



INDIAN INSTITUTE OF SCIENCE EDUCATION AND RESEARCH PUNE

(An Autonomous Institution of the Ministry of HRD, Govt. of India)

ASSISTANT ENGINEER (ELECTRICAL)

Main Building IISER Campus, Dr. Homi Bhaba Road, Pune-411 008.

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No: 54(2)/AE(E)/IISER/Pune/L&L/2017-18/ 354

Dated 18/11/2017

NOTICE INVITING QUOTATION

Sealed quotations are hereby invited by the undersigned on behalf of the Director, IISER Pune for the work mentioned below upto 3 PM on 28/11/2017 from eligible HVAC contractors for the work mentioned below. The quotations will be opened at 3.30 PM on the same day.

Name of work: - Augmentation of Air conditioning work at JU Lab Biology ground floor at IISER campus, Pune.

Issue to –

Address of the agency –


Assistant Engineer (Electrical)

IISER Pune

Terms and Conditions: -

- 1) No advance payment shall be made by IISER Pune.
- 2) Time period for completion of work shall be 2 weeks from the date of placing the confirm order by IISER Pune.
- 3) Quotations can be obtained from this office between 10 AM to 4 PM on all working days before date of submission.
- 4) All agencies need to submit their quotation in hard copy in sealed cover to this office by suitable means before 3 PM on 23/11/2017. Quotation received after the date & time specified above shall not be accepted. Any delays, postal delay etc. will not be entertained. Agency should quote for all the items in the BOQ. The bid shall be submitted in the original bid document (as issued by the IISER, Pune) super scribing the name of work.
- 5) Quotations will be opened on the same day at 3.30 PM in the presence of bidder or their authorized representatives, if any. The offer of the firm should be commercially clear including acceptance of all terms and conditions of this tender by the firm. IISER reserves the right to accept or reject all the quotations without assigning any reasons.
- 6) Quotations submitted without any conditions shall be treated as Conditional quotations and shall be summarily be rejected by IISER PUNE.

- 7) Quoted rates should be inclusive of cost of all the materials, labour cost , all taxes, octroi , duties , cost of sample and fees towards testing of materials in labs ,royalties etc. complete. Nothing extra shall be paid separately.
- 8) All approved makes shall be as specified in BOQ and as per CPWD specifications; agency should put-up technical data and obtain prior approval on makes of various materials of IISER PUNE before taking-up work.
The successful agency shall make his own arrangement for all Tools & tackles for work etc complete in view of completion of work. Electricity shall be provided free of cost to agency at one source, agency should make own arrangement to safely tap of power from source to work location. No advance payment shall be made by IISER Pune.
TDS and other applicable taxes and cess will be deducted from the bills as of the work.
- 9) Specification for the work to be carried out as per BOQ, latest CPWD specification, IS specifications & as per instruction of IISER PUNE whenever specification CPWD/ IS specification are not available.
- 10) The contractor shall ensure that minimum wages should be paid to the labours and employees in accordance with labour laws.
- 11) Agency to submit computerized measurement and abstract sheets to IISER PUNE for payments.


Assistant Engineer (Electrical)

IISER Pune

Sign & stamp of Agency-

Encl: - Schedule of Quantity – As per Annexure A

TECHNICAL SPECIFICATIONS

1. The system shall be designed, manufactured and tested in accordance with the CPWD, General Specification for heating, ventilation & Air conditioning (HVAC) works – 2004, Internal EI - 2005 and latest Indian Standards, as specifically mentioned in tender document.
2. Air cooled split type air-conditioners.
 - 2.1 Hiwall type air conditioners shall be factory assembled, wired and tested. It shall comprise of indoor and outdoor units as per OEM of approved makes and as per the requirements of BOQ only.
3. Condensing unit shall be suitable for outdoor installation with weatherproof enclosure and shall be field serviceable. The unit shall have shut off and relief valves.
4. Copper refrigerant piping, interconnecting evaporator and condensing unit shall be charged With suitable refrigerant and shall be insulated with PVC clad PUF insulation.
5. All test certificates issued by the manufacturer and all types routine test certificates shall also be Furnished before the final payment of the contract.
6. Work includes first charging of refrigerant, testing and commissioning and nothing extra shall be paid on this account.
7. Condensate drain piping:

25 / 32mm dia. hard PVC drain pipe shall be used to remove condensate from evaporator Unit to drain point. The joints shall be properly sealed so that there is no water leakage. U trap shall be provided at the end. Additional insulated drain tray shall be provided below the evaporator unit.
8. MS Stand / bracket for condensing / evaporator unit:

Stand shall be made out of MS angle / channel frame work and fixed onthe wall / floor with the help of anchor bolts.
9. Stand / bracket shall be sturdy enough to take the weight of the condensing unit..
10. The supply and installation of sheet metal ducting work is of galvanized sheet.
11. It should be with galvanized companion flanges girth angles, turning vanes, structural support.
12. The support should be at 6 feet of interval with fastener and threading rod of minimum 8mm diameter.
13. The ducting joints should be sealed with closed cell neoprene gasket for avoiding the air leakage.
14. The ducting pieces should be joined from flanges at the corners and nuts & bolts.
15. All test certificates issued by the manufacturer and all types routine test certificates shall also be furnished before the final payment of the contract.
16. Minor civil works like making hole, cutting of walls, finishing the same to be done by the Successful bidder without any additional cost.
17. All the holes should be done by the core cutting machine with appropriate size drill bits so that aesthetic of the walls should not be spoiled.

