

अंतर - विश्वविद्यालय त्वरक केंद्र
INTER-UNIVERSITY ACCELERATOR CENTRE
(विश्वविद्यालय अनुदान आयोग का स्वायत्त निकाय)
(An Autonomous Centre of UGC)
अरुणा आसफ अली मार्ग, नई दिल्ली - 110067
Aruna Asaf Ali Marg, New Delhi - 110067

ई-निविदा आमंत्रण सूचना / NOTICE INVITING E-TENDER

निविदा संख्या : एनआईटी/11/बीकेजी/आई.964/23-24

दिनांक : : 05/10/2023

Tender Number: NIT/11/BKG/I.964/23-24

Dated: 05/10/2023

अंतर-विश्वविद्यालय त्वरककेंद्र (आईयूएसी) निदेशक आईयूएसी, नई दिल्ली की ओर से ई-प्रोक्योरमेंट पोर्टल के माध्यम से दो बोली प्रणाली, यानी तकनीकी और वित्तीय बोलियों के तहत आईयूएसी, नई दिल्ली-110067 में 11250 क्यूबिक मीटर प्रति घंटा बहाव क्षमता का एयर विआर्द्रक कम एयर हैंडलिंग यूनिट (हवा वातानुकूलन विआर्द्रक)के आपूर्ति स्थापना परीक्षण और कमीशनिंग के लिए पात्र / अनुभवी पार्टियों से ऑनलाइन बोलियां आमंत्रित करते हैं।

Inter - University Accelerator Centre (IUAC) invites online bids on behalf of the Director IUAC, New Delhi through e-procurement Portal under two bid system, viz., Technical and Financial bids, from eligible / experienced parties for the SITC of Air Dehumidifier cum Air Handling Unit (Air Conditioning Dehumidifier) of Capacity of 11250 CMH at IUAC, New Delhi-110067.

निविदा दस्तावेज, सेंट्रल पब्लिक प्रोक्योरमेंट (सीपीपी) पोर्टल <https://eprocure.gov.in/eprocure/app> से मुफ्त में डाउनलोड किए जा सकते हैं। इच्छुक बोलीदाता, जिन्होंने ई-प्रोक्योरमेंट पोर्टल में नामांकन/पंजीकरण नहीं किया है, उन्हें भाग लेने से पहले <https://eprocure.gov.in/eprocure/app> वेबसाइट के माध्यम से नामांकन/पंजीकरण करना होगा। बोलियां केवल <https://eprocure.gov.in/eprocure/app> वेबसाइट पर ऑनलाइन जमा करनी होगी। निविदाकारों/ठेकेदारों/बोलीदाताओं को सलाह दी जाती है कि वे ई-प्रोक्योरमेंट पोर्टल में दिए गए निर्देशों का पालन करें। बोली दस्तावेजों को 100 डी.पी.आई. में ब्लैक एंड व्हाइट स्कैन करें, जो स्कैन किए गए दस्तावेजों के आकार को कम करने में मदद करता है।

Tender Documents may be downloaded from Central Public Procurement (CPP) Portal free of cost <https://eprocure.gov.in/eprocure/app>. Aspiring Bidders who have not enrolled/registered in e-procurement portal should enroll/register before participating through the website <https://eprocure.gov.in/eprocure/app>. Bids should be submitted online only at website: <https://eprocure.gov.in/eprocure/app>. Tenderers / Contractors / Bidders are advised to follow the instructions provided in the e-procurement portal. Bid documents may be scanned with 100 dpi with black and white option which helps in reducing size of the scanned documents.

केवल ई-प्रोक्योरमेंट पोर्टल के माध्यम से प्राप्त बोलियों को ही खोला जाएगा। जो बोलियाँ उत्पादों/वस्तुओं के कार्य/आपूर्ति के वांछित प्रयोजनों को संपूर्ण रूप से पूर्ण करने में अक्षम होगी, उन बोलियों को अस्वीकार कर दिया जाएगा और केवल पूर्ण बोलियों पर विचार किया जाएगा। अंतर-विश्वविद्यालय त्वरक केंद्र के पास बिना कोई कारण बताए किसी भी/सभी निविदाओं को आंशिक/पूर्ण रूप से स्वीकार/अस्वीकार करने का अधिकार सुरक्षित है और इस संबंध में आईयूएसी का निर्णय सभी बोलीदाताओं के लिए बाध्यकारी होगा।

Only bids received through e-procurement portal will be considered for opening. Bids not covering full scope of work/supply of the products/goods will be rejected and only complete bids will be considered. IUAC reserves the right to accept / reject any / all tenders in part / full without assigning any reasons whatsoever, and the decision of IUAC in this regard will be binding on all the bidders.

ई.एम.डी. का भुगतान करने के लिए बोलीदाता को "ऑनलाइन" भुगतान विकल्प का चयन करना होगा, जो <https://services.sabpaisa.in/pages/iuac.html> लिंक पर जाकर लागू होगा। बयाना राशि ऑनलाइन भुगतान के रूप में होगी और इसे बोली खोलने से पहले जमा किया जाना चाहिए। एम.एस.एम.ई./एन.एस.आई.सी. में पंजीकृत बोलीदाताओं को ई.एम.डी. के भुगतान से छूट दी गई है। एम.एस.एम.ई./एन.एस.आई.सी.(निविदा की गई वस्तु/कार्य के लिए पंजीकृत इकाई) से पंजीकृत निविदाकारों को तकनीकी बोली के साथ वैध पंजीकरण प्रमाणपत्र की प्रति <https://eprocure.gov.in/eprocure/app> वेबसाइट पर अपलोड करनी होगी।

Bidder has to select the payment option as “online” to pay the EMD as applicable by going to the link <https://services.sabpaisa.in/pages/iuac.html> . The Earnest Money Deposit shall be in the form of online payment and it should be deposited before the bid opening. Bidders registered with MSME/ NSIC are exempted from payments of EMD. However, they have to submit Bid Security Declaration Form. Tenderers registered with MSME/NSIC (the unit being registered for the item/work tendered) are required to upload copy of valid registration certificate in the website <https://eprocure.gov.in/eprocure/app> along with technical bid.

बोलीदाताओं को इस बात को विशेष ध्यान में रखने की सलाह दी जाती है कि वे अनिवार्य रूप से उपलब्ध कराए गए प्रारूप में ही अपनी वित्तीय बोलियां जमा करें और कोई अन्य प्रारूप स्वीकार्य नहीं होगा। यदि मूल्य बोली निविदा दस्तावेज के साथ मानक .XLS BOQ प्रारूप के रूप में दी गई है, तो इसे ही डाउनलोड करना होगा और प्रारूप को संशोधित किए बिना ऑनलाइन भरना और जमा करना होगा। यदि बोलीदाता द्वारा BOQ फाइल को संशोधित पाया जाता है, तो बोली को अस्वीकार कर दिया जाएगा।

Bidders are advised to note that they should necessarily submit their financial bids in the format provided and no other format is acceptable. If the price bid has been given as a standard .XLS BOQ Format with the tender document, then the same is to be downloaded and to be filled and submitted online without modifying the format. **If the BOQ file is found to be modified by the bidder, the bid will be rejected.**

उपरोक्त निविदा के संबंध में कोई भी शुद्धिपत्र/संशोधन केवल <https://eprocure.gov.in> और www.iuac.res.in वेबसाइट पर जारी किया जाएगा। बोलीदाता, अपनी बोली जमा करने से पहले निविदा दस्तावेज से संबंधित, प्रकाशित होने वाले किसी भी शुद्धिपत्र की जानकारी रखें। निदेशक, अंतर-विश्वविद्यालय त्वरक केंद्र के पास बिना कोई कारण बताए किसी भी/सभी निविदाओं को आंशिक/पूर्ण रूप से स्वीकार/अस्वीकार करने का अधिकार सुरक्षित है।

Any Corrigendum / Amendments in respect of above tender shall be issued on website <https://eprocure.gov.in> and www.iuac.res.in only. Bidders should take into account any corrigendum published on the tender document before submitting their bids. The Director, IUAC reserves the right to accept/reject any/all tenders in part/full without assigning any reasons thereof.

4. **E - TENDER DOCUMENT**

कार्य/ आपूर्ति का नाम Name of Work / Supply	11250 क्यूबिक मीटर प्रति घंटा बहाव क्षमता का एयर विआर्द्रक कम एयर हैंडलिंग यूनिट (हवा वातानुकूलन विआर्द्रक) के एसआईटीसी के लिए आईयूएसी, नई दिल्ली- 110067 में SITC of Air Dehumidifier cum Air Handling Unit (Air Conditioning Dehumidifier) of Capacity of 11250 CMH at IUAC, New Delhi-110067
अनुबंध संख्या / Tender Number	IUAC/ NIT/11/BKG/I.964/23-24
अनुमादित निविदा मूल्य / Tender Value / Estimate only	Rs 5300000/- (रुपये तरेपन लाख मात्र) (Rupees Fifty Three Lacs only)
बयाना राशि/ Earnest Money Deposit	Rs. 106000/- (एक लाख छः हजार रुपये मात्र) (Rupees One Lac and Six Thousands only)
निष्पादन सुरक्षा जमा राशि/ Performance Security	10% ऑर्डर मूल्य का / of Order value
निविदा दस्तावेज शुल्क/ Tender Document Fee	शून्य NIL
बोली जमा करने की समाप्ति तिथि और समय (भाग-ए एवं भाग-बी) Bid Submission End Date and Time (Part - A and Part - B)	06/11/2023 अपराह्न 03:00 बजे 06/11/2023 at 03:00 P.M.
तकनीकी बोली खुलने की तिथि - भाग - ए Technical Bid Opening Date- (Part - A)	07/11/2023 अपराह्न 03:30 बजे 07/11/2023 at 03:30 P.M.
मूल्य बोली खुलने की तिथि - भाग-बी Price Bid Opening Date (Part - B)	तकनीकी रूप से योग्य समझे गए बोलीदाताओं को बाद में सूचित किया जाएगा To be intimated later on to the technically qualified bidders
Contact Person	1.Administrative Officer (S&P) E-mail: iuacstores@gmail.com 2. Mr. Bishamber Kumar E-mail: bkg.iuac@gmail.com

TENDER FORM

To

The Director
IUAC,

Aruna Asaf Ali Marg,
New Delhi 110067

Dear Sir,

I/We have read and examined the following Tender Documents relating to the SITC of Air Dehumidifier cum Air Handling Unit of Capacity of 11250 CMH at the site IUAC Campus at Inter-University Accelerator Centre, Aruna Asaf Ali Marg, New Delhi -110067

1. Registration process on CPP portal for online bidding, searching for tender documents, preparation of bids, instruction for submission of bids & assistance to bidders
2. Special Instructions to Bidders for Registration with Competent Authority
3. General Terms & Conditions of Contract
4. Special Terms and conditions of Contract
5. Annexures
6. Price Bid

I/We hereby offer to execute the work complete in all respects specified in the underwritten Memorandum within the time specified therein, at the rates specified in the Price Bid and in accordance with the specifications and instruction in writing referred to in the condition of tender.

Bidders Signature and Seal

INSTRUCTIONS TO BIDDERS

REGISTRATION PROCESS ON CPP PORTAL FOR ONLINE BIDDING

- i. Bidders are required to enroll on the e-Procurement module of the Central Public Procurement Portal (URL: <https://eprocure.gov.in/eprocure/app>) by clicking on the link “**Online Bidder Enrollment**” on the CPP Portal which is free of charge.
- ii. **Bidder who registered already may skip the registration process and login to site through their user ID/Password**
- iii. As part of the enrollment process, the bidders will be required to choose a unique username and assign a password for their accounts.
- iv. Bidders are advised to register their valid email address and mobile numbers as part of the registration process. These would be used for any communication from the CPP Portal.
- v. Upon enrollment, the bidders will be required to register their valid Digital Signature Certificate (Class II or Class III Certificates with signing key usage) issued by any Certifying Authority recognized by CCA India (e.g. Sify / nCode / eMudhra/ Nic etc.), with their profile.
- vi. Only one valid DSC should be registered by a bidder. Please note that the bidders are responsible to ensure that they do not lend their DSC’s to others which may lead to misuse.
- vii. Bidder then logs in to the site through the secured log-in by entering their user ID / password and the password of the DSC / e-Token.

SEARCHING FOR TENDER DOCUMENTS

- a) There are various search options built in the CPP Portal, to facilitate bidders to search active tenders by several parameters. These parameters could include Tender ID, Organization Name, Location, Date, Value, etc. There is also an option of advanced search for tenders, wherein the bidders may combine a number of search parameters such as Organization Name, Form of Contract, Location, Date, Other keywords etc. to search for a tender published on the CPP Portal.
- b) Once the bidders have selected the tenders they are interested in, they may download the required documents / tender schedules. These 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.
- c) The bidder should make a note of the unique Tender ID assigned to each tender, in case they want to obtain any clarification / help from the Help desk.

