be rendered in each quarter after the summer season. Break down calls will be attended to during the contract period immediately.
- b) The compressor will be checked for its proper functioning and if any defect is found, the same will be rectified immediately.
- c) Checking the functioning of Chiller Unit/AHU/Pumps/Cooling Tower /Controls and all such equipment covered under this contract.
- d) Free replacement of defective/worn out parts with new or repairing of parts for compressor/thermostat/cut outs.
- e) Repairing of equipment as prescribed in the schedule of work.
- f) De- scaling of the condenser will be carried out once in a year or as and when required. If the fouling limit exceeds the prescribed limit, the contractor shall carry out cleaning the tubes at his own expense.
- g) Cleaning of evaporator coils/replacement of pre-filters based on assessment as and when required based on working parameters of the plant.
- Rectification of defects immediately if noticed during the preventive maintenance visit of the qualified personnel. The contractor shall include emergency call back service at all hours round the clock.
- Rewinding of all motors of AC installation like compressor motor, condenser & chilled water pump (primary and secondary) motors, CT fan motor, AHU Fan motors and ventilation & smoke exhaust fan motors.
- Replacement of spares of microprocessor unit such as motherboard, micro card, electronic parts & all other parts as required to be replaced to keep of the microprocessor unit in the perfect working orders.
- k) Replacing of the spares parts of all machinery, equipment, electrical panels etc., due to normal wear and tear.
- 3. Following consumable material as and when required shall be supplied free cost by the contractor.
- a) All oils and greases required for lubrication of compressor, fan bearings, motors bearings, pivots and other moving parts.

C.....Nil I.....Nil O.....



- c) Compressor oil once in a year or more as per requirement.
- d) Dryers.
- e) All consumable filter elements/rolls.
- f) All chemicals for the correct chemical treatment of the cooling tower and chilled water system & chemical for de scaling.
- g) All clear material for AC plant room, machinery & equipment.
- h) Gland dori for pump sets.
- i) Any other consumable as may be required to keep the AC plant in perfect working order.
- j) Inspection and maintenance schedule shall be carried out as per Annexure 'A'.
- k) All painting works where ever required.

4. Following are excluded from the scope of work: -

- a) Replacement/modification of electrical cabling, electrical switchboard.
- b) Masonry structure & carpentry work.
- c) False ceiling.
- d) Cooling tower structure fills.
- e) Replacement of sheet metal ducting/grills/diffusers/insulation/piping.
- 5. Log book as per standard Performa will be supplied by the contractor and have to be filed in by the contractor's staff. The log book will be kept in the plant room will be checked by the Engineer-in-charge or his representative. The contractor will have to take action as per direction of Engineer-in-charge or his representative from time to time.
- 6. Contractor shall maintain history cards of each equipment. There will be check list for preventive maintenance to be carried as per attached maintenance schedule. Bidder/OEM
- 7. Shall be proving all the necessary maintenance services and the same shall be recorded in the history cards of the equipment with date. Copy of this history card shall be submitted to Engineer-in- charge for the records.
- 8. No tools and plant (T&P) will be supplied by the Institute.
- 9. Since the plant are catering to the AC requirements of Lecture Hall complex of IIT Delhi, which is a very important building hence the contractor will have to attend any fault/Breakdown immediately, failing which recovery @ Rs.5000/- per compliant/Day shall be made and if the desired staff is not deputed in reasonable time engineer-in-charge will be at liberty to employ staff to get the work done by other agency at the risk and cost of the contractor for which decision of the engineer-in-charge will be final and binding.
- 10. In case of any damage to any machine, equipment and building on account of negligence of contractor's staff, the same will have to be made good promptly at his own cost, & to the entire satisfaction of the engineer-in-charge or his representative failing which, suitable recovery will be made from the contractor's bill.
- 11. The firm has to intimate their contact numbers to lodge the complaints.
- 12. Suitable recovery shall be made from the bill of the contractor for any shortcoming/discrepancy in comprehensive maintenance and operation work and/or non-functioning of AC plant as per client requirement during the contract period.
- 13. For carrying out electrical work, the firm shall have to employ workman/contractor having valid electrical license issue by the competent authority.

C.....Nil I.....Nil O.....



General Terms and Conditions of the contract

- 1. The work shall be carried out as per CPWD general specification of HVAC 2004 with up to date amended and as per direction of Engineer-in-charge.
- 2. The contractor will have to maintain all equipment as per Annexure-A (enclosed) in schedule of work in proper working condition and hand over the same in similar condition at the time of hand over of plant and improvement in plants subsequently carried out by the department from time to time which are not within the scope of the work.
- 3. Log book, cleaning material like broom, soft broom, old dhoti, gland packing, grease, Mobil oil, PVC tape, nut bolts, screws, Teflon tape, PVC tape, GLS lamp, soap & duster etc. will be provided by the firm with in scope of work and nothing extra will be paid on this account.
- 4. The contractor will have to depute the following skilled, experienced, AC&R qualified and electrician shall have electrical license holder staff for operation & maintenance of A.C. plant from 6 AM to 2 PM & 2 PM to 10 PM as per details below:
 - 1. Operator/Mechanic- 1 No. in each shift
 - 2. Helper 1 No. in each shift.

C.....Nil I.....Nil O.....



The contractor will make his own arrangements of all type tools for electrical and mechanical and mechanical and the supplied by the department.