DNB

LIST OF ACCEPTABLE MAKES OF THE MATERIALS

S. No.	MATEREIAL	Make
1.	Hiwall AC	: Toshiba /Mistubishi / Daikin
2.	Copper pipe	: Mandev/Indigo/Mehta Tubes
3.	Ducting Sheet	: JSW / Tata Steel /Essar
4.	Ducting Insulation	: K-Flex / Twiga
5.	Diffuser	: Cosmos / System Air
6.	Damper	: Cosmos / System Air


Assistant Engineering (Elect.)
IISER Pune

COMMERCIAL TERMS AND CONDITIONS

- 2.1 General :**
The works awarded by these specifications, wherever installation and commissioning along with supply is included shall be treated as indivisible works contract.
- 2.2 Prices:**
The price quoted shall be inclusive of all taxes and duties as applicable.No Central/State sales tax / VAT / work contract tax / Excise duty / octroi etc. shall be separately paid by the department.
- 2.3 Erection equipment:**
The successful tenderer shall make his own arrangement for all Tools & tackles for dismantling / erection of the equipment.
- 2.4 Test certificate:**
The copies of all routine and test certificate of the equipment carried at the manufacture's premises or otherwise shall be furnished to the consignee.
- 2.5 Guarantee and warranty:**
The contractor shall guarantee the entire service as per specifications both for components and for system as a whole. All equipments shall guarantee for one year from the date of acceptance against unsatisfactory performance or increase in condenser approach due to which the compressor will trip on high discharge pressure break down due to defective materials, design, manufacture or servicing. The work shall be covered by the condition that the whole servicing or any part /material there of found defective within one year from the date of taking over shall be replaced or repaired by the contractor at free of charge as decided by the department.
- The warranty shall cover consequential damages to the equipment while servicing, due to poor workmanship or chemicals. All such repairs shall be done promptly within a reasonable period. The warranty period will commence from the date of acceptance of the equipment as fitting for service or handing over whichever is later and will cover the following:

- a) Quality and performance of materials used.
- b) Safe mechanical and electrical stress on all parts under all specified conditions of operation.
 - c) Satisfactory operation during the maintenance period.
- 2.6 After Sales Service:**
The contractor shall ensure adequate and prompt service from of maintenance personal and spares as and when required with a view to minimise the break down period.
- 2.7** After testing, commissioning, the work shall be handed over to the department. There after contractor shall maintain the whole system for the period of one Year.
- 2.8** During Maintenance period, the contractor shall submit the fortnightly perform test, checking of general operating state of all control panels etc.
- 2.9** List of items which need replacement during servicing shall be submitted to department. The replacement shall be done without claiming any extra payment during maintenance period.


Assistant Engineering (Elect.)
IISER Pune

Schedule of work				18/11/2017
Name of work: Augmentation of Air conditioning work at JU Lab Biology ground floor at IISER campus, Pune.				
Sr. No.	Description of Items	Qty	Unit	Rate (In words and Figures)
1	Supply of 1.5 TR capacity Hiwall type indoor unit with cordless remote control & outdoor unit mounted with suitable metal stand with R410 or equivalent green refrigerant gas only (Make : Toshiba /Mistubishi / Daikin)	3	Each	
2	Installation testing and commissioning charges	3	Each	
3	Supplying & fixing of copper refrigerant piping of suitable size (Suction & discharge) with insulation complete from indoor unit to outdoor unit with supports Etc.	30	M	
4	Supplying and laying of 3 x 4.0 sq mm PVC insulated copper conductor flexible cable.	40	M	
5	Supplying & fixing 25/32 mm size PVC drainage pipe with insulation i/c cutting the wall, finishing etc. as reqd.	25	M	
6	0.63mm (24 G) galvanised sheet steel-Supply, installation, testing of galvanised sheet metal ducting as specified complete with Galvanised companion flanges girth angles, Turning vanes, structural support systems, Closed cell neoprene gasket. Construction standards as per IS 655. Ducting shall be factory fabricated.	50	M ²	
7	Supply and fixing of 13 mm thk nitrile rubber / cross linked polyethylene duct insulation with factory backed aluminium foil.	50	M ²	
8	Supply and installation of Supply air diffusers of extruded aluminum with VCD, powder coated as specified and complete with Flush or stepdown, 20mm flanges with PVC gasket, removable core type, square, rectangular or as shown on drawings., 1-way, 2-way, 3-way as specified	2	M ²	
Total				Rs.


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