# INDIAN INSTITUTE OF ASTROPHYSICS 2<sup>ND</sup> BLOCK, KORAMANGALA, BENGALURU – 560034.

#### TENDER DOCUMENT

Name of Work: Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu.

Tender Notice No.: 59/IIA/CIVIL/VBO/KAVALUR/2022-23 Dated 19.10.2022

#### INDIAN INSTITUTE OF ASTROPHYSICS

**Ph**.080-2554 1200/1259/1359 , **Fax**: 25534043 **Website**: www.iiap.res.in



#### INDIAN INSTITUTE OF ASTROPHYSICS

#### 2<sup>ND</sup> BLOCK, KORAMANGALA, BENGALURU-560 034.

#### Tender Notice No.: 59/IIA/CIVIL/VBO/KAVALUR/2022-23 Dated 19.10.2022

#### SINGLE STAGE – TWO COVER SYSTEM

The Director, Indian Institute of Astrophysics invites sealed item rate tenders in the prescribed format for the following work from appropriate registered class I contractors in state PWD/CPWD and who have executed works of similar nature with central or state Govt. / Autonomous institutions / Research institutions / Govt. undertakings.

Sl. No.	Name of the work	Estimated cost in Rs.	Time for completion	EMD	Cost of tender document Rs.
1.	Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu	20,44,000/-	04 Months	41,000/-	1,000/-

The Tender Document can be viewed and downloaded from our website <a href="www.iiap.res.in/tenders.htm">www.iiap.res.in/tenders.htm</a>. The interested tenderers may at their option download the same, as "NO" hard copies of Tender document shall be provided from this office and submit their offers along with Tender fee (non-refundable) prescribed therein, only in the form of Demand Draft drawn in favor of "Indian Institute of Astrophysics" payable at Bangalore. The DD shall be valid for a period of ninety days (90) from the date of opening of bids.

The Offers containing complete tender document (Published in IIA website) duly filled and signed with all necessary particulars complete credentials including experience/completion certificates, tender document fee, EMD etc. should be submitted in sealed cover (COVER -1) and priced Bill of Quantities in sealed Cover (Cover -2). Both Cover 1 & 2 shall be put in Cover -3 super scribing the envelope with "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu". Notice No. and due date", shall be submitted addressed to The Director, Indian Institute of Astrophysics, 2<sup>nd</sup> Block, Koramangala, Bengaluru – 560 034. The last date of submission of bid is 21.11.2022 on or before 15:00 hrs.

Only **TECHNICAL BIDS** (**COVER 1**) will be **opened at 15:30 hrs on the same day** in the presence of attending tenderers or their authorized representatives.

**Financial bids** (Cover 2) of technically qualified bidders will be opened with prior intimation. The list of technically qualified bidders and date of opening will be **displayed in the IIA website only**.

#### **SITE VISIT:**

All intended bidder's may <u>visit the site at 11:00 AM on 04.11.2022</u> and get all necessary clarifications regarding tender document, site, availability of materials, labors, etc., from the Civil Engineering Section.

#### **ELIGIBILITY CRITERIA**

The firms who fulfill the following requirements shall be eligible to submit their bids. Joint ventures are not acceptable.

- (i) Tendering Company shall be professionally managed and resourceful for taking up similar jobs.
- (ii) The experience of having successfully completed similar work during last 5 years as on 30.09.2022 should be either of the following:
  - a) One similar completed work costing not less than the amount equal to 80% of the estimated cost.

OR

b) Two similar completed works costing not less than the amount equal to 50% of the estimated cost.

OR

c) Three similar completed works costing not less than the amount equal to 40% of the estimated cost.

#### Similar work shall mean:

Similar work experience shall mean that the bidder shall have an experience in new building construction or renovation works at central / state Govt. or research institutions, which includes dismantling, brickwork, tiling, waterproofing, interior, plumbing, sanitary, painting, melamine polish, etc. In support of this, the bidder must submit completion Certificate / work orders from the Client, and the same shall be included in the Bid as Supporting Documents.

#### **Documentary Proof for Eligibility**

Self attested/certified copy of work orders and completion certificates issued by the authority concerned to establish work experience shall be attached to the tender document. Photographs of such works shall be attached for reference. Copies of the Income Tax Returns along with Financial Statements such Balance Sheet, Assessment report issued by Income Tax dept, P&L Account etc for the last 3 Financial Years shall be attached to the tender document.

Valid class I Contract License issued by the competent authority in state PWD / CPWD shall be enclosed.

#### **OTHER CONDITIONS**

1. Technical (Cover 1) & price Bids (Cover 2) supported by the above information should be submitted in a Sealed envelope (Cover 3) duly super scribed with the name of work, tender notice No., Last date of submission. The completed Bids will be received by this office **up to 15:00 Hrs. on 21.11.2022.** 

- 2. If any information furnished by the tenderers is found incorrect at a later stage, the firm shall be liable to be debarred from tendering and taking up of work in I.I.A. The Institute reserves the right to verify the particulars furnished by the tenderers.
- 3. The firms should submit their offers along with Tender fee of prescribed amount up to **15:00 Hrs.** on **21.11.2022.**
- 4. Incomplete Technical Bids are liable for rejection.
- 5. Late & / delayed offer will not be considered.
- 6. IIA is not responsible for any delay / loss of documents in transit.
- 7. The Tenders will be opened **on 21.11.2022** at **15:30** hours at **I.I.A, Bengaluru** in the presence of bidders or their authorized representatives. The representatives of the tenderers should bring authorization letter / identification while attending for opening of the tenders.