- 6. Water and power will be supplied free of cost for bona-fide use of work only.
- 7. In case, if it is established that any of the spares and materials supplied by the Department i/c refrigerant, gases etc. are misused or have been wasted by the contractor's staff on account of due to their negligence, inefficiency or any other reasons, recovery will be made from the contractor's bill towards the cost of such spares/materials (at the double rate of present market rates). Decision of the Engineer-in-charge will be final and binding on the contractor.
- 8. During the running of the contract, the responsibility of physical custody of the plants and its associated equipment as per Annexure-A will rest on the contractor. If any item missing during the surprise visit of Engineer-in-charge the recovery shall be made from the contractor bill. The decision of Engineer-in-charge shall be final and binding on the contract.
- 9. In case of any damage to any equipment due to negligence of contractor's staff the same will have to be made good by the contractor. Failure to which suitable recovery will be made from the contractor's bills.
- 10. Logbook as per standard Performa will have to be filled in by the contractor's staff. The logbook shall be kept in the plant room, which will be checked by the Engineer-in-charge. The contractor's staff will have to take action as per direction of Engineer-in-charge from time to time. The logbook shall be supplied by the contractor free of cost.
- 11. Earth/Insulation test of all equipment will be carried out quarterly and result recorded in the separate register failing which a recovery of Rs. 1,500/- half yearly will be affected.
- 12. The site (A.C. Plant room, Cooling Tower, AHU's Centrifugal pumps etc.) will have to be kept clean.
- 13. The maintenance work as per maintenance manual of the OEM to be carried to be out in time bound manner for which proper records history cards of each chilling machine. AHU's and other equipment etc. will have to be completed/filled by the contractor's staff.
- 14. After the expiry of the contract, the firm shall have to hand over complete installation to the department in proper working order. However if any repair/ parts is reqd. after defect liability period, the same shall be provided by the department.
- 15. No claim of their employees/ staff employed for subject work in any from shall be entertained by the Institute.
- 16. All installation of Lecture Hall complex of IIT Delhi are in complete operational / Healthy condition shall be handed over to the contractor & it will be his responsibility to keep installation in operation & Healthy condition all the time including take all precautions against theft also and handed over back in healthy condition at the end of contract to the department.
- 17. The Firm/Company will not be allowed to execute/maintain the work through proxy.
- 18. Payment for AMC works shall be made on quarterly basis.



COMMERCIAL AND ADDITIONAL CONDITIONS

1. GENERAL

- **1.1.** A good maintenance programme is the key to long system life and ease of serviceability. Maintenance & service should only be carried out by experienced / qualified personnel as desired in the schedule of work. The maintenance and service which are done must be as per specifications and upto the satisfaction of the Engineer-in-charge.
- **1.2.** Location: The equipments are installed at Lecture Hall Complex at IIT Delhi
- **1.3.** The work shall be executed as per CPWD General Specifications for Electrical Works Part-I (Int.) 2013, Part-II (Ext.) 1994, Part-IV (Sub St.) 2013, Part-VI (FAS)-2018 as applicable, as amended upto date, relevant I.E. Rules, BIS/IEC and as per directions of Engineer-in-Charge. These additional specifications/conditions are to be read in conjunction with above and in case of variations; specifications given in these additional conditions shall apply. However, nothing extra shall be paid on account of these additional specification and conditions, as the same are to be read along with schedule of quantities for the work.
- **1.4.** The tenderer should in his own interest visit the site and get familiarize with the site conditions before tendering.
- **1.5.** No T&P shall be issued by the Department and nothing extra shall be paid on account of this.

2. COMMERCIAL CONDITIONS:

2.1. Type of contract: The work to be awarded by this tender shall be treated as indivisible works contract.

2.2. Submission and opening of Tenders:

- **2.2.1.** The tender is in two parts:
 - 2.2.1.1. Part-I Technical cum Un-priced commercial Bid

2.2.1.2. Part-II-Price Bid

- **2.3.** The tender shall be submitted online, duly completed as per NIT conditions within period of bid submission.
- **2.4.** The tenderers are advised not to deviate from the technical specifications / item, commercial terms and conditions of NIT like terms of payment, guarantee, arbitration clause, escalation etc.
- **2.5.** Technical cum un-priced commercial bid only shall be opened on the due date and time in the presence of tenderers or their authorized representative who wish to remain present.
- **2.6.** Scrutiny/evaluation of the technical-cum-commercial bid shall be done by the department. In case, it is found that the technical-cum-commercial bid of a tenderer is not in line with NIT specifications/requirements and/or contains too many deviations, the department reserves the right to reject the technical bid of such firms(s) without making any reference to the tenderer(s).
- 2.7. Necessary clarifications required by the department shall have to be furnished by the tenderer within the time given by the department for the same. The tenderer will have to depute his representative to discuss with the officer(s) of the department as and when so desired. In case, in the opinion of the department a tenderer is taking undue long time in furnishing the desired clarifications, his bid will be rejected without making any reference.

2.8. After obtaining clarification from all the tenders, the department will intimate the tenders C.....Nil whose Mechnical cump.commercial bids are acceptable.



- **2.9.** The price bids of only those tenderers shall be opened whose technical bids are found to be technically acceptable. The time and date of opening of price bid shall be fixed after the technical cum unpriced commercial bid is accepted and intimated to them by post/Fax/e-mail.
- **2.10.** The department reserves the right to reject any or all the price bids and call for fresh prices/tenders as the case may be without assigning any reason.

3. TERMS OF PAYMENTS

3.1. Unless otherwise specified, in the additional conditions of the contract, the payment shall be made as per the relevant clauses of form PWD 7/8 forming a part of the tender documents.

4. SECURITY DEPOSIT

4.1. Security Deposit shall be deducted from each running bill and final bill to the extent of 5% of the gross amount payable. The security deposit shall be released only after the work is complete in all respect i.e. Wages, EPF & ESI, Bonus etc. are fully cleared.

5. PERFORMANCE GUARANTEE

- **5.1.** The successful tenderer shall submit an irrevocable performance guarantee of 5% of the tendered amount in addition to other deposit mentioned elsewhere in the contract for his proper performance of the contract agreement within 15 days of issue of letter of acceptance of tender. This guarantee shall be in the form of Demand Draft/Pay order of irrevocable bank guarantee bond of any schedule bank or the State Bank of India in the specified perform a of Government Security, fixed deposit receipt pledged in favour of **Registrar, IIT Delhi** or as specified in the letter of acceptance of tender. The performance guarantee shall be initially valid up to the stipulated date of completion plus 60 days beyond. This bank guarantee shall be kept valid till the recording of completion certificate for the work by the competent authority.
- **5.2.** Income tax, GST, labour cess & other statutory deduction etc. shall be made at source as per the prevalent laws. The deduction of Security Deposit, Income Tax, etc., shall be done after calculation for the above due payment as per clause 3 above and net payment shall reduce accordingly.