PREPARATION OF BIDS

- a) Please go through the tender advertisement and the tender document carefully to understand the documents required to be submitted as part of the bid. Please note the number of covers in which the bid documents have to be submitted, the number of documents - including the names and content of each of the document that need to be submitted. Any deviations from these may lead to rejection of the bid.

- b) 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/JPG formats. Bid documents may be scanned with 100 dpi with black and white option which helps in reducing size of the scanned document.
- c) 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, GST Certificate etc.) has been provided to the bidders. Bidders can use “My Space” or “Other Important Documents” 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.

Note: Bidder should take into account any corrigendum published on the tender document before submitting their bids.

INSTRUCTIONS FOR SUBMISSION OF BIDS

1. The tender documents are available on our website www.iuac.res.in & www.eprocure.gov.in. Tender documents may be downloaded from IUAC's website www.iuac.res.in and CPPP site <https://eprocure.gov.in/eprocure/app> as per the schedule as given in the tender document.
2. The tender shall be submitted online in two parts, viz., Technical bid and Financial (price Bid) bid.
3. The offers submitted by hand/Post/Fax/email shall not be considered. No correspondence will be entertained in this matter.
4. All the pages of bid being submitted must be sequentially numbered by the bidder irrespective of nature and content of the documents before uploading.
5. The bidders are required to submit soft copies of their bids electronically on the CPP Portal, using valid Digital Signature Certificates. 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.
6. Bidder should log into the site well in advance for bid submission so that they can 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.
7. The bidder has to digitally sign and upload the required bid documents one by one as indicated in the tender document.
8. Bidders are requested to note that they should necessarily submit their financial (price Bid) bids in the format provided and no other format is acceptable. If the price bid has been given as a standard BOQ format with the tender document, then the same is to be downloaded and to be filled by all the bidders. Bidders are required to download the BOQ file, open it and complete the white colored (unprotected) cells with their respective 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 and submit it online, without changing the filename. If the BOQ file is found to be modified by the bidder, the bid will be rejected.
9. 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.
10. 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 unauthorized 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. Any bid document that is uploaded to the server is subjected to symmetric encryption using a system generated symmetric key. Further this key is subjected to asymmetric encryption using buyers/bid opener's public keys. Overall, the uploaded tender documents become readable only after the tender opening by the authorized bid openers.

11. The uploaded tender documents become readable only after the tender opening by the authorized bid openers.
12. Upon the successful and timely submission of bids (i.e. after Clicking “Freeze Bid Submission” in the portal), 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.
13. The bid summary has to be printed and kept as an acknowledgment of the submission of the bid. This acknowledgment may be used as an entry pass for any bid opening meetings.
14. Not more than one tender shall be submitted by one contractor or contractors having business relationship.
15. Under no circumstance will father and his son(s) or other close relations who have business relationship with one another (i.e. when one or more partner(s)/director(s) are common) be allowed to tender for the same contract as separate competitors. A breach of this condition will render the tenders of both parties liable to rejection.
16. The bidders are advised to visit CPPP website <https://eprocure.gov.in/eprocure/app> at least 3 days prior to closing date of submission of tender for any corrigendum / addendum/ amendment.
17. Bids will be opened as per date/time as mentioned in the **Tender Document**. After online opening and evaluation of technical bids, the results of their qualification as well Price-Bid opening will be intimated.
18. Submission of a tender by a tenderer implies that he has read all the stipulations contained in this tender document and has acquainted him of the nature, scope and specifications of the items to be followed.
19. The tenderer shall submit all documents after duly filling the same in all respects. Tenders which are found to be vague or incomplete shall be rejected summarily.
20. Tenders shall be submitted ON-LINE, it shall be signed by one who has been authorized by the board of director /director / manufacture/ firm owner /their authorized agents through a resolution/ authority letter. Copy of the resolution/ authority letter in favor of the person signing must accompany the tender.
21. Tenders containing erasures and alterations of the tender documents are liable to be rejected unless these are authenticated by the person signing the Tender Documents.

22. Code of Integrity for Public Procurement

IUAC requires that the bidders, suppliers and contractors observe the highest standard of ethics during the procurement and execution of such contracts. In pursuit of this policy, the following are defined:

Sr. No.	Term	Meaning
(a)	Corrupt practice	The offering, giving, receiving, or soliciting, directly or indirectly, of anything of value to influence the action of a public official in the procurement process or in contract execution.
(b)	Fraudulent practice	a misrepresentation or omission of facts in order to influence a procurement process or the execution of a contract.
(c)	Collusive practice	means a scheme or arrangement between two or more bidders, with or without the knowledge of the purchaser, designed to establish bid prices at artificial, non-competitive levels.
(d)	Coercive practice	means harming or threatening to harm, directly or indirectly, persons or their property to influence their participation in the procurement process or affect the execution of a contract.
(e)	Anti-competitive practice	any collusion, bid rigging or anti-competitive arrangement, or any other practice coming under the purview of the Competition Act, 2002, between two or more bidders, with or without the knowledge of the purchaser, that may impair the transparency, fairness and the progress of the procurement process or to establish bid prices at artificial, non-competitive levels
(f)	Conflict of interest	participation by a bidding firm or any of its affiliates that are either involved in the consultancy contract to which this procurement is linked; or if they are part of more than one bid in the procurement; or if the bidding firm or their personnel have relationships or financial or business transactions with any official of purchaser who are directly or indirectly related to tender or execution process of contract; or improper use of information obtained by the (prospective) bidder from the purchaser with an intent to gain unfair advantage in the procurement process or for personal gain
(g)	Obstructive Practice	materially impede the purchaser's investigation into allegations of one or more of the above mentioned prohibited practices either by deliberately destroying, falsifying, altering; or by concealing of evidence material to the investigation; or by making false statements to investigators and/or by threatening, harassing or intimidating any party to prevent it from disclosing its knowledge of matters relevant to the investigation or from pursuing the investigation; or by impeding the purchaser's Entity's rights of audit or access to information.

ASSISTANCE TO BIDDERS

1. More information useful for submitting online bids on the CPP Portal may be obtained at: <https://eprocure.gov.in/eprocure/app>.

2. Any queries relating to the 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.

3. Any queries relating to the process of online bid submission or queries relating to CPP Portal in general may be directed to the 24x7 CPP Portal Help desk. The contact number for the help desk is 1800 3070 2232, 91-7878007972 and 91-7878007973.

(Seal & Signature of bidder)

**SPECIAL INSTRUCTIONS TO BIDDERS FOR REGISTRATION
WITH COMPETENT AUTHORITY**

Bidders Registration

1. Any bidder from a country which shares a land border with India will be eligible to bid in any procurement whether of goods, services (including consultancy services and non-consultancy services) or works (including turnkey projects) only if the bidder is registered with the Competent Authority constituted by the Department for Promotion of Industry and Internal Trade (DPIIT).
2. **“Bidder”** for the purpose of this tender (including the term 'tenderer', 'consultant' 'vendor' or 'service provider' in certain contexts) means any person or firm or company, including any member of a consortium or joint venture (that is an association of several person, or firms or companies), every artificial juridical person not falling in any of the descriptions of bidders stated here in before, including any agency, branch or office controlled by such person, participating in a procurement process.
3. **“Bidder from a country which shares a land border with India”** for the purpose of this tender means:
 - a) An entity incorporated, established or registered in such a country; or
 - b) A subsidiary of an entity incorporated, established or registered in such a country; or
 - c) An entity substantially controlled through entities incorporated, established or registered in such a country; or
 - d) An entity whose beneficial owner is situated in such a country; or
 - e) An Indian (or other) agent of such an entity; or
 - f) A natural person who is a citizen of such a country; or
 - g) A consortium or joint venture where any member of the consortium or joint venture falls under any of the above
4. **“The Beneficial owner”** for the purpose of (3) above will be as under:
 - i. In case of a company or Limited Liability Partnership, the beneficial owner is the natural person(s), who, whether acting alone or together, or through one or more juridical person(s), has a controlling ownership interest or who exercises control through other means.

Explanation:-

 - a) “Controlling ownership interest” means ownership of, or entitlement to, more than twenty-five per cent of shares or capital or profits of the company;
 - b) “Control” shall include the right to appoint the majority of the directors or to control the management or policy decisions, including by virtue of their shareholding or management rights or shareholders agreements or voting agreements;
 - ii) In case of a partnership firm, the beneficial owner is the natural person(s) who, whether acting alone or together, or through one or more juridical person, has ownership of entitlement to more than fifteen percent of capital or profits of the partnership;
 - iii) In case of an unincorporated association or body of individuals, the beneficial owner is the natural person(s), who, whether acting alone or together, or through one or more juridical person, has ownership of or entitlement to more than fifteen percent of the property or capital or profits of such association or body of individuals;

iv) Where no natural person is identified under (i) or (ii) or (iii) above, the beneficial owner is the relevant natural person who holds the position of senior managing official;

v) In case of a trust, the identification of beneficial owner(s) shall including identification of the author of the trust, the trustee, the beneficiaries with fifteen percent or more interest or more interest in the trust and any other natural person exercising ultimate effective control over the trust through a chain of control or ownership.

5. **“Agent”** for the purpose of this Order is a person employed to do any act for another, or to represent another in dealings with third persons.

6. **Sub-contracting in works contracts** including turnkey contracts, contractors shall not be allowed to sub-contract works to any contractor from a country which shares a land border with India unless such contractor is registered with the Competent Authority.

***Please note that the bidders shall provide the mandatory Certificates in the following formats on their registered Company's letter heads:**

Certificate for Tenders involving procurement from border country

“I/We have read the clause regarding restrictions of procurement from a bidder of a country which shares a land border with India and on sub-contracting to contractors from such countries; I/we certify that we are not from such a country or, if from such a country, have been registered with the Competent Authority and will not sub-contract any work to a contracting from such countries unless such contractor is registered with the Competent Authority. I/we hereby certify that we fulfill all requirements in this regard and is/are eligible to be considered. [Where applicable, evidence of valid registration by the competent Authority shall be attached.]”

Certificate for Tenders for Works involving possibility of sub contracting

“I/We have read the clause regarding restrictions of procurement from a bidder of a country which shares a land border with India and on sub-contracting to contractors from such countries; I/we certify that we are not from such a country or, if from such a country, have been registered with the Competent Authority and will not sub-contract any work to a contracting from such countries unless such contractor is registered with the Competent Authority. I/we hereby certify that we fulfill all requirements in this regard and is/are eligible to be considered. [Where applicable, evidence of valid registration by the competent Authority shall be attached.]”

Certificate by Bidders in the cases of specified TOT

“I have read the clause regarding restrictions on procurement from a bidder having Transfer of Technology (ToT) arrangement. I certify that this bidder does not have any ToT arrangement requiring registration with the competent authority.”

OR

“I have read the clause regarding restrictions on procurement from a bidder having Transfer of Technology (ToT) arrangement. I certify that this bidder has valid registration to participate in this procurement.”

(Seal & Signature of bidder)

GENERAL TERMS AND CONDITIONS OF CONTRACT

2.1. Submission of Tender: Tenders should be uploaded on CPP portal in two parts separately, i.e. "Technical Bid" (Part-A) and "Price Bid / BOQ" (Part-B). No other mode of submission will be accepted. Submission of complete tender document duly stamped and signed by tenderer with technical bid is mandatory. Any clarifications/amendments/corrigenda etc., to NIT before last date of submission of bid will only be available on our website: www.iuac.res.in. Therefore, bidders are advised to keep visiting our website.

2.2 Technical Bid (Part-A): In this bid the bidder should upload his company profile, organizational setup, credentials, list of plant, machinery & tools in his possession. The following documents are essentially to be submitted with technical bid for qualification. Price bid of only those bidders will be opened who are technically qualified.