6. RATES

6.1. The rates quoted by the tenderer, shall be firm and inclusive of all taxes (including works GST & labour cess), duties, levies, etc. and all charges for packing forwarding, insurance, freight and delivery, installation, testing and commissioning etc. at site including temporary construction of storage, risks overhead charges, general liabilities/ obligations.

7. COMPLETENESS OF TENDER

7.1. All sundry equipments, fitting, unit assemblies, accessories, hardware items, foundation bolts, termination lugs for electrical connections and all other items which are useful and necessary for efficient assembly and installation of equipment and components of the work shall be deemed to have been included in the tender irrespective of the fact whether such items are specially mentioned in the tender documents or not.

8. STORAGE AND CUSTODY OF MATERIAL

8.1. The agency has to make his own arrangement for storage. No separate storage accommodation shall be provided by the department Watch and ward of the storage and their safe custody shall be responsibility till the final taking over of the installation by the department.



9. CARE OF THE BUILDING

9.1. Care shall be taken by the contractor while handling and installing the various equipment and components of the work to avoid damage to the building. He shall be responsible for repairing all damages and restoring the same to their original finish at his cost. He shall also remove at his cost all unwanted and waste material arising out of the installation from the site of work.

10. COMPLETION PERIOD

10.1. The completion period indicated in the tender documents is for the entire work of planning, deployment of workers, payment of wages and statutory obligations, arrangement of materials & equipments, if any, etc. up to the satisfaction of the Engineer-in-charge.

11. VALIDITY

11.1. Tenders shall be valid for acceptance for a period 90 days of days from the date of opening of price bid.

12. COMPLIANCE WITH REGULATIONS AND INDIAN STANDARDS

- **12.1.** All works shall be carried out in accordance with relevant regulation both statutory and those specified by the Indian Standards related to the works covered by this specification in particular, the equipment and installation will comply with the following:
- **12.1.1.** Factories Act
- 12.1.2. Indian Electricity Rules
- **12.1.3.** B.I.S.& other standards as applicable
- **12.1.4.** Workmen's compensation Act
- **12.1.5.** Statutory norms prescribed by local bodies like fire department, CEA, Power Supply Co. etc.

13. INDEMNITY

13.1. The successful tenderer shall at all times indemnify the department, consequent on this works contract. The successful tenderer shall be liable, in accordance with the Indian Law and Regulations for any accident occurring due to any cause and the contractor shall be responsible for any accident or damage incurred or claims arising there from during the period of operation and maintenance under the supervision of the successful tenderer. The successful tenderer shall take necessary actions in this regard. No extra payment would be made to the successful tenderer on account of the above.

14. ERECTION TOOLS

14.1. No tools and tackles either for unloading or for shifting the equipments for erection purposes would be made available by the department. The successful tender shall make his arrangement for all these facilities

15. COOPERATION WITH OTHER AGENCIES AND OCCUPANTS OF THE BUILDING

- **15.1.** The successful tenderer shall co-ordinate with other working contractors, if any and other occupants of different offices / Labs, etc., and exchange freely all technical information so as to make the execution of this work / contract smooth. No remuneration should be claimed
- C.....Nil from the department for such technical cooperation. If any unreasonable hindrance is caused to other agencies and any completed portion of the work has to be dismantled and re-done



for want or cooperation and coordination by the tenderer during the course of work such expenditure incurred will be recovered from the successful tenderer if the restoration work to the original condition or specification of the dismantled portion of work was not under taken by the tenderer himself.

16. MOBILIZATION ADVANCE

16.1. No mobilization advance shall be paid for this work

17. INTERPRETING SPECIFICATION

- **17.1.** In interpreting the specification, the following order of decreasing importance shall be followed in case of contradictions:
- **17.1.1.** Schedule of quantities
- **17.1.2.** Technical Specification
- **17.1.3.** Drawing (if any)
- **17.1.4.** General Specification for Electrical Works of CPWD (relevant Parts)
- **17.1.5.** Relevant BIS or other international code in case BIS code is not available.

18. POLICY OF THE INSTITUTE

18.1. Institute has a policy against **sexual harassment** and is committed to providing an environment free from **sexual harassment of women** at the workplace. Contractor shall have to abide by the policy of the Institute with due diligence. Any violation on the part of the contractor shall be dealt with the extant rules of the Institute.

SPECIAL TERMS AND CONDITIONS

- 1. That it is expressly understood and agreed between the parties to this Agreement that the persons deployed by the contractor for the services mentioned above shall be the employees of the contractor for all intents and purposes and that the persons so deployed shall remain under the control and supervision of the contractor and in no case, shall a relationship of employer and employee between the said persons and the IITD shall accrue/arise implicitly or explicitly.
- 2. That on taking over the responsibility of providing Contractor's Worker, the contractor shall formulate the mechanism and duty assignment under intimation to the Engineer-in-charge. Subsequently, the contractor shall review work arrangement from time to time. The contractor shall further be bound by and carry out the directions/instructions given to him by the Engineer-in-charge in this respect from time to time.
- **3.** That the Engineer-in-charge or any other person authorized by him shall be at liberty to carry out surprise check on the persons so deployed by the contractor in order to ensure that persons deployed by him are doing their duties.
- 4. That in case of the persons so deployed by the contractor does not come up to the mark or does not perform his/her duties properly or indulges in any unlawful activities or riots or disorderly conduct, the contractor shall immediately withdraw and take suitable action against such persons on the report of the Engineer-in-charge. Further, the contractor shall immediately replace the particular person so deployed on the demand of the Engineer-in-charge, in case of any of the aforesaid acts on the part of the said person.
- 5. That the contractor shall particularly abide by the provisions of Minimum Wages Act, 1948. Minimum wages shall be paid by the Agency / Contractor at the rate fixed by
- C....Nil Delhi Govt. from time to time. Arrears, if due as result of increase in minimum wages



would be reimbursed to the contractor on submission of proof of actual payment to the worker. In case of half yearly increase in Minimum wages by the Govt. of NCT of Delhi, the contractor will submit copy of gazette notification to the Institute and the same may be considered by the Institute. <u>However, base rate for Mechanic / Operator grade</u>

Rs.689.00, for Helpergrade Rs.569.00. per day has been considered in the NIT.

- **6.** The contractor shall take all reasonable precautions to prevent any unlawful, riotous or disorderly conduct or acts of his employees so deployed.
- 7. That the contractor shall deploy workers as per requirement given in the schedule in consultation with the Engineer-in-charge in such a way that they get weekly one day rest. The working hour / leave for which the work is taken from them, do not violate relevant provisions of the Act. The contractor shall in all dealings with the persons in his employment have due regard to all recognized festivals, days of rest and religious or other customs.
- 8. That the contractor shall keep the IITD indemnified against all claims whatsoever in respect of the employees deployed by the contractor. In case any employee of the contractor so deployed enters in dispute of any nature whatsoever, it will be the primarily responsibility of the contractor to contest the same. In case IITD is made party and is supposed to contest the case, IITD will be reimbursed for the actual expenses incurred towards Counsel Fee and other expenses which shall be paid in advance by the contractor to IITD on demand. Further, the contractor shall ensure that no financial or any other liability comes on IITD in this respect of any nature whatsoever and shall keep IITD indemnified in this respect.
- **9.** The Work is to be carried out for stipulated period of time and may be extended further as desired by Engineer-in-charge.
- **10.** Institute reserves the right to remove any person deployed by the firm, without assigning any reason/notice. This will be without prejudice to the right of the contractor to remove any of his own employees deployed in the Institute.
- **11.** That the contractor shall submit detail of the names, parentage, residential address, age, educational qualifications, experiences, etc. of the persons deployed by him in the premises of the IIT Delhi for the purpose of proper identification & category of the employees of contractor deployed at various points/sections. He shall issue identity cards bearing their photographs / identification, etc. and such employees shall display their identity cards at the time of duty.
- **12.** The contractor shall ensure that the persons are punctual and disciplined and remain vigilant in performance of their duty.
- 13. Total number of manpower is fixed. However, the Institute can increase or decrease the manpower as per requirement in case there is exigencies. The increase / decrease in manpower would accordingly affect the billing on pro-rata basis.
- 14. That the contractor shall be required to maintain **permanent attendance register in addition to Biometric Attendance** at the IITD premises which shall be open for inspection and checking by the authorized officers of the IITD.
- 15. That the contractor shall make the payment of wages, etc. to persons so deployed monthly basis through Bank Transfer / electronic mode on or before 10th day of every month. Wages shall include bonus @ 8.33% of daily wage [as admissible] of the particular worker multiplied by number of days' work actually performed by the c.....Nil worker in a particular month, which shall also be shown separately on the wage sheet of the worker.



- 16. A consolidated wage sheet containing the names of all workers so deployed by the contractor duly signed / acknowledged by the workers after disbursal of wages to be submitted to the Engineer-in-charge every month. Proof of disbursal of wages to be submitted before claiming bill. The wage sheet shall contain mandatory fields as per following: [1] Sr. No., [2] Name of the worker, [3] Actual days of duty performed, [4] Total wages, [5] Bonus amount, [6] EPF contribution [as applicable], [7] ESI Contribution [as applicable], [8] Total deductions, [9] Net wages received / disbursed, [10] signature of the worker.
- 17. In case of delay of payment of wages beyond 10 days as specified, IIT Delhi shall arrange for payment to the workers at the risk & cost of the contractor. Decision of the Engineer-in-charge in this regard shall be full & final and binding upon the contractor.
- 18. Attendance comparative sheet shall be prepared by the contractor and to be submitted to the Engineer-in-charge after completion of every month as per duty chart, <u>desired days of duty of a particular worker allowing weekly off</u> and <u>actual days of duty performed by the said worker</u>. Summation of the two columns should tie in normal case. Falling short of days of attendance from desired days of attendance shall be got deducted from the bill of the contractor at the rate of the wages given to either operator [in case of operators] or helper [in case of helpers] plus. 250/- per operator and Rs. 150/- per Helper additionally.
- **19.** It would be the responsibility of contractor to arrange all permission/ approvals from all local bodies/statutory bodies & nothing extra shall be paid on account of this by the Institute.
- 20. EPF & ESI contribution in respect of the workers shall be deposited with the authority concerned in time and employer's share shall be got reimbursed to the contractor by IIT Delhi on production of proof of deposition. But before claiming bill, EPF & ESI contributions shall have to be updated and to be submitted for the preceding month else bill cannot be processed.
- **21.** This contract covers 12 months:
- **22.** Charge for additional operation of plant (beyond normal scope of operation as outlined in schedule of work) shall be made on pro-rata basis and vice-versa.
- **23.** Comprehensive AMC of plant shall be started as per letter of award of work. But, date of start of operation of plant shall be decided by the Engineer-in-charge.
- **24.** As per exigency, it may be required to operate the plant beyond normal scope of work. Contractor shall have to take action to deploy operators on urgent basis.



Equipment's Maintenance schedule

Equipment	Frequency	Activities
Equipment Chiller	Frequency Monthly	 Check refrigerant level, gas leak test with electronic leak detector. If abnormal, trace and rectify as necessary, inform department in writing on the rectification. Inspect level and condition of oil. If abnormal, trace fault and rectify as necessary, inform department in writing on the rectification. Check the liquid line sight glasses for proper flow. Check all operating pressure and temperature. Inspect and adjust, if required, all operating safety controls. Check capacity control, adjust if necessary. Lubricated vane/linkage/bearings. Visually inspect machine and associated components and unusual Sound or noise for evidence of unusual conditions.
		 9. Check lock bolts and chillers springs mount. Review daily operating Log maintenance by departments operating Personnel. 10. Providing written report to departments, outlining services carried out. 11. Adjustment made, rectification carried out and if the deficiency is of a major nature, Arrange with department for shut-down to rectify equipment.
Chiller	Six monthly	Checking of control & safeties/microprocessor accessories.
Chiller	Annual (Immediately after award of contract)	 Perform all functions for monthly check. Check all flanges for tightness. Change oil in oil sump. Replace filter. Check oil temperature control. Check motor terminals. Check connections in starter.
	Annual (Immediately after award of contract)	 Please note that oil filter gasket replacement shall deem to be including in the contract. Check motor earthling, mugger motor and connection wiring on each leg. Check motor temperature cut-out, tighten motor terminals. Check starter contracts, are shield and transformer. Check dashpot oil, clean dashpot and replace oil when necessary. Test and calibrate overload setting. Inspects, calibrate and adjust to original specifications all gauges, safety and operating controls including low temperature and high pressure cutout, oil pressure switch, load limit relay and electrical interlocks. For water cooled condenser systems, inspect condenser. Tubes for fouling Carry out Decaling of condenser if fouling exceeds original specifications, the controller shall carry out cleaning of the tubes at his own expense. Decaling of chiller. Check compressor foundation bolts. Check evaporator & condenser water flow.

Water Pumps	Monthly	 Inspects all water pumps. Check all seals, glands and pipeline for leaks and rectify as necessary. Re-park and adjust pump glands as necessary. Check all pumps bearings and lubricate which oil or grease and necessary. Check the alignment and condition of all rubber couplings between pumps. Check all bolts and nuts for tightness and tighten as necessary.
Water Pumps	Annual (Immediately after award of contract)	 Perform all function for monthly checks. Check motor earthling, meggar motor and connection wiring on each. Tighten motor terminals. Check starter contacts. Test and calibrate overload setting.
Expansion Tank	Annual (Immediately after award of contract)	Inspection of expansion tank, drain, clean and flush out tanks as necessary.
Piping System	Monthly and Annual Annual	 Check all piping system and repair these where they have leaks. Check for damage deterioration of insulation or sheathings necessary. Crease the basing of mater.
Cooling Tower	(Immediately after award of contract)	 Grease the bearing of motor. General maintenance & overhaul of motor or as and when required. Inspection or nozzles/fills or earlier as per requirement.
Strainer	Six monthly (Once immediately after award of contracts and again after 6 months period)	Carry out cleaning of strainer.
Air handling units	Monthly inspection n	 Inspects all air handling and fan coil units. Check all air filter and clean or change filters as necessary. Check all water coils, seals and pipelines for leaks and rectify as necessary. Check and re-calibrate modulating valves and controls. Adjust and rectify as necessary to ensure compliance to the original specifications. Purge air from all water coils. Check and tension of all belt drives and adjust as necessary. Check and clean all the condensate pans, trays and drains. Check measure and re-calibrate all sensors if necessary. Check springs vibration isolators for abnormal vibration. Rectify If necessary. Coil to be cleaned by (a) spray of high- pressure clean water not exceeding 30 psi. (b) With chemical spray, if necessary.

<u>6</u> -	[in working condition all the time. In case of any fault in recording of
		temperature and pressure by the said device(s), the same should be ^{page 44} , replaced immediately.
	Annual	1. Perform all functions for monthly checks.
Air	(Immediately	2. Tighten motor terminals.
handling	after award of	3. Check starter contacts.
units	contract)	4. Test and calibrate overload settings.
Ventilation	Monthly check and Annual (Immediately after award of contract)	 Check adjust as necessary the air flow of all fans are in compliance with the original specifications. Check the tension of all belt drives and adjust as necessary. Check and lubricate all fan bearings. Tighten motor terminals. Check starter contacts. Test and calibrate overload settings. A System check shall be carried out for all Mechanical ventilation (MV), Pressurization and Exhaust system to verity the performance of the systems.
Switch Board	Six monthly (Once immediately after award and of contract and again after 6 months period)	 Clean and adjust all switch gear, contactors, relays and associated electrical equipment at intervals not exceeding six months. Check and prove operation thermal over load and protection devices. Check and ensure tightness of all equipment fastenings and cable terminations within switch boards. Vacuum clean all switch boards.
Piping System	Monthly check and Annual (Immediately after award of contract)	 Check all piping system for leaks and repair these where they have occurred. Check for damage & deterioration of insulation or sheathings. Rectify as necessary.



WORKS TO BE DONE ON DAILY BASIS: -

• The reading of the chiller and condenser pressure, oil pressure oil level, section and discharge pressure of pumps, voltage and Amps. etc. shall be checked and recorded in the logbooks on hourly basis. Necessary action is to be taken if the readings are not normal.

• To check all the electrical motors and bearings for abnormal noise/heating, contractor has to take necessary action if noise found abnormal.

- To check the water level in makeup water tank and in the cooling tower.
- To drain out the water from A.C. Plant Room/ Cooling Tower, AHU's if required.
- To clear/sweep the areas of A.C. Plant Room/ AHU Room/Cooling Tower etc.
- Filters of the AHU's units are to be made clean regularly.
- The inside and ambient condition i.e. DB, WB & RH of all the committee halls/lounges, rooms etc. shall be recorded on an hourly basis in log book/register.
- To check up all switch gear of electric control panels of AC plant, AHUs etc. for abnormal noise/heating, contractor has to take necessary action, if found abnormal.
- Maintenance schedule of equipment as given in manufacture's O & M manual should

also be carried by the contractor.

WORKS TO BE DONE ON MONTHLY BASIS:-

- To check the coupling of pumps etc.
- To check the safety controls and interlocking of various equipment.
- To check and clean the nozzles of the cooling tower and to clear the water basin and sump of cooling tower.

WORKS TO BE DONE EVERY THREE MONTHS: -

- To check the refrigerant system for leak test and to inform the department in case of leakage for rectification by the department.
- To dust off the inside of all the electrical panels.
- To check the lugs/Thimbles/Terminals points of the electrical motors switches, starters, single phase preventers and indication light fuses etc.
- To check the oil level and to fill if required in the gearbox of cooling tower.
- To check the alignment of all the belt driven equipment and to rectify if required.

WORKS TO BE DONE ON YEARLY BASIS/WHENEVER REQUIRED: -

All Painting works.

C ... Nil I Nil O Nil

ANNEXURE - 1



I / We, ______ hereby declare that all the information and data furnished by our organization with regard to this tender specification are true and complete to the best of our knowledge. I / we have gone through the specification, conditions and stipulations in details and agree to comply with the requirements and intent of specification.

1	Nome & Address of the hidder		1
.1	Name & Address of the bidder	•	
2	Phone	:	
3	E-mail	•••	
4	Contact person name	••	
5	Mobile number	•••	
6	TIN number	:	
7	PAN number	:	
8	UTR no. [if deposited online] for	:	
	EMD		
9	DD / FDR / Banker's Cheque No. [if	•••	
	uploaded scanned copy] for EMD		
10	Date of Issue	••	
	BANK DETAILS		
10	Bank name	••	
11	Branch address	•••	
12	Branch telephone no.	:	
13	MICR Code of the bank	:	
14	IFSC code	:	
15	Bank Account no.	:	
16	Type of account	:	
17	Pl attach one cancelled cheque	•••	

We further declare that our organization has not been blacklisted / delisted or put to any holiday by any Institutional agency / Govt. Department / Public Sector Undertaking in the last three years.

(Signature& name of the bidder) Seal of the bidder

C ... Nil I Nil O Nil

EE



IITD - 2010 CORRECTION SLIPS

In General condition of contract for IIT Delhi works department 2010 -

Reference	Existing	Modified
Clause 10B (ii), Para-2	Before any instalment of advance is released, the contractor shall execute a Bank Guarantee Bond from Scheduled Bank for the amount of advance &valid for the contract period. This shall be kept renewed from time to time to cover the balance amount and likely period of complete recovery, together with interest.	Before any instalment of advance is released, the contractor shall execute a Bank Guarantee Bond from Scheduled Bank for the amount equal to 110% of the amount of advance and valid for the contract period. This (Bank Guarantee from Scheduled Bank for the amount equal to 110% of the balance amount of advance) shall be kept renewed from time to time to cover the balance amount and likely period of complete recovery.
Clause 3 (vii)	If the contractor shall obtain a contract with Government as a result of wrong tendering or other non-bonafide methods of competitive tendering.	If the contractor had secured the contract with Government as a result of wrong tendering or other non-bonafide methods of competitive tendering or commits breach of Integrity Agreement.

Reference	Existing Provision	Modified Provision
Page 5, IITD 2010	Page 5, IITD 2010 4A. Applicable for Percentage Rate Tender only (IITD-7) In case of Percentage Rate Tenders,a tenderer shall fill up the usual printed form, stating at what percentage below/above (in figures as well as in words) the total estimated cost given in Schedule of Quantities at Schedule-A, he will be willing to execute the work. Tenders, which propose any alteration in the work specified in the said form of invitation to tender, or in the time allowed for carrying out the work, or which	Page 5, IITD 2010 4A. Applicable for Percentage Rate Tender only (IITD-7) In case of Percentage Rate Tenders, contractor shall fill up the usual printed form, stating at what percentage below/above (in figures as well as in words) the total estimated cost given in Schedule of Quantities at Schedule-A, he will be willing to execute the work. The tender submitted shall be treated as invalid if :- 1. The contractor does not quote percentage above/below on the total

 $C \dots Nil \quad I \dots Nil \quad O \dots \dots Nil$



including conditional rebates, will be	amount of tender or any section/sub head of the tender. 2. The percentage above/below is not
shall include more than one work, but contractors who wish to tender for two or more works shall submit separate tender for each. Tender shall have the name and number of the works to which they refer, written on the envelopes.	quoted in figures & words both on the total amount of tender or any section/sub head of the tender. 3. The percentage quoted above/below is different in figures & words on the total amount of tender or any section/sub head of the tender: Tenders, which propose any alteration in the work specified in the said form of invitation to tender, or in the time allowed for carrying out the work, or which contain any other conditions of any sort including conditional rebates, will be summarily rejected. No single tender shall include more than one work, but contractors who wish to tender for two or more works shall submit separate tender for each. Tender shall have the name and number of the works to which they refer, written on the envelopes. New Para 4B is added as below: 4B: In case the lowest tendered amount (estimated cost + amount worked on the basis of percentage above/ below) of two or more contractors will be asked to submit sealed revised offer in the form of letter mentioning percentage above/below on estimated cost of tender including all sub sections/sub heads as the case may be, but the revised percentage quoted above/below on tendered cost or on each sub section/ sub head should not be higher than the percentage quoted at the time of submission of tender. The lowest tender shall be decided on the basis of revised offers. In case any of such contractor refuses to submit revised offer, then it shall be treated as withdrawal of his tender before acceptance and 50% of

C ... Nil I Nil O Nil



		earnest money shall be forfeited. If the revised tendered amount of two more contractors received in revised offer is again found to be equal, the lowest tender, among such contractors, shall be decided by draw of lots in the presence of SE of the circle, EE(s) in-charge of major & minor component(s) (also DDH in case Horticulture work is also included in the tender), EE(P) or EE(HQ) of the circle & the lowest contractors those have quoted equal amount of their tenders. In case all the lowest contractors those have quoted same tendered amount, refuse to submit revised offers, then tenders are to be recalled after forfeiting 50% of EMD of each contractor. Contractor(s), whose earnest money is forfeited because of non- submission of revised offer, shall not be allowed to participate in the re- tendering process of the work.
Reference 10A (page 6-7)	Existing Provision In case of Percentage Rate Tenders only percentage quoted shall be considered. Any tender containing item rates is liable to be rejected. Percentage quoted by the contractor in percentage rate tender shall be accurately filled in figures and words, so that there is no discrepancy. However if the contractor has worked out the amount of the tender and if any discrepancy is found in the percentage quoted in words and figures, the percentage which corresponds with the amount worked out by the contractor shall, unless otherwise proved, be taken as correct. If the amount of the tender is not worked out by the contractor or it does not correspond with the percentage written either in figures or	Modified Provision In case of Percentage Rate Tenders only percentage quoted shall be considered. Any tender containing item rates is liable to be rejected. Percentage quoted by the contractor in percentage rate tender shall be accurately filled in figures and words, so that there is no discrepancy. (Remaining part deleted)

C ... Nil I Nil O Nil

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	in words, then the percentage quoted by the contractor in words shall be taken as correct. Where the percentage quoted by the contractor in figures and in words tally but the amount is not worked out correctly, the percentage quoted by the contractor will, unless otherwise proved, be taken as correct and not the amount.	
Reference	Existing Provisions	Modified Provisions
Deviations/ Variations Extent and Pricing	CLAUSE 12 The Engineer-in-Charge shall have power (i) to make alteration in, omissions from, additions to, or substitutions for the original specifications, drawings, designs and instructions that may appear to him to be necessary or advisable during the progress of the work, and (ii) to omit a part of the works in case of non- availability of a portion of the site or for any other reasons and the contractor shall be bound to carry out the works in accordance with any instructions given to him writing signed by the Engineer-in- Charge and such alterations, omissions, additions or substitutions shall form part of the contract as if originally provided therein and any altered, additional or substituted work which the contractor may be directed to do in the manner specified above as part of the works, shall be carried out by the contractor on the same conditions in all respects including price on which he agreed to do the main works except as hereafter provided.	CLAUSE 12 The Engineer-in-Charge shall have power (i) to make alteration in, omissions from, additions to, or substitutions for the original specifications, drawings, designs and instructions that may appear to him to be necessary or advisable during the progress of the work, and (ii) to omit a part of the works in case of non- availability of a portion of the site or for any other reasons and the contractor shall be bound to carry out the works in accordance with any instructions given to him writing signed by the Engineer-in- Charge and such alterations, omissions, additions or substitutions shall form part of the contract as if originally provided therein and any altered, additional or substituted work which the contractor may be directed to do in the manner specified above as part of the works, shall be carried out by the contractor on the same conditions in all respects including price on which he agreed to do the main works except as hereafter provided. The completion cost of any agreement for Maintenance works including works of upgradation, aesthetic, special repair, addition/



		alteration shall not exceed 1.50 times of Tendered amount.
Deviations, Extra	12.2	12.2
Items, Pricing	In the case of extra items (items that are completely new and are in addition to the items contained in the contract), the contractor may within 90 days of receipt of order or occurrence of the item(s) claim rate, supported by proper analysis, for the work and the Engineer-in-charge shall within one month of the receipt of the claims supported by analysis after giving considerations to the analysis of the rates submitted by the contractor, determined the rates on basis of market rates and the contractor shall be paid in accordance with the rates so determined.	A. For Project and original works: In the case of extra items (items that are completely new and are in addition to the items contained in the contract), the contractor may within 90 days of receipt of order or occurrence of the item(s) claim rate, supported by proper analysis, for the work and the Engineer-in-charge shall within one month of the receipt of the claims supported by analysis after giving considerations to the analysis of the rates submitted by the contractor, determined the rates on basis of market rates and the contractor shall be paid in accordance with the rates so determined.
		B. For Maintenance including works of upgradation, aesthetic, special repair, addition/ alteration:
		In the case of Extra Item(s) being the schedule items (Delhi Schedule of Rates items), these shall be paid as per the schedule rate plush cost index (at the time of tender) plus/minus percentage above below quoted contract amount.
		Payment of Extra items in case of non-schedule items (Non-DSR items) shall be made as per the prevailing market rate.
Deviation, Substituted Items,	In the case of substituted items (items that are taken up with partial substitution or lieu of items of work in the contract), the rate for the agreement item (to be	 A. For Project and original works: In the case of substituted items (items that are taken up with partial

C ... Nil I Nil O Nil



Pricing	substituted) and substituted item shall	substitution or lieu of items of work in
FICING	(a) If The market rate for the substituted item so determined is more than the	the contract), the rate for the agreement item (to be substituted) and substituted item shall also be determined in the manner as mentioned in the following Para.
	 market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted). (b) If the market rate for the substituted item so determined is less than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the substituted item shall be substituted item shall be the rate for the substituted item shall be substituted item shall be substituted item shall be substituted item shall be substituted item substituted item shall be substituted item shall be substituted item shall be substituted item shall be substituted item substituted item shall be substituted item shall be substituted item shall be substituted item substitem substituted item subst	(a) If The market rate for the substituted item so determined is more than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted).
	agreement item (to be substituted) so decreased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted)	(b) If the market rate for the substituted item so determined is less than the market rate of the agreement item (to be substituted), the rate payable to the contractor for the substituted item shall be the rate for the agreement item (to be substituted) so decreased to the extent of the difference between the market rates of substituted item and the agreement item (to be substituted). For Maintenance including works of up-gradation, aesthetic, special repair, addition/ alteration:
		In the case of Substitute Item(s) being the schedule items (Delhi Schedule of Rates items), these shall be paid as per the schedule rate plush cost index (at the time of tender) plus/minus percentage above below quoted contract amount.
		Payment of Extra items in case of non-schedule items (Non-DSR



		items) shall be made as per the
		prevailing market rate.
Deviation, Deviated Quantities, Pricing	In the case of contract items, substituted items, contract cum substituted items, which exceed the limits laid down in schedule F, the contractor may within fifteen days of receipt of order or occurrence of the excess, claim revision of the rates, supported by proper analysis for the work in excess of the above mentioned limits, provided that if the rates so claimed are in excess of the rates specified in the schedule of quantities, the Engineer-in-Charge shall within one month of receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.	A. For Project and original works: In the case of contract items, substituted items, contract cum substituted items, which exceed the limits laid down in schedule F, the contractor may within fifteen days of receipt of order or occurrence of the excess, claim revision of the rates, supported by proper analysis for the work in excess of the above mentioned limits, provided that if the rates so claimed are in excess of the rates specified in the schedule of quantities, the Engineer-in-Charge shall within one month of receipt of the claims supported by analysis, after giving consideration to the analysis of the rates submitted by the contractor, determine the rates on the basis of the market rates and the contractor shall be paid in accordance with the rates so determined.
		 B. For Maintenance including works of up-gradation, aesthetic, special repair, addition/ alteration: In the case of contract items, which exceed the limit laid down in schedule F, the contractor shall be paid rates specified in the schedule of quantities.
	12.3 The provisions of the preceding paragraph shall also apply to the decrease in the rates of items for the work excess of the limits laid down in Schedule F, and the Engineer-in-Charge shall after giving notice to the contractor within one month of occurrence of the excess and after taking into	12.3 A. For Project and original works: The provisions of the preceding paragraph shall also apply to the decrease in the rates of items for the work excess of the limits laid down in Schedule F, and the Engineer-in-Charge shall after giving notice to

 $C \dots Nil \quad I \dots Nil \quad O \dots Nil$



	consideration any reply received from him within fifteen days of the receipt of the notice, revise the rates for the work in question within one month of the expiry of the said period of fifteen days having regard to the market rates.	the contractor within one month of occurrence of the excess and after taking into consideration any reply received from him within fifteen days of the receipt of the notice, revise the rates for the work in question within one month of the expiry of the said period of fifteen days having regard to the market rates.			
		B. For Maintenance including works of upgradation, aesthetic, special repair, addition/ alteration:			
		In the case of decrease in the rates Prevailing in the market of items for the work excess of the limits laid down in Schedule F, and the			
		Engineer-in-Charge shall after giving notice to the contractor within one month of occurrence of the excess and after taking into consideration any reply received from him within fifteen days of the receipt of the notice, revise the rates for the work in question within one month of the expiry of the said period of fifteen days having regard to the market rates.			
Schedule F	Clause 12	Clause 12			
	No provision.	Type of work			
		*** To be filled by NIT approving authority either Project and original work or Maintenance works including works of upgradation, aesthetic, special repair, addition/ alteration.			

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BID SUBMISSION

ONLINE BID SUBMISSION:

The Online bids (complete in all respect) must be uploaded online in **two** Envelops as explained below:-

SI. No.	Documents	Content	File Types			
1	Technical Bid	Organization Declaration Sheet as per Annexure - I	.PDF			
2		EMD Declaration on farm's letter head [if scanned copy of DD / FDR / Banker's cheque uploaded online]	.PDF			
3		Self-certification for local content	.PDF			
4		Attested Certificate of work experience	.PDF			
5		Certificate of registration for GSTIN	.PDF			
6		Affidavit as per NIT condition 1.2.2 on stamp paper	.PDF			
7		Acceptance to execute integrity pact	.PDF			
8		IITD 7/8 duly signed by the bidder	.PDF			
9		EPFO & ESIC Registration proof	.PDF			
10		Valid Electrical Licence	.PDF			
11		Any other document as specified in the NIT	.PDF			
12		Attested certificate of Engineer along with experience certificate to be deployed for the work as per clause 36(i) Schedule 'F'.	.PDF			
	Envelope – 2					
SI. No.	TYPES	Content				
1.	Financial Bid	Price bid should be submitted in BOQ format.	.EXL			

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SCHEDULE OF QUANTITY

Name of work: Comprehensive Maintenance of M/s Voltas make water cooled screw chillers and operation of HVAC system at Lecture Hall Complex at IIT Delhi.

S.No	Description of items	Qty.	Unit	Rate	Amount
1	SUBHEAD-I (Comprehensive maintenance of AC				
	Plant)				
	Comprehensive Maintenance of VOLTAS make 3 X 275				
	TR capacity water cooled screw chillers i/c allied				
	equipment, pipe line & valves etc. installed at LHC at	10			
	IIT Delhi as per the following details of equipment	12	Per		
	and as per terms & conditions.		Month		
1	Inventory of equipment attached.				
11	SCREW CHILLERS = 3 Nos.				
111	COOLING TOWERS = 3 Nos.				
lV V	CHILLED WATER PUMPS primary –3 nos. CONDENSOR WATER PUMPS = 3 Nos.				
V Vl	All the electrical control panel for AC plant, AHUs				
V I	and ventilation panels - 1 lot				
Vll	AHUs with all component -1 lot (40 No's)				
VII	VFD driven secondary chilled water pumps -3 nos.				
lX	Ventilation & smoke exhaust fans -1 lot				
121	VFD of AHU- 80 No's				
2	SUB HEAD-II (Operation of AC Plant)				
_	Operation 3 X 275 TR capacity AC plants and				
	Ventilation fans i/c allied equipment, AHUs,				
	cooling tower, condenser water pumps, chilled water				
	pumps (primary and secondary) and connected AHU's	12	Per		
	as per details in Annexure-A enclosed from 06.00 AM		Month		
	to 2.00 PM & 2.00 PM to 10.00 PM daily on all				
	working days except Sundays as per condition				
	attached.				
	Mechanic grade – 02 Nos.				
	Helper grade - 02 Nos.				
	Total-				

D'Man / STS Plg. Sr. F.I AEE (E)

EE (E)

C ... Nil I Nil O Nil

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