- a) Tender Acceptance Letter (written on company letter head, duly signed and stamped.) as per format provide in **Annexure B**, as a token of acceptance of the NIT conditions, with this bid.
- b) Profile of the Tenderer as per **Annexure C**.
- c) Proof of Earnest Money Deposit & MSME have to submit Bid Securing Declaration in lieu of EMD/Bid Security as per **Annexure D**.
- d) Code of Integrity & Conflict of Interest undertaking on letter head as per **Annexure E**.
- e) Undertaking by the bidder as per **Annexure F**.
- f) Certificate/ Undertaking for site visit (if applicable) as per **Annexure G**.
- g) Performance statement as per **Annexure-H**
- h) OEM / Authorised dealers or distributors / Bid specific authorisation letter from respective OEM are eligible to submit the bids.
- i) Check list for pre-qualification Bid as per Annexure – I.
- j) Technical Sheet, Annexure-J
- k) Scope of Works and technical specifications as per Annexure -A.
- l) Copies of the work orders and completion certificates of work completed during last 7 years as below:
one work order of value not less than than 80% of the estimated value
or
two work orders of value each of 50% of the estimated value
or
three work orders of value each of 40% of the estimated value
for the SITC of similar kind of items (Air Dehumidifier unit cum Air handling unit of minimum capacity of 5200 cfm and dehumidifier of minimum capacity of 3600 cfm) to Govt. Dept. (Central/State) / PSU / Autonomous bodies / Universities / Public / Pvt Ltd company preferably in NCR.
- m) Copies of previous three financial years (2020-21, 2021-22 & 2022-23) Income Tax Return (ITR).
- n) Average annual turnover during the last three financial years ending 31st March, 2023 [2020-21, 2021-22 & 2022-23] shall be at least Rs 55 lacs. Duly audited financial statement/balance sheet/certified by CA to be submitted as supporting documents.
- o) Self- attested copies of MSME, GST registration and PAN number.
- p) Signed and stamped copy of NIT.

IUAC reserves the right to visit the working sites mentioned by bidders as proof of experience to ascertain the quality of service rendered. The bidder will have to arrange for such visit. However the transport will be arranged by IUAC.

Technical bids which are not confirming to the technical specifications will be disqualified.

2.3 Price Bid (Part-B):

2.3.1 In this bid, the bidder is required to quote his item rates in the BOQ formed in accordance with the scope of work, terms & conditions & technical specifications enclosed. The rates/price quoted by contractor should be all inclusive i.e., should include all material cost, labour, services, plant/machinery/tools & tackles required for work, freight, Insurance, and all applicable Govt. Duties, excluding GST (payable separately, if applicable), levies & taxes, transport/cartage of materials/labour and all other expenses not specifically mentioned but reasonably implied. Nothing over and above these rates shall be payable to contractor. Further, nothing extra in rates will be considered due to any site difficulties. It is mandatory for bidder to quote all items rate as asked for in the BOQ/ PRICE schedule. Failure in not filling some item rates will lead to be considered them as zero and accepted. No further compensation on that item can be considered later. The bidders should quote unconditional rates.

2.3.2 The bidder shall fill up the Bill of Quantity (BOQ) which is price bid. The BOQ should be filled up carefully as it will be used for evaluation of L1. The contract will be awarded to L1 bidder subject to fulfilment of other terms and conditions of tender. MSME bidder will be given price preference subject to fulfilment of conditions as prescribed by the Government of India from time to time.

1. The price quoted shall remain fixed during the contract period and shall not vary on any account.
2. No payment other than as specified in the price schedule for each item and which has been accepted by the bidder, shall be payable to the successful bidder.

2.4 Period Of Validity of Bids: Tender shall be valid for acceptance without any change in rates and NIT conditions for a period of 90 days from the date of opening of Price bid. No Bidder can withdraw/or modify his tender or revoke the same within the said period of 90 days. If a Bidder on his own withdraws or revokes the tender or revises or alters or modifies the tender for any item or condition within a period of aforesaid 90 days his EMD deposit shall stand forfeited and action will be taken as per Bid Security Declaration. The validity of accepted rates is extendable for a period of 180 days from the date of issue of Award Letter, with mutual consent of both the parties.

2.5 Earnest Money Deposit: EMD @ 2% of total estimate value Rs. 106000 (Rupees one lac and six thousands) is payable by the bidder. Bidder has to select the payment option as “**online**” to pay the EMD as applicable by going to the link <https://services.sabpaisa.in/pages/iuac.html>. The Earnest Money Deposit shall be in the form of online payment and it should be deposited before the bid opening.

EMD of technically disqualified bidders will be returned within 15 days from the date of evaluation of the technical bids. The refund of EMD to all the bidders except lowest shall be made within 15 days from the date of opening of price bid. The EMD of the successful lowest bidder (L1) shall be held back as security deposit and will be released after completion of the works and site clearance.

Bid Security shall be refunded to the un-successful bidders on award of contract and to successful bidders on receipt of Performance Security.

EMD is the mandatory requirement however the MSMEs/NSIC registered with Government Agencies are exempted from payment of Earnest Money Deposit (EMD) and are required to submit Bid Security Declaration as per Annexure C form subject to conditions given below: -

MSMEs participating in the tender must submit valid & authorized copy of certificate of registration. The MSME's Bidder to note and ensure that nature of services and goods/items manufactured mentioned in MSME's certificate matches with the nature of the services and goods /items to be supplied as per Tender.

The registration certificate issued by agencies must be valid as on Bid closing date of the tender. Bidder shall ensure validity of registration certificate in case bid closing date is extended.

The MSMEs who have applied for registration or renewal of registration with any of the authorized agencies / bodies but have not obtained the valid certificate as on close date of the tender, are not eligible for exemption / preference.

2.6 Submission of Bids

The online bid shall be neat, plain and intelligible. The authorized person should sign each page of the bid. They should not contain any terms and conditions, printed or otherwise, which are not applicable to the Bid. The conditional bid will be summarily rejected. Insertions, postscripts, additions and alterations shall not be recognized, unless confirmed by bidder's signature.

2.7 Deadline for Submission of Bids

a) Bids must be submitted on-line before the due date and time as specified in the critical date sheet.

b) IUAC may extend this deadline for submission of bids by amending the bid documents and the same shall be suitably notified on the websites only.

2.8 Late Bids : The on-line bid submission would not be possible after the deadline for submission of bids

2.9 Bid Opening and Evaluation of Bids

Opening of Bids

a) The E-bids shall be opened on-line. The technical bids will be evaluated to short-list the eligible bidders. The technical bids of only eligible bidders shall be considered for further processing (technical evaluation).

b) Bidder whose technical bid is found to be acceptable and meeting the eligibility requirements as specified in this tender will be considered as technically qualified.

c) IUAC will open commercial bids of only the technically qualified/short-listed bids

d) In case, the day of bid opening is declared a holiday by the government, the E-bids will be opened on the next working day at the same time. No separate intimation shall be sent to the bidders in this regard.

e) Since E-bid is an on-line process, the E-bid opening or any other process may be delayed due to any technical/server issue. If any such issue arises, this will not be tantamount to process delay and IUAC will not be responsible for the same.

f) On opening of bids on-line, accepting the bid would not mean that the firm is technically or financially qualified.

g) Instances of Multiple L1s: The order of selection of successful contractor in case of multiple L1 may be as under conditions:

i. Submission of past experience and work orders issued by IUAC.

ii. Submission of highest turnover among the bidders who, if qualifies the above clause.

2.10 Tender liable to rejection : Tenders which do not fulfil all or any of the conditions laid down in this notice, or contain conditions not covered and / or not contemplated by the

Conditions of tender document and/or expressly prohibited therein or stipulate additional/alternative conditions shall be liable to be rejected and his earnest money will be forfeited. Tenders shall also be liable for rejection on any of the following grounds: -(i) Tenders containing remarks uncalled for

- (ii) Conditional tenders
- (iii) Tenders not submitted on prescribed Proforma
- (iv) Telegraphic / Fax/ Postal tenders
- (v) Tenders submitted late
- (vi) Tenders with NIL consideration
- (vii) Not submitted required documents as per tender

2.11 Amendment of Tender Documents

2.11.1 At any time prior to the deadline for submission of bids, IUAC may, for any reason, whether on its own initiative or in response to the clarification request by a prospective bidder, modify the bid document.

2.11.2 All prospective bidders who have downloaded the bidding document will be notified of the amendment(s), if any, on IUAC website / CPP portal, and such amendments/ modifications will be binding on them.

2.11.3 IUAC at its discretion may extend the deadline for the submission of bids if the bid document undergoes changes during the bidding period, in order to give prospective bidders time to take into the consideration the amendments while preparing their bids.

2.11.4 Bidders should keep viewing the above-mentioned websites for any corrigendum/change. There wouldn't be any newspaper advertisement towards the same. If any bidder misses the information published on the website and their bid is rejected, no complaint would be entertained.

2.12 Reservation of Procurement for certain class of products from Micro and Small Enterprises (MSEs) shall be considered as per the rules of Government of India.

2.12.1 MSEs procurement policy is meant for procurement for only goods produced and services rendered by MSEs and not for any trading activities by them as MSE Unit will not get any purchase preference over another MSE Unit.

2.13 Evaluation of Proposals & Award Criteria

2.13.1 The bidder must quote for all the items mentioned under Section **ANNEXURE-C-Schedule of Requirement**. The lowest price criteria shall be applied on the total composite amount (Inclusive of all) of all items taken together.

2.13.2 Preliminary scrutiny of the proposal will be made to determine whether they are complete, required processing fee (Tender Fee) and bid security (EMD) have been furnished, whether the uploaded documents have been properly signed and whether the bids are generally in order. Proposals not conforming to such preliminary requirements will be prima facie rejected.

2.13.3 Bids complying with all the eligibility requirements mentioned in this tender document and fulfilling the specifications and schedule of requirements shall be treated as substantially responsive bids. Responsiveness of the bids shall be determined on the basis of the contents of the bid itself and shall not be determined by extrinsic evidences.

2.13.4 IUAC, if provided for in the NIT, may ask bidders for presentation on the solution offered. Failure on part of bidder to arrange the presentation on the date & place fixed shall

result in the rejection of technical bids and financial bids of these bidders shall not be opened. Also, if it is found after presentation that the solution offered is not meeting the specifications prescribed by, such bidders shall be treated as substantially non-responsive. IUAC decision shall be final in this regard. The place for presentation shall be conveyed to the bidders at an appropriate date.

2.13.5 Commercial bids of only those bidders will be opened who are found to be technically responsive and the work shall be awarded to the commercially lowest bidder.

2.13.6 Bidder should quote their rates by uploading in prescribed Performa in BOQ_XXXX.xls only. Commercial bids/ prices/ rates other than the format provided or elsewhere in the bid document shall be rejected by IUAC.

2.13.7 The rates quoted in figures would be automatically converted in words in BOQ_XXXX.xls. The bidder should carefully cross check the prices entered in figures with corresponding figures converted in words. In case of discrepancy between words and figures, the rates quoted in words shall be treated as final. The correct amount will be calculated by multiplying unit price with quantity and in case of any discrepancy, the corrected amount shall be considered and total of all corrected amount shall be bidder's total quoted amount.

2.13.8 In the copies of supply order/ contract/ agreement/ experience certificate submitted by the bidder, if the currency is other than Indian Rupees, the value of work in Indian Rupees shall be determined by using the exchange rate declared by Reserve Bank of India as on the last date of submission of technical/ commercial bids and the eligibility of the bidder shall be determined accordingly.

2.13.9 The successful bidder shall not be allowed to sub-contract works to any contractor from a country, which shares a land border with India unless such contractor is registered with the Competent Authority of Government of India.

2.14 Performance Security

The successful bidder shall be required to deposit an amount equal to 10% of the tendered value of the contract as Performance Security within 15 days after notification of the award / LOI and it should remain valid for a period of 60 (sixty) days beyond the date of completion of all contractual obligations of the contractor, including Defect Liability Period (DLP).

Performance security may be accepted as Insurance Surety Bond³⁷, account payee demand draft, fixed deposit receipt from a commercial bank, bank guarantee issued/ confirmed from any of the commercial bank in India or online payment in an acceptable form, safeguarding the Procuring Entity's interest in all respects. In case of a JV, the BG towards performance security shall be provided by all partners in proportion to their participation in the project. If tenderer fails to deposit the said performance security within the period as indicated, the LOI may automatically stand cancelled without any notice to the tenderer and without prejudice to any other right.

2.14.1 Security Deposit : A security deposit equal to nil % of the value of work (excluding of GST) will be deducted from Contractor's bills and shall be refunded after the completion of defect liability period of one year after ensuring successful performance of the system executed by the contractor.

2.15 Scope of Work/Technical Specification

2.15.1 If, for any unforeseen reasons, IUAC is required to change the Scope of the Supply, this change shall be acceptable to the bidder without change in the unit price quoted.

2.15.2 IUAC reserves the right to reject one/ all the bids or cancel the tender without assigning any reasons there for.

2.15.3 IUAC reserves the right to accord relaxation uniformly to all the bidders in case the bid submitted by all the bidders are found to have minor deviation.

2.16 Time-line for completion: The works (Design, Drawings, approvals, manufacture, supply, shifting, installation, testing and commissioning) should be completed within 6 (six)

months from the date of issue of Purchase Order.

The shifting and installation of dehumidifier shall be carried out within 7 (seven) days of giving site clearance by IUAC after dismantle of old dehumidifier and making of new foundation by the IUAC. Any delay in this is liable to liquidated damages as per NIT clause 2.25.

Any delay in completion of the work / supply due to reasons attributable to the vendor / manufacturer is liable to liquidated damages as per NIT clause 2.25

However, under the force-majeure conditions as mentioned in the NIT cluse 2.26, IUAC may grant suitable time extension for which vendor has to request along with proper justification / reasons well in advance to the Director, IUAC for approval without any prejudice or price escalation.

2.17 Guarantee & Defect liability period

The supplied material should be guaranteed from manufacturing/ engineering defect and bad material/workmanship for a minimum period of one year from the date of acceptance of the goods by IUAC. During this period if any replacement/repairs/rectification of any of the supplied item etc. is needed, the supplier shall do the same free of cost to IUAC. If the equipment/ part needs to be shipped to the service Centre for repair/rectification during the guarantee period, the shipment charges should be borne by the supplier. The supplier shall guarantee that all equipment shall work satisfactorily and that the performance and efficiency of the equipment shall not be less than the specified values. The bidder shall assure the supply of spare parts after warranty is over for maintenance of the equipment supplied if and when required for a period of at least two years.

2.18 Site Conditions

Contractor shall acquaint himself fully with the site conditions and the working environment of IUAC before quoting his rates. A Bidder shall be deemed to have full knowledge of the site, whether he inspects it or not and no compensation or otherwise of any charges incurred or to be incurred consequent on any misunderstanding or otherwise shall be admissible.

No Compensation on account of any site difficulties will be entertained, at a later date, after the award of the work. (The bidder should sign undertaking as per ANNEXURE-G enclosed in tender. Failure will result in forfeiture of performance security / EMD).

2.19 Installation, Commissioning, Demonstration, Inspection and Tests

Bidder shall be responsible for Design, Supply, Installation, Commissioning, Demonstration, Inspections and Tests wherever applicable and for after sales service including supply of spares during the warranty and thereafter as specified in the NIT.

2.20 Insurance

For delivery of goods at the purchaser's premises, the insurance shall be obtained by the supplier in an amount equal to 110% of the value of the goods from "warehouse to warehouse" (final destinations) on "All Risks" basis including War Risks and Strikes.

2.21 Payment Terms

The payment shall be made on timely submission of the bills in proper format by the contractor after due certification by the IUAC engineer responsible for supervision of the work. TDS and other statutory deductions will be made as per rules.

2.21.2 Payment for Goods and Services supplied from India: The payment shall be made in Indian Rupees, as follows:

I. Seventy (70) percent Payment will be released after delivery of the material at site.

ii. Twenty (20%) percent Payment will be released after satisfactory completion of installation, successful testing, commissioning & acceptance of the system by IUAC.

iii. Balance Ten (10%) percent of the Payment will be held up against the warranty period of one year or the same may be released, subject to submission of Bank Guaranty/FDR of amount equivalent to Ten (10%) percent of final bill value valid for one year towards the warranty.

2.22 Escalation: No escalation over and above items rates quoted by the bidder, shall be paid during the execution of contract.

2.23 Deviations: No deviation from the stipulated terms and conditions will be allowed. Tender will be unconditional.

2.24 Delay in the supplier's performance

2.24.1 The supplier shall deliver the goods and perform the services under the contract within the time schedule specified by the purchaser in the Schedule of Requirements and as incorporated in the contract.

2.24.2 Any unexcused delay by the supplier in maintaining its contractual obligations towards delivery of goods and performance of services shall render the supplier liable to any or all of the following sanctions:

- (i) Imposition of liquidated damages,
- (ii) Forfeiture of its performance security and
- (ii) Termination of the contract for default.

If at any time during the currency of the contract, the supplier encounters conditions hindering timely delivery of the goods and performance of services, the supplier shall promptly inform the purchaser in writing about the same and its likely duration and make a request to the purchaser for extension of the delivery schedule accordingly. On receiving the supplier's communication, the purchaser shall examine the situation as soon as possible and, at its discretion, may agree to extend the delivery schedule, with or without liquidated damages for completion of supplier's contractual obligations by issuing an amendment to the contract.

2.25 Liquidated Damages

In case the work is delayed beyond the specified completion period for reasons attributable to the contractor, deductions on account of Liquidated damages: for repair works costing up to Rs Ten Lakhs – one (1%) percent of the contract value per week and for all other works half (0.5%) percent of the contract value per week of delay subject to a maximum of ten (10 %) percent of the contract value. However, during the delayed period, IUAC also reserves the right to get balance portion of work done by any other contractor at the risk and cost of the existing contractor and amount to that effect along with 10% overhead charges will be deductible from his bills/dues.

2.26 Force Majeure

The right of the contractor/supplier to proceed with the work shall not be terminated because of any delay in the completion of the work due to unforeseeable causes beyond the control and without the fault or negligence of the contractor / supplier, including not limited to acts of God, Pandemic, or of the public enemy, restraints of a sovereign state, firms, wars, fires, epidemics, quarantine restrictions, floods, unusually severe weather. If a Force Majeure situation arises, the supplier / contractor shall promptly notify along with the justification / reasons well in advance to the Director IUAC for approval without any prejudice to price escalation. No time extension request shall be considered after the expiry of completion period/contract. The

decision of the IUAC, Director will be final and binding on the supplier/contractor.

2.27 Rules governing the Contractor's employees working in the Centre's premises:

The contractor's employees working inside the IUAC campus will abide by IUAC terms. Any damage to the Centre's property due to mishandling, carelessness etc., on the part of contractor or his workmen will be recoverable from the contractor's bills.

- a) All the persons deployed by the contractor at IUAC will have to carry valid gate-passes, which will be issued only after submission of their bio-data in desired format. Any negligence / offense on their part will attract immediate removal from site.
- b) All the employees will have to be covered under insurance against any personal accident and IUAC will not be liable for payment of any compensation on that account.
- c) All the persons deployed by the contractor at IUAC will have to get the police verification done from competent authorities. The contractor has to submit the police verification certificate and acknowledgment slip of the same for all the employees to IUAC.
- d) During execution of work, the contractor should follow all standard norms of safety measures/precautions to avoid accidents/damages to men, machines and buildings. On non-adherence of this clause, suitable fines, as decided by the Director, IUAC shall be imposed.
- e) Manpower deployed by the contractor at our site for carrying out the contracted works is strictly prohibited being associated with any other works other than the awarded works on the campus.
- f) If any contractor's person is found to be misbehaving or to be negligent in the duties assigned to him/her, IUAC reserves the right to seek his/her removal from IUAC, with suitable replacement within 24 hours.
- g) No material belonging to the contractor whether consumable or non-consumable should be brought inside the IUAC campus without proper entry at the main gate nor any material should be taken out without proper gate pass issued by the Centre.
- h) In case of any injury to contractor's person at IUAC campus, due to any reason, the contractor shall be responsible for taking the person to the hospital / nursing home / dispensary for treatment at his own cost. If in the case of emergency IUAC vehicle is used, IUAC incurs any expenditure on the treatment of the person, the contractor will be suitably charged for the same.
- i) Under no circumstances the contractor will be permitted to sublet his work to any another contractor while working at IUAC. Likewise, the Contractors persons will not be permitted to undertake any private jobs in the IUAC Campus.
- j) No labour below the age of 18 years shall be employed on work.
- k) IUAC will provide free water and electricity at one point and contractor has to make his own arrangements from that point as per his requirements.

2.29 Clarification of Bids and shortfall documents: During the evaluation of Techno commercial or Financial Bids, Indenter on behalf of IUAC may, at its discretion, but without any obligation to do so, ask Bidder to clarify its bid by a specified date. Bidder should answer the clarification within that specified date (or, if not specified, 7 days from the date of receipt of such request). The request for clarification shall be submitted in writing or electronically and no change in prices or substance of the bid shall be sought, offered, or permitted that may grant any undue advantage to such bidder.

If discrepancies exist between the uploaded scanned copies and the Originals submitted by the bidder, the original copy's text, etc., shall prevail. Any substantive discrepancy shall be construed as a violation of the Code of Integrity, and the bid shall be liable to be rejected as

non-responsive in addition to other punitive actions under the Tender Document for violation of the Code of Conduct.

IUAC reserves its right to, but without any obligation to do so, to seek any shortfall information/ documents only in case of historical documents which pre-existed at the time of the tender opening, and which have not undergone change since then and does not grant any undue advantage to any bidder.

2.30 Water /Electricity for Execution of Works: (Not Applicable for this work)

Electricity and water required to execute the work shall be made available at one point by IUAC subject to the following conditions: -

(I)The Electricity and water charges @ 1% and 1 % respectively shall be recovered on gross amount (excluding of GST) of the work done.

(ii) The contractor(s) shall make his/their own arrangement of electricity and water connection by laying of electric cable / pipelines from the existing main source of electric/water supply.

(iii) The Department do not guarantee to maintain uninterrupted supply of electricity / water and it will be incumbent on the contractor(s) to make alternative arrangements for electricity /water at his/ their own cost in the event of any temporary break down in the Government electric/ water main so that the progress of his/their work is not held up for want of electricity and water. No claim of damage or refund of charges will be entertained on account of such incident.

2.31 The Centre reserves the right to reject any or all the tenders in full or in part without assigning any reasons whatsoever and the decision of the IUAC in this regard will be binding on all the bidders. Tenders not complying with any of the provisions stated in this tender document are liable to be rejected. Director, IUAC reserves the right to accept or reject any tender without assigning any reason and does not bind himself to accept the lowest tender. Tender once submitted will remain with IUAC and will not be returned to the bidders.

2.32 Jurisdiction: Notwithstanding any other courts having jurisdiction to decide the questions forming subject matter of a suit any and all actions and proceedings arising out of or relative to this contract (including any arbitration in terms thereof) shall lie only in the court of competent Civil jurisdiction in this behalf at New Delhi., where this contract is to be signed on behalf of and only the said court shall have jurisdiction to try any such actions and/or proceedings to the exclusion of all other courts.

2.33 Dispute Settlement: It is mutually agreed that all differences and disputes arising out of or in connection with these agreements shall be settled by mutual discussions and negotiations if such disputes and differences cannot be settled and resolved by discussions and negotiations then the same shall be referred to the sole Arbitrator appointed by the Director, IUAC whose decision shall be final and binding on both the parties. The contract shall be governed by laws and procedures established by Govt. of India, within the framework of applicable legislation and enactment made from time to time concerning such commercial dealings/ processing.

2.34 Termination of Contract: - The Director, IUAC reserve the right to terminate the contract immediately on account of poor workmen ship, failure to mobilize the site within 15 days, non-compliance of set norms/ specifications for the works, delay in progress of work, violation of any contract provisions by the contractor. In such cases, the Bank Guarantee equivalent to one month's contract value held with IUAC and the EMD will be forfeited. The contract can also be terminated at the request of either party. In such cases, the contractor is liable to give two months' notice period or else to pay two months O&M bill value in-lieu of the notice period.

2.35 Resolution of Dispute: All disputes arising out of this contract shall be referred to the sole arbitration of a person selected by the contractor out of the panel of three persons nominated by the Director IUAC, and his decision /award shall be final and binding on both parties. The Arbitration shall be governed under the Indian Arbitration Act 1996 or any statutory modifications or re-enactment thereof and rules made there under and for the time

being in force shall apply to the arbitration proceeding under this contract. Any dispute arising out of this contract will be subjected to jurisdiction of New Delhi/Delhi.

2.35 Correspondence: All the correspondence in respect of tender/contractual obligation shall be addressed to A.O. (S&P), Inter-University Accelerator Centre (IUAC), P.B. No. 10502, Aruna Asaf Ali Marg, New Delhi-110067.

For any inquiries regarding technical aspect may contact Mr. Bishamber Kumar, Engineer-In-Charge, e-mail: bkg.iuac@gmail.com, Phone: +91-11-24126018, 24126022.

2.36 This notice inviting tender will form part of the contract agreement to be executed by the successful tenderer on a stamp paper of Rs.100/-.

Accepted

Signature of the Bidder

Name and Address of the Bidder)

SPECIAL TERMS AND CONDITIONS OF CONTRACT /WORK

- a) **CARRYING OUT OF WORK** : All the work shall be carried out in accordance strictly as per the specifications given in the tender to the total satisfaction of the Institute
- b) **CONTRACTOR'S RESPONSIBILITY FOR THE MANNER OF EXECUTION OF WORKS** : **The contractor shall be solely responsible for the manner and the method of executing the work.** The work shall be subject to the approval of IUAC from time to time for purposes of determination of the question whether the work is executed by the contractor in accordance with the contract.
- c) **SPECIFICATIONS**: During execution of work, the contractor should follow all standard norms of safety measures/precautions as per relevant codes to avoid accidents/damages to man, machines and buildings, at his own cost. If specifications for an item of work are not covered as per approved Specifications of tender, the same shall be decided by the Institute and shall be binding on the contractor.
- d) **AGENCY'S RISKS**: All risks of loss of a or damage to physical property and of personal injury and death which arise during and in consequence of the performance of the contract other than the excepted risks are the responsibility of the contractor.
- e) **ACTION AND COMPENSATION PAYABLE IN CASE OF BAD WORK**: If it shall appear to IUAC, or our representatives, that any work has been executed with unsound, imperfect or unskillful workmanship **then the contractor shall be liable to pay compensation.**
- f) If during the execution of works, any damage is caused to IUAC property by contractor's workers, contractor will duly make good the loss. IUAC has the right to make suitable deduction from contractor's bills along with penalty, if contractor fails to make good the loss.
- g) No material belonging to the contractor whether consumable or non-consumable should be brought inside the IUAC campus without proper entry at the Main Gate nor any material should be taken out without proper gate pass issued by the authorized representatives of the Centre. Material delivery challans duly entered at the main gate shall to be submitted. It shall always prevail, unless otherwise specifically stated, that the entire provisions of Tender document been opened upon and accepted for compliance by the contractor without any reservation.
- h) If during the execution of works, any damage is caused to IUAC property by contractor's workers, contractor will duly make good the loss. IUAC has the right to make suitable deduction from contractor's bills along with penalty, if contractor fails to make good the loss.
- i) During execution of work, the contractor should follow all standard norms of safety measures/precautions as per relevant codes to avoid accidents/damages to man, machines and buildings, at his own cost. Contractor will have his own arrangement to escort the labour to the nearest hospital for treatment in case any injury happens to any worker during execution of work.

Seal & Signature of Bidder

1. Introduction:

We have one no. of dehumidifier cum air handling unit, Make-Bryair, Model-MVB-45D, dehumidifier capacity of 4500 cfm, AHU capacity of 6600 cfm, installed at 293 MSL i.e at height of 45 m at top inside stairs shaft running since 1988. It is proposed to replace the same with the new one of similar capacity / parameters.

2. Scope of Supply and Work:

The price quoted by the bidder shall cover the cost of items as following:

1. It covers design and supply, assembly, erection, testing and commissioning of standard working complete new Dehumidifier cum air handling unit including double skin glass / rock wool fibre sandwiched panels, desiccant rotor and desiccant rotor rotating assembly pre cooling coil, post cooling coils, reactivation blower and motor assembly, process blower and motor assembly, by pass duct, air filters, reactivation air electrical heaters, electrical power and control panel, fully automatic operation microprocessor control with digital display, instrumentation, wiring etc., conducting performance tests at site and meet the desired air conditions inside room..

2. Site Installation Conditions:

It is mandatory that vendors should inspect the site before quoting the rates, so as to ensure that the new Dehumidifier will be shifted through the available access and fit in the available area with proper working space all around.

The unit shall be shifted to place in modular / dismantle form through stairs / hoisting shaft.

The material shall be lifted / shifted through hoisting shaft of opening of 1500 mm (Width) x 1500 mm (Depth). It involves removal of the false ceiling of 40 sqm approx. And re-fixing the same to original condition. Hence the dimension of biggest part of the dehumidifier shall be less than 1500 mm width x 1500 depth x 2100 height.

In case the unit is shifted through the stairs, the stair opening is 920 width x 2000 height mm. Hence the dimension of biggest part of the dehumidifier shall be less than 920 mm width x 2000 height.

It is entirely bidder's responsibility to ensure that the new Dehumidifier is shifted to the place of installation i.e. at 45 m height from the ground through the existing access i.e. hoisting shaft / stairs.

It shall be shifted to place of installation in dismantled condition such that no part if larger than 1500 mm x 1500 mm x 2100 mm and unit shall be re-assembled at site. If any modification in door opening / civil work / dismantling of temporary partitioning / false ceilings etc. is required, it should be taken into account in the quoted cost and no extra claim will be entertained.

3. The supplier shall give the performance and capacity test of all the equipment for it's rated parameters after installation, testing & commissioning at site. It is entirely bidder's

responsibility to ensure that the room desired air condition is maintained. And test for the same shall be conducted for minimum one week running.

4. Electrical Panel including MCCB, OLR, Contactors, Ampere / voltage digital meter, start / stop push buttons, indicating lamps for on / off for blowers and heaters, SPP, sequence timer, VFD units (for process blower motor, reactivation blower motor, desiccant rotor motor in loop with the RH / temperature sensors), as per requirements.
5. The dehumidifier shall have warranty period of one year from the date of commissioning. The same shall be provided by the OEM.
6. Power / Control cable shall be laid in the tray / wall and include cable, ties, compression glands, thimbles, terminations, laying, saddles, fasteners etc.
7. **Inspection:** Inspection visits for raw material, during fabrication, testing arrangement at factory / manufacturer's place and before final dispatch shall be made by the bidder. Cost towards inspection shall be born by the vendor. However cost of transport / lodging if any, for inspection shall be born by the IUAC.
8. **Codes and Standards :** All the design / material / workman ship / fabrication shall conform to the latest editions of relevant Indian / American Standard Codes.

Documents to be furnished by Vendor After Award of Contract :

- a) Activity bar Chart
- b) Selection sheet / data sheet for Dehumidifier, AHU, cooling coil, Blower, Heaters, filters etc.
- c) List of Make, Model and specifications of all the items for approval before supply at site.
- d) General Arrangement Drawing for Dehumidifier, AHU, ducting, electrical panel etc. or as required by Engineer In-charge.
- e) Drawing Showing details of each section of AHU indicating connection details, mounting, foundation data etc.
- f) Electrical panel, power and control circuit drawings.
- g) Manufacturer's material and test certificate, reports, manuals for dehumidifier, AHU, Process blower, motor, filters, piping, duct sheets, valves cooling coils, heaters, reactivation blower, desiccant blower etc. should be submitted for all the material.
- h) Performance curves and details for
 - 1. Fan
 - 2. Cooling coil
 - 3. Filter.
 - 4. Desiccant rotor

(Technical Specifications):

1. General:

The **Industrial Dehumidifier**, is the key component in maintaining the critical requirement of moisture and humidity in the process area. The dehumidifier manufacturer shall have an experience of manufacturing similar type rotary desiccant dehumidifiers.

The dehumidifier shall be of the industrial type and manufactured to the highest consistency and reliability and ecology standards

The dehumidifier shall be modular fully factory assembled, and shall be fully functionally tested at the manufacturer's facility prior to shipment.

The dehumidifier manufacturer shall have sufficient factory trained service personnel in Delhi / NCR to provide a quick and efficient service back up, whenever required.

The Industrial dehumidifier shall be of the rotary type, employing the principle of chemical adsorption to remove moisture from the air on a continuous basis by use of desiccant synthesized on fluted type media.

The dehumidifier, designed for industrial applications, shall conform strictly to the specifications given hereunder.

2. SCOPE OF WORK:

The contractor shall furnish, install and place in operation, acceptable to the engineer, dehumidifier unit with flexible connectors, filters, volume dampers, control panel, and all necessary controls for proper operation of the system as required.

The dehumidifier unit shall be arranged to provide continuous dehumidification with constant outlet temperature and humidity for a given inlet condition. The unit shall have two or more sector using fluted (honeycomb) desiccant media.

3. DEHUMIDIFIER

The dehumidifier shall be capable of sustained operation of either process or reactivation fan without energized reactivation heat for prolonged periods of operation without damage to the humidity transfer media.

The dehumidifier shall consist of a high efficiency desiccant rotor mounted on a horizontal fixed shaft arrangement with bypass arrangement auto modulating the air quantity through face & bypass damper. It shall have positive sealing of process and reactivation air streams to allow for independent airflow with no balancing required. The dehumidifier shall be fully automatic, factory assembled package unit, complete with reactivation electric heaters with SCR control, filters, motors, fans with VFD's, desiccant bed drive assembly with VFD, access panels, volume dampers, duly factory assembled electrical panel, desiccant rotor, and all sensors and auxiliaries as recommended by the manufacturer for safe, unattended, automatic operation including remote monitoring.

The dehumidifier framework / casing shall be made from tubular SS / MS hollow sections, duly welded, and shall be of industrial design and robust body of industrial quality, for maximum durability, life, and strength, with advanced component welding and joining techniques.

All panel work will be 43 mm thick double skin duly insulated with Eco friendly glass fibre insulation. The external panels will be pre coated and shall be at least 0.8 mm thick. The inside

skin / panel shall be either SS / GI and shall be at least 0.8 mm thick. The insulation, between the panels, shall be glass fibre, or rock wool, with a minimum density of 48 kg/cum.

The dehumidifier framework together with sandwich panels shall be fabricated using industrial welding / joining techniques to ensure moisture leak proof construction and meeting SMACNA class 6 qualification.

The dehumidifier unit casing shall be optimized for space and to ensure ease of service and inspection. It shall have test points for air pressure and air flow measurements. Requisite observation windows shall be provided to permit visual inspection of the rotor and supply fan while it is in operation.

The desiccant honeycomb rotor media shall be adsorbent, non-toxic, nonflammable, fully water washable, having metal silicate desiccant synthesized in-situ, on an inorganic fibre substrate, with net organics less than 2%. The desiccant rotor shall have a perimeter flange, and shall have "teeth" located around the perimeter, to ensure a positive and slip free rotation with a chain drive mechanism. The desiccant rotor shall rotate on integral long life pillow bearings supported by a fixed shaft design which allows a simple slide out of the bed along with the centre shaft, for ease of maintenance and inspection. The desiccant rotor shall have long life with adequate air filtration.

Special high quality silicon bulb seals, dividing the process and reactivation air streams, shall be designed to positively seal the two air streams for inter- compartmental air and moisture leakage, at up to 6 to 8" W.G. differential pressure. The seals shall be made from high temperature silicon rubber with PTFE composition coated face for low friction, durability, and long life. For maximizing the seal life, the perimeter seals should not contact the face of the fluted media, but seal the smooth perimeter flange of the rotor, thus ensuring that the seals will have a long life and will not be cut, torn, or otherwise damaged. Seals should not be fastened, screwed, or riveted, but should be of the slip on type so that the seals are simple and easy to replace with no tools required.

The reactivation heat source, built into the dehumidifier casing/unit, shall be electric, installed with filters controlled through SCR.

Both process and reactivation fan and motor assemblies shall be factory mounted as an integral part of the dehumidifier system. The process and reactivation fan blowers shall be designed for a minimum external static pressure of 1.5 inch and 1.0 inch WG respectively and will be controlled through VFD.

The process and reactivation blowers shall be mounted on the pillow block bearings, provided with spring type vibration isolation, belt driven, motor mounted on aluminium section with the belt tension arrangement for sliding of motor. The pulleys shall be mounted on the motor / blower shaft with taper bush arrangement for ease of dismounting and mounting over the shafts.

The process and reactivation motors shall be of the TEFC (totally enclosed fan cooled) type.

The control panel shall be integral part of the unit and shall have factory wired fan motor starters, and auxiliary controls. Operation of the dehumidifier system will be the advance dedicated PLC specially designed for low humidity application with inbuilt patented algorithms for optimizing energy consumption on a dynamic basis.

9. DESICCANT ROTOR

The desiccant honey comb rotor media shall be adsorbent, non-toxic, non-flammable, fully water washable. The substrate of the rotor shall not be made from asbestos or any synthetic material, and shall not have any toxic desiccants impregnated like lithium chloride, etc.

The desiccant media shall have in-situ synthesized metal silicate desiccant on an inert inorganic fibre substrate.

The active desiccant material shall be at least 80% of the media weight, so as to ensure high performance and minimal heat carry over.

The net organics in the honeycomb media shall not exceed 2%.

The desiccant rotor shall have integral pillow block type long life bearings supported by a simple fixed shaft design to allow a simple slide out of the rotor / bed.

The desiccant media shall have a perimeter flange which should encircle the entire perimeter so as to allow greater durability and to roll the rotor on the ground, without damage. The perimeter flange should be smooth and consistent to serve as a perimeter seal surface, thus ensuring long life for the perimeter seal, without being cut, torn or otherwise damaged.

The desiccant media shall not fracture due to repeated temperature and moisture cycling and all the materials of construction shall be nontoxic.

The surface of the media shall have a special edge hardening so as to ensure a smooth surface and long life of both the media and the seal contacting it.

The desiccant media shall not use any organic burn off process, as this shall weaken the media structure.

10. FILTERS

All air entering the dehumidifier must be filtered. Unless otherwise indicated, filters shall have minimum rating of EU4 and of a size and capacity as recommended for air shown. Filters shall be installed for front removal, or removal from side of duct work. All filters shall be of cleanable types.

11. VOLUME DAMPERS

All volume dampers on the dehumidifier shall be of multi blade, opposed blade type with locking quadrants. Dampers shall be factory installed at the outlets of both process and reactivation air fans. The damper shaft exposed at the quadrant shall be notched to indicate the position of damper blades.

12. PACKAGE ABILITY

The dehumidifier system shall be modular in design with factory assembled pre cool and post cool modular boxes with requisite auto face and bypass dampers. These modular boxes shall have the same construction method as the unit casing for material of construction, water vapour leakage, industrial use, and paint work.

13. ELECTRICALS & SAFETY DEVICES:

The Power & control panel shall be factory pre wired for the system operation and shall be supplied with MCBs/MCCBs, contactors, overload protection, microprocessor controller for temperature & RH and all the necessary components to ensure a continuous automatic operation of units. The control panel shall be complete with microprocessor base, provision for Mod bus connectivity to BMS for data exchange etc. Dehumidifier Digital Controller which shall have a mimic diagram of the functioning of the unit and shall have a full diagnostics facility of faults and/or alarms. All necessary power and control cabling of dehumidifier unit shall be provided by Dehumidifier supplier.

The control panel shall be factory prewired for the system operation and shall be supplied with touch panel 7" HMI. Fuse/MCB's contactors, starters, control transformer, overload protection, and all the necessary components to ensure a continuous automatic operation.

The dehumidifier contains the energy management control system. This system incorporates energy optimization software and hardware that adjusts the following control parameters:

- a. Rotor speed
- b. Reactivation airflow volume
- c. Process airflow volume
- d. Reactivation inlet air temperature
- e. Reactivation discharge temperature
- f. Face bypass control damper.

The unit shall be provided with safety interlock option, so that the dehumidifier cannot run if access panels or the control panel door are open/removed.

In accordance with IEC regulation, one independent thermostat shall be provided for automatic shutdown.

The control system shall also provide the following.

- 7 inch Touch panel for easy interface and operation Supervision of the operation, fault management along with display messaging of system parameters and faults. RS232/RS485 serial data interface to retrieve stored data in the data log.
- Continuous data log of system parameters and line display of operating parameters (Pin, Pout, Rin Rout temperatures, RH for Pin and Pout, Relative Pressure (Process & React)).BMS Compatibility (Mod bus , Profibus -optional)
- Online Energy Management
- Remote fault warning output to allow an audible alarm or warning lamp to be activated at a remote location.
- Spare control and fault input/output to allow auxiliary system and/or component to be controlled by the dehumidifier.
- Intelligent re-start following a power failure.
- Programmable security code to prevent unauthorized mishandling.
- Intelligent power circuit switching to minimize voltage drops in unit supply system.
- Alpha numeric fault display.
- Real time clock.
- Battery backup of setting.

Technical Specifications: (AHU)

Air Handling Unit : The air handling unit will be Double Skin Casing, Horizontal Floor Mounted Type and comprising of pre filter section, cooling coil section, fan section complete with pre-filters, cooling coil, fan-motor & V-belt drive assembly mounted on extruded Aluminum sections with spring type anti vibration mounts, supply damper, fire retardant flexible joint between blower and casing, S.S Drain tray, coil bypass blank - off etc. The quoted price shall be inclusive of all.

Capacity: The AHU capacities, motor HP, static pressure, cooling coil area, pre filters etc. shall be according to Technical Data Sheets attached.

Double Skin Casing:

- Double skin sand witted panels should be made out of minimum 0.63 mm thick pre-plasticized sheet outside & minimum 0.63 mm thick plain Galvanised sheet inside confirming to IS-277 duly factory fabricated insulated with minimum 23 mm thick injected PUF of uniform density of 38 Kg / M3 between the panels.
- The casing shall be made of extruded anodized aluminium hollow sections rigid frame structure with wholly modular system based on standard panels and reinforced with extruded aluminum centre channels between the panels.
- The frame shall be assembled using pressure die cast aluminium / plastic joints.
- The insulated panels shall be bolted to main frame with neoprene rubber gasket held in framed extrusion to make it leak proof.
- Suitable air tight access door / panels with pressure die cast aluminium / nylon hinges, handles and locks shall be provided for access to various sections for maintenance.
- The entire housing shall be mounted on Galvanised steel channel frame.
- Condensate drain Pan shall be made of 0.8 mm thick S.S 304 / S.S.316 sheet with all corners welded with uniform slope from all sides leading to drain pan ensuring no stagnation of condensate. The drain pan shall be insulated with 12 mm thick closed cell poly ethylene foam / nitrile rubber thermal protection to avoid surface condensation.
- Blower section panel shall have a limit switch. It shall be provided with a view port and lamp.
- GI powder coated control damper on discharge shall be supplied with AHU.

Fan & Scroll Assembly :

- The fan shall be imported, AMCA certified DIDW forward / backward curved.
- The Fan scroll / casing shall be made of heavy gage GI construction with statically & dynamically balanced fan mounted on EN8 solid shaft or C40 carbon steel with vertical outlet.
- The fan impeller shall be supported to housing with angle iron frame & pillow blocks heavy duty ball bearings on both ends.
- The fan speed shall not exceed **1000 rpm and outlet velocity shall be below 12 meter / sec.**
- The fan housing with TEFC Sq Cage motor shall be mounted on a aluminum extruded common adjustable base frame on spring type vibration isolators.
- Fan motor shall be installed inside the housing of AHU.
- Fan outlet shall be connected to AHU casing using fire and moisture resistant flexible canvas.

Motor & Drive:

- The fan motor shall be 415 V+_ 10% volts, 50 Hz, 3 phase, TEFC SQ cage induction motor , IP 55 or 54 protection Class F insulation.

- It shall be specially designed for quiet operation & noise level should not exceed 75 dba at a distance of 2 mtr.
- **Speed** shall not exceed 1440 rpm.
- The fan drive package shall consist of fixed fan & motor pulleys (with taper bush mounting), V-belts.

Cooling Coils: All the technical and constructional details shall confirm to Technical Data Sheets. The coils are self draining & vented type. It shall be provided with drain / vent cocks. It shall be pressure & leak tested pneumatically at minimum **250 psig** under water for minimum of 12 hours.

Pre -Filters : The pre filters shall be pleated to provide more filtration area. The filter media shall be of the synthetic non -woven type, supported with aluminum and HDPE mesh. It should be washable, minimum 50 mm thickness, having filtration capacity of 10 micron particle size with an efficiency of 90 %. Filters shall fit so as to prevent by pass. Holding frames shall be provided for installing a number of filter cells in blank. These cell shall be held within frames by sliding the cells between guiding channels. Face velocity across filters shall not exceed 2.5 m/s. Air Flow capacity should be as per the air flow capacity of AHU.

<u>Design Data : Ion Source Room</u>		
1	Ambient Condition	
1.1	DBT	107 Deg F
1.2	WBT	82 Deg F
2	Desired Room Condition	
2.1	DBT	74+- 2 Deg F
2.2	Relative humidity	28+-5%
3	Room Details	
3.1	Room Size (Lxix)	15.5 x 12.7 x 5.8 m
3.2	Volume	1141 cum
3.3	Glass Windows	12 nos, 20 sqm, in Shade
3.4	Electrical Load	10 kw
3.5	Tube light	1 kw
3.6	Human Occupancy	2 persons
3.7	Doors Area	4 sqm
3.8	No. of Opening	1 (one) in 2 (two) hours
3.9	Room Level	At a height of 45 m from ground. Hence air velocity and moisture permeation due to higher velocity shall be taken in account while dehumidifier design.
3.1	Walls	Exposed 200 mm thick RCC with vapour barrier from inside. Shade walls are provided on all sides.
3.11	Roof	Exposed. 200 mm thick with 50 mm fibre glass insulation on top outside.

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Technical Data Sheet (Dehumidifier cum AHU)

Sr. No	Descriptions	Details
Dehumidifier		
1.	Dehumidifier type	Industrial, continuous operation 24 x 7.
2.	Casing framework	SS / GI / MS tubular Industrial quality, welded and caulked
3.	Panel type and finish	43 mm thick Double skin, 0.8 mm thick MS / GI pre coated / painted outer sheet, 0.8 mm thick GI inner sheet, rock wool / glass wool sandwiched, outer skin, dry powder coated with pure, polyester and oven cured.
4.	Vapour /air lightness of dehumidifier unit	SMACNA Class 6
5.	Inter compartmental seals	Silicon with PTFE coating suitable for 6” to 8” WC pressure differential / as per design
6.	Rotor type	Rotary fluted honeycomb media with SS perimeter flange
7.	Rotor Dimensions	1200 mm dia minimum
8.	Rotor Depth	300 mm minimum.
9.	Desiccant	in-situ synthesized metal silicate
10.	Active desiccant on rotor	> 80%
11.	Net organics of the rotor media	< 2%
12.	Dehumidifier Regeneration kW	as per design
13.	Process Airflow through dehumidifier.	4500 cfm approx.
14.	Reactivation Airflow	1600 cfm approx.
15.	Process motor kw	as per design
16.	Reactivation motor kw	as per design
17.	Drives	VFD with sensors for motors of process, reactivation, rotor. SCR for heaters.
18.	Dehumidifier Room dimensions (mm) l x w x h	6000 x 3100 x 2000 (approx.)
Air Handling Unit		
1	Designation	ISR
2	No. Required	One
3	Service / Duty	Air Conditioning, Indoor Installation / Continuous (24 HRS / Day)
4	Location	Top of inside stair case shaft.

5	Construction	
5.1	Side / Wall / Floor Panels	23 mm thick, double skin, Pre coated 0.63 mm thick outer sheet, 0.63 mm GI inner sheet, PUF / Glass / Rock Wool Fibre of 48 kg/cum, sandwiched, outer skin, dry powder coated with pure, polyester and oven cured.
5.2	Mixing section	Construction as in 5.1, size - as per requirement
5.3	Doors with handle, lock	Blower and mixing section
5.4	View ports	Blower / mixing section
5.4	Lamp	Blower / mixing section
5.5	Condensate drain Pan	0.8 mm thick S.S 304 / S.S.316 sheet, insulated with 12 mm thick closed cell poly ethylene foam / nitrile rubber
6	<u>Blower</u>	
6.1	Capacity (CMH)	Normal 11250
6.2	Static Pressure (Ext. to AHU & Dehumidifier unit)	15 mm
6.3	Vibration Isolators	Spring type
6.4	Bearings	Pillow type
6.5	Limit switch in section	To put off the blower if door is opened.
6.6	Motor	415 V+_ 10% volts, 50 Hz, 3 phase, TEFC SQ cage induction motor , IP 55 or 54 protection Class F insulation.
6.7	Speed	1440 rpm
6.8	Noise level	< 75 dba at a distance of 2 mtr.
6.9	Drive	Fixed fan & motor pulleys with taper bush mounting, V-belts.
6.10'	VFD with sensors	
7	<u>Cooling coil</u>	
7.1	Cooling Capacity (Ton)	23 TR
7.2	Air Flow Quantity (^{cum} / hr)	11250
7.3	Sensible Heat Load	69500 cal/hr
7.4	Latent Heat Load	0
7.5	Entering Air DBT	29.6 Deg C
7.6	Entering Air WBT	15.5 Deg C

7.7	Type	Chilled Water
7.8	In / out chilled water Temperature	6.7 / 12 Deg C
7.9	Inlet Water Pressure (kg/sqcm)	4
7.10	Number of Rows	6 minimum
7.11	Material of Tube (Seamless)	Copper
7.12	Size of tube (mm)	15/12.5 OD, 27 G
7.13	No. of Fins	11-12 per Inch, Mechanically / Hydraulically bonded on to copper tubes.
7.14	Material of fins	Aluminum
7.15	Nature of Fins	Sinu-Soidal
7.16	Material of Header	Seamless Copper pipe.
7.17	Material of Support Frame	S.S. Sheet,
7.18	Max. Face Velocity (m/s)	2.2
7.19	Apparatus Dew Point (Deg C)	10
7.2	Chilled Water Flow (CMH)	15
7.21	CHW Velocity thru coil tube	2.5 m/s max.
8	<u>Pre-Filter</u>	Air flow capacity - 11250 CMH, Face Area - > 1.6 sqm, Face Vel. - <2.2 m/s, as per specifications.

Mandatory To Submit Along with the Technical Bid**Annexure - J**

Sr. No	Descriptions	Details	Bidder to Fill / Confirm
1	<u>Dehumidifier</u>		
1.1	Make		
1.2	Model		
1.3	Dehumidifier type	Industrial, continuous operation 24 x 7.	
1.4	Casing framework	SS Tubular Industrial quality, welded and caulked	
1.5	Panel type and finish	43 mm thick Double skin, 0.8 mm thick MS / GI pre coated / painted outer sheet, 0.8 mm thick GI inner sheet, rock wool / glass wool sandwiched, outer skin, dry powder coated with pure, polyester and oven cured.	
1.6	Vapour /air lightness of dehumidifier unit	SMACNA Class 6	
1.7	Inter compartmental seals	Silicon with PTFE coating suitable for 6" to 8" WC pressure differential / as per design	
2	<u>Desiccant Rotor</u>		
2.1	Make		
2.2	Model		
2.3	Rotor type	Rotary fluted honeycomb media with SS perimeter flange	
2.4	Rotor Dia. mm		
2.5	Rotor Depth mm		
2.6	Desiccant	in-situ synthesized metal silicate	
2.7	Active desiccant on rotor	> 80%	
2.8	Net organics of the rotor media	< 2%	
2.9	Time (minutes) per Rotation		
2.10'	Moisture Removal Kg/hr	41	
3	<u>Drive</u>		
3.1	Motor-Make		
3.2	Motor - Model		
3.3	Ph / Hz / RPM / kW		
3.4	Type	Chain Type or other	
3.5	VFD with sensors		

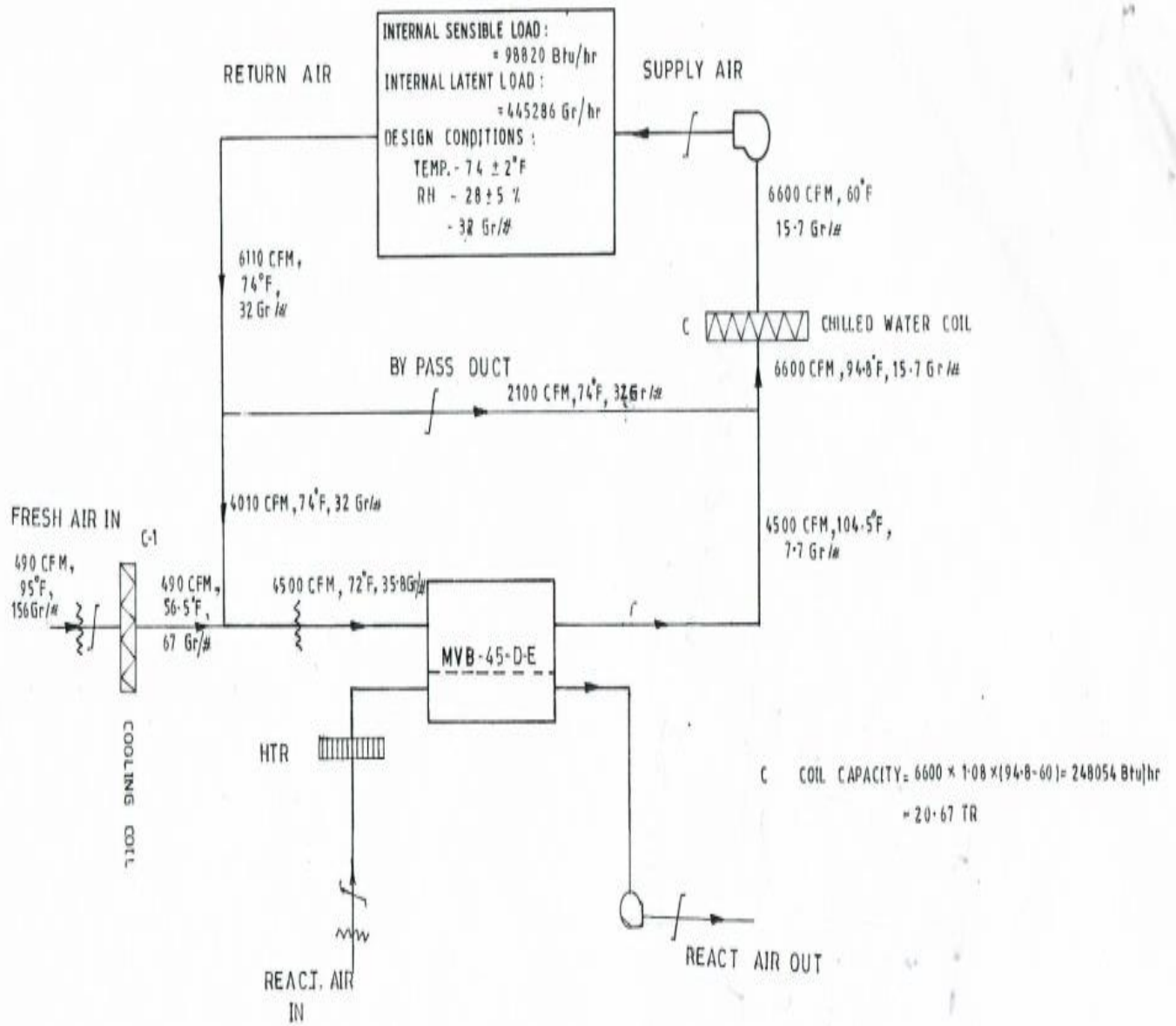
Sr. No	Descriptions	Details	Bidder to Fill or Confirm
4	<u>Reactivation Heaters</u>		
4.1	Make		
4.2	Models		
4.3	Nos / kW		
4.4	SCR power supply		
5	<u>Reactivation Air Blower</u>		
5.1	Make		
5.2	Model		
5.3	Air flow CFM		
5.4	Static Pressure mmW		
5.5	Blades Type	Forward / Backward	
5.6	RPM		
5.7	Pillow Block Bearing		
6	<u>Drive</u>		
6.1	Make		
6.2	Model		
6.3	KW / Volts / RPM		
6.4	Pulleys on Taper Bush Mounting		
6.5	VFD with sensors		
7	<u>Microprocessor</u>		
7.1	Make		
7.2	Model		
7.3	Features		
7.4	Control System	7 inch Touch panel for easy interface and operation Supervision, fault management along with display messaging of system parameters and faults.	
7.5	Data Log	RS232/RS485 serial data interface to retrieve stored data in the data log.	
7.6	Display	Continuous data log of system parameters and line display of operating parameters (Pin, Pout, Rin Rout temperatures, RH for Pin and Pout, Relative Pressure (Process & React)).BMS	
7.8		Online Energy Management	

Sr. No	Descriptions	Details	Bidder to Fill / Confirm
7.9	Remote Alarm	Remote fault warning output to allow an audible alarm or warning lamp to be activated at a remote location.	
7.10	Spare	Spare control and fault input/output to allow auxiliary system and/or component to be controlled by the dehumidifier.	
7.11	Re-start	Intelligent re-start following a power failure.	
7.12	Security Code	Programmable security code to prevent unauthorized mishandling.	
7.13	Switching	Intelligent power circuit switching to minimize voltage drops in unit supply system.	
7.14	Fault	Alpha numeric fault display.	
7.15	Battery Back up	Real time clock. Battery backup of setting.	
8	<u>Display</u>		
8.1	Make		
8.2	Model		
8.3	Display Size Inches		
9	<u>Temperature Sensor</u>		
9.1	Make		
9.2	Model		
10	<u>RH Sensor</u>		
10.1	Make		
10.2	Model		
11	<u>Pre Cooling Coil</u>		
11.1	Face area		
11.2	Tonnage		
11.3	Air Flow CMH		
11.4	Support	S.S.	
11.5	Header	Copper	
11.6	Condensate Tray	S.S. 0.8 mm thick. 1/2" Nitrile rubber insulated.	
12	<u>Fresh Air Damper</u> WxH		
13	<u>Bypass Damper</u> WxH		
14	<u>Any Information:</u> <u>Other</u>	It is mandatory to attach the technical details / catalogue of items.	
Sr. No	Descriptions	Details	Bidder to Fill / Confirm

Air Handling Unit		
1	Designation	ISR
2	No. Required	One
3	Service / Duty	Air Conditioning, Indoor Installation / Continuous (24 HRS / Day)
4	Location	Top of inside stair case shaft.
5	Construction	
5.1	Side / Wall / Floor Panels	23 mm thick, double skin, Pre coated 0.63 mm thick outer sheet, 0.63 mm GI inner sheet, PUF / Glass / Rock Wool Fibre of 48 kg/cum, sandwiched, outer skin, dry powder coated with pure, polyester and oven cured.
5.2	Mixing section	Construction as in 5.1, size - as per requirement
5.3	Doors with handle, lock	Blower and mixing section
5.4	View ports	Blower and mixing section
5.4	Lamp, Limit Switch	Blower and mixing section
5.5	Condensate drain Pan	0.8 mm thick S.S 304 / S.S.316 sheet, insulated with 12 mm thick closed cell poly ethylene foam / nitrile rubber
6	<u>Process / AHU Blower</u>	
6.1	Make	
6.2	Model	
6.3	Capacity (CMH)	Normal 11250
6.4	Static Pressure (Ext. to AHU & Dehumidifier unit) mmW	15
6.5	Blades Type	Forward / backward curved
6.6	RPM	< 1000
6.7	Vibration Isolators	Spring type
6.8	Bearings	Pillow Block
6.9	Limit switch in Blower section	To put off the blower if door opened.
7	Process / AHU Blower Motor	

7.1	Make		
7.2	Model		
7.3	Electricals	415 V+_ 10% volts, 50 Hz, 3 phase, TEFC SQ cage induction motor , IP 55 or 54 protection Class F insulation.	
7.4	Speed	1440 rpm	
7.5	Noise level	< 75 dba at a distance of 2 mtr.	
7.6	Drive	Fan & motor pulleys with taper bush mounting, V-belts.	
7.7	VFD with sensors		
8	<u>Cooling coil</u>		
8.1	Cooling Capacity (Ton)	23 TR	
8.2	Air Flow Quantity (cum / hr)	11250	
8.3	Sensible Heat Load	69500 cal/hr	
8.4	Latent Heat Load	0	
8.5	Entering Air DBT	29.6 Deg C	
8.6	Entering Air WBT	15.5 Deg C	
8.7	Type	Chilled Water	
8.8	In / out chilled water Temperature	6.7 / 12 Deg C	
8.9	Inlet Water Pressure (kg/ sqcm)	4	
8.1	Number of Rows	6 minimum	
8.11	Material of Tube (Seamless)	Copper	
8.12	Size of tube (mm)	15/12.5 OD, 27 G	
8.13	No. of Fins	11-12 per Inch, Mechanically / Hydraulically bonded on to copper tubes.	
8.14	Material of fins	Aluminum	
8.15	Nature of Fins	Sinu-Soidal	
8.16	Material of Header	Seamless Copper pipe.	
8.17	Material of Support Frame	S.S. Sheet,	

8.18	Max. Face Velocity (m/s)	2.2	
8.19	Apparatus Dew Point (Deg C)	10	
8.20	Chilled Water Flow (CMH)	15	
8.21	CHW Velocity thru coil tube	2.5 m/s max.	
9	<u>Pre-Filter</u>	Air flow capacity - 11250 CMH, Face Area - > 1.6 sqm, Face Vel. - <2.2 m/s, as per specifications.	
10	<u>Supply Air Damper Size</u>		



List of Approved Makes		
S. N.	Item	Make
1	Desiccant Rotor	Ecody, DRI, Munters / equiv.
2	Blower	Kruger , Nicotra, PAT, Rosenberg
3	Electric Motor	Siemens , ABB , Bharat Bijlee , Crompton, Kirloskar
4	G.I Sheets	Jindal, SAIL, Nippon
5	FA Louvers, Fire / VC Damper, Diffusers , Grills	Ravistar, Carryaire, Dyna Craft, Zeco, Systemair, Supercut
6	Ducting Insulation	Supreme, Armacel, A-flex, K-flex
7	Strip Heaters	Dasspass, Escorts, KEPL
8	Thermocol, fibre wool	Beardsell, Trocellene, Twega
9	Tapes	Birla 3M, Supreme
10	Vibration, Isolation Pads	Dunlop, Resistoflex, Kanwal
11	Starters, Switch gear	Siemens, Schneider, ABB, L&T, GE
12	VFD's	Siemens, Schneider, ABB, Danfoss, Fuji, Rockwell, Johnsons control, Mitsubishi
13	ACB, MCCB, MCB	Siemens, Schenider, ABB, Legrand, Havells
14	Single Phase Preventor	L&T, Minilac
15	Auxiliary Relays, Contactors	L&T, Siemens, GE Power Control
16	Timer	L&T, Siemens, GE Power Control
17	Digital VAF/ Power Meter	Conserv, Schnieder
18	Voltmeter, Ammeter	Siemens, AE, Rishabh(L&T)
19	Indicating Lamps	L&T, Siemens, Control & Switch Gear
20	Selector Switches	L&T, Siemens, Kaycee
21	Current Transformer	AE, Cappa
22	Thimbles, Lugs	Dowell
23	Power Cables	CCI, Gloster, Incab, Siemens, Universal
24	Control Cables and wires	Finolex, National, Delton, Ecko, Havels, Cord
25	Switches, Sockets	Anchor, Alstom
26	MS / PVC Conduit ISI Marked	BEC, AKG, NIC, Plaza, Kalinga, Precision, Gerard

IUAC reserves the right to accept / reject any of the above list of approved make, if not found to meet the specifications. In case the make of any item is not mentioned, same should be ISI marked / reputed make and should be got approved from the IUAC.

Price Bid / BOQ -

S.N	Item Description	Qty	Unit Price	Total Price
1	<p>Design, supply, shifting site assembly, installation, testing and commissioning of floor mounted horizontal type Dehumidifier unit cum Air Handling Unit (Air Conditioning Dehumidifier) standard working unit complete with 43 mm thick, double skin type panels, industrial type solid metal silicate desiccant rotor bed desiccant synthesized on fluted type honeycomb rotor media, bed drive & motor, reactivation electric heaters 100 % with thiristor, supply & Return air damper, fresh air damper, Mixing section, pre filter section wih (EU-4) filter, Process blower with drive and motor, Supply air damper, reactivation blower with motor, filter for Reactivation air from service area, Reactivation outlet damper, Electrical panel assembly with necessary controls and instruments, Cabling & earthing for dehumidifier unit, with pre and post cooling coil (4/6 rd) .</p> <p>The Power & control panel shall be factory pre wired for the system operation and shall be supplied with MCBs/MCCBs, contactors, overload protection, microprocessor controller for temperature & RH and all the necessary components to ensure a continuous automatic operation of units. The control panel shall be complete with microprocessor base, provision for Mod bus connectivity to BMS for data exchange etc. Dehumidifier Digital Controller which shall have a mimic diagram of the functioning of the unit and shall have a full diagnostics facility of faults and/or alarms. All necessary power and control cabling of dehumidifier unit shall be provided by Dehumidifier supplier.</p> <p>Rotor Diameter x depth (mm) -1200x300, rotor air flow rate (cfm)-4500 cfm, moisture removal rate (kg/hr)-41, reactivation air fan capacity (cfm)-1600 cfm, process air fan capacity (cfm)-6100, pre / post cooling coil capacity (Ton)-4/23.</p> <p>As per technical specifications of NIT.</p>			
1.1	Spare process blower motor			
1.2	Spare reactivation blower motor			
1.3	Spare desiccant rotor motor			
1.4	Spare desiccant rotor assembly			
1.5	Spare VFD unit for process blower motor			
1.6	Spare VFD unit reactivation blower motor			
1.7	Spare VFD unit desiccant rotor motor			
1.8	Spare RH Sensor			
1.9	Spare Temperature sensor			
1.10'	SCR power supply for heaters			
1.11	Display Unit			
	Total in words (Rupees			

TENDER ACCEPTANCE LETTER
(To be given on Company Letter Head)

(Annexure - B)

Date:

To,
The Director
IUAC, New Delhi-67

Sub: Acceptance of Terms & Conditions of Tender.

Tender Reference No: IUAC/NIT/

Name of Tender / Work: -

Dear Sir,

I/ We have downloaded / read and examined the tender document(s) for the above mentioned Tender /Work from the web site(s) namely:
as per your advertisement, given in the above mentioned website(s).

4. I / We hereby certify that I / we have read the entire terms and conditions of the tender documents (including all documents like annexure(s), schedule(s), etc ..), which form part of the contract agreement and I / we shall abide hereby by the terms / conditions / clauses contained therein.

5. The corrigendum(s) issued from time to time by your department/ organization too have also been taken into consideration, while submitting this acceptance letter.

6. I / We hereby unconditionally accept the tender conditions of above mentioned tender document(s) / corrigendum(s) in its totality / entirety.

7. I / We do hereby declare that our Firm has not been blacklisted/ debarred by any Govt. Department/Public sector undertaking.

8. I / We certify that all information furnished by the our Firm is true & correct and in the event that the information is found to be incorrect/untrue or found violated, then your department/ organisation shall without giving any notice or reason therefore or summarily reject the bid or terminate the contract, without prejudice to any other rights or remedy.

Yours Faithfully,

(Signature of the Bidder, with Official Seal)

PROFILE OF THE TENDERER
(To be given on Company Letter Head)

(Annexure - C)

**TENDER FOR SUPPLY OF Different type of Gases except Helium
Gas on Annual Rate Contract**

1. Name of the Firm / Organization :
2. Address :
3. Telephone No. / Mobile No. &
Name of the Contact Person :
4. Fax No. :
5. E-mail ID :
6. Month and Year of establishment :
7. Name of proprietor / partners/director :
8. No. of years of experience in this field,
with Reference, Certificates :
9. Annual Turnover during the last
three years (Enclose copies of
Audited Financial Statement duly
certified by CA
2019-20 :
2020-21 :
2021-22 :
10. Whether the firm is a Tax
Assessee? If so, please give the
details of PAN No. and copies
of ITR files for the last three
financial years :
11. GST Registration No. :
12. Name of the OEM and address :

Signature of the Bidder & Seal

BID SECURING DECLARATION FORM

(Annexure - D)

TO BE SUBMITTED BY MSME ONLY ON COMPANY LETTER HEAD

Tender/Bid No.:

Date:

To
The Director
Inter University Accelerator Centre
(IUAC)
New Delhi
Dear Sir/Madam,

We, the undersigned, solemnly declare that:

We understand that, according to the conditions of this Tender Document, the bid must be supported by a Bid Securing Declaration in lieu of Bid Security.

We unconditionally accept the condition of this Bid Securing Declaration. We understand that we shall stand automatically suspended from being eligible for bidding in any tender in IUAC for a period of two years from the date of opening of this bid if we breach our obligation under the tender conditions, if, we,

a) withdraw/amend/impair/derogate, in any respect, from our bid, within the bid validity; or

b) being notified within the bid validity of the acceptance of our bid by IUAC

(i) fail or refuse to sign the contract, or (ii) failed or refused to produce the original documents for scrutiny or the required Performance Security within the stipulated time under the conditions of the tender documents.

We know that this Bid Securing Declaration shall expire if the contract is not awarded to us, upon:

- 1) receipt by us of your notification
 - a) of cancellation of the entire tender process or rejection of all bids or
 - b) of the name of successful bidder or
- 1) Forty-five days after the expiration of the bid validity or nay extension to it.

Signed:

Name:

Dated on _____ day of _____

Corporate Seal (where appropriate)

(Note: In case of a Joint Venture, the Bid Securing Declaration must be in the name of all partners to the Joint Venture that submits the bid)

(Signature of the Bidder, with Official Seal)

Declaration By The Bidder For Code Of Integrity & Conflict Of Interest (Annexure - E)
(On the Letter Head of the Bidder)

No: _____

Date

To,
The Director IUAC
New Delhi

Sir,

With reference to your Tender No. _____ dated _____ I/We hereby declare that we shall abide by the Code of Integrity for Public Procurement as in your Tender document and have no conflict of interest.

It is certified that we are not associated, or have been associated in the past, directly or indirectly, with a firm or any of its affiliates which have been engaged by the Purchaser to provide consulting services for the preparation of the design, specifications, and other documents to be used for the procurement of the goods to be purchased under this Invitation of Bids / Tender.

The details of any previous transgressions of the code of integrity with any entity in any country during the last three years or of being debarred by any other Procuring Entity are as under:

- a
- b
- c

We undertake that we shall be liable for any punitive action in case of transgression/contravention of this code.

Thanking you,

Yours sincerely,

Signature
(Name of the Authorized Signatory)
Company Seal

(Undertaking on Blacklisting on Company's Letterhead)

Annexure-F

I / We (bidder) hereby give an undertaking that:

1. I / We have not been blacklisted / on holiday list / debarred during last three years by any Govt. Department/Govt. Autonomous Body/Institution, etc;
2. I/We do not have any dispute with any of the Govt. Departments/ Govt. Autonomous Bodies/Institutions, etc.;
3. I/We have never been certified as 'Unsatisfactory Performer' for the said services provided to the Govt. Departments/ Govt. Autonomous Bodies/ Institutions;
4. I/We have not submitted any fake/forged certificates/ documents and later, if any such 'Certificates/Documents' found to be fake/ forged or contains willful wrong/incorrect information, suitable legal actions may be initiated against me/us/agency and the agencies / bidders shall be debarred from tendering with the Institute.
5. I/We shall not withdraw my/our bid after opening of Technical Bid and if done so, the IUAC and the agencies / bidders shall be debarred from tendering with the Institute.

Seal and Signatures of the
Authorized Person of the Agency

Name and designation of the
Authorized Person of the Agency

Place:

Date:

Certificate/ Undertaking (On company's letter head)

Annexure - G

This certificate shall be furnished duly signed & stamped with **Techno-commercial Bid.**

This is to certify that we have visited the site where the air dehumidifier cum air Handling Unit of 11250 cfm flow capacity shall be installed in Inter-University Accelerator Centre, Aruna Asaf Ali Marg, New Delhi -110067 on and assessed the actual situation & nature of site. We have also assessed the amount of work involved at site for tendered work before submitting our offer. We will be able to complete the above work within stipulated time as per site conditions.

We further undertake that no extra cost will be claimed by us later-on for any difficulties/ modifications involved during the execution of tendered works. We understand that work is to be executed in an already operational/ functional institute.

**(Signature of the Bidder, with
Official Seal)**

Performance Statement (Annexure-H)

Statement of Supplies During Last Three Years and Outstanding Current Orders
(To be submitted as part of Technical bid on Company Letter-head)

Tender Document No. ; Tender Title:
Bidder's Name _____
[Address and Contact Details]

Bidder's Reference No. _____ Date.....

Note to Bidders: Fill up this Form your past performance highlighting their qualification to supply relevant Goods. Statements and Documents to the Performance Statement may be mentioned/ attached here. The list below is indicative only. You may attach more documents as required to showcase your past performance. Add additional details not covered elsewhere in your bid in this regard.

Order issued by	Order No. & Date	Qty ordered	Quantity supplied	Price at which supplied	The total value of the order	Status as on date----

.....
(Signature with date)

.....
(Name and designation)
Duly authorized to sign bid for and on behalf of

.....
.....
[name & address of Bidder and seal of company]

CHECK-LIST FOR PRE-QUALIFICATION BID**(Annexure-I)****SITC of Air Dehumidifier cum AHU of 11250 CMH Flow Capacity at IUAC, Aruna Asaf Ali Marg, New Delhi-110067**

#	Documents Provided
1.	Tender Acceptance Letter - Annexure - B
2.	Profile Of The Tenderer - Annexure - C
3	Bid Securing Declaration Form - Annexure - D
4	Declaration By The Bidder For Code Of Integrity & Conflict Of Interest - Annexure - E
5	Undertaking on Blacklisting on Company's Letter head - Annexure-F
6	Certificate/ Undertaking - Annexure - G
7	Performance Statement - Annexure-H
8	Technical Sheet, Annexure-J
9	Scope of work as per the details as given in Annexure - A
10	Proof of submission of EMD
11	Self-attested copy of the GSTIN & PAN card issued by the respective authorities.
12	Self-attested copy of MSME/NSIC Registration Certificate .
13	Annual turnover of last three financial years (2020-21, 2021-22 & 2022-23) duly certified by the Statutory Auditors. To support the claim provide a certificate of CA (No need to provide copies of balance sheet).
14	Copies of ITR filed for the last three financial years
15	Certificate - Bidder Not from/ from Country sharing Land border with India & Registration of Bidder with Competent Authority
16	Certificate – Bidder Not from/ from Country sharing Land border with India, Registration of Bidder with Competent Authority & not sub-contract any work to a contractor from such countries unless such contractor is registered with the Competent Authority
17	Certificate of OEM / Authorised Dealer or Distributor / Bid specific authorisation.
18	Signed and stamped copy of NIT.
19	Other Documents, if any

Signature of the Bidder
(Name and Address of the Bidder)
Telephone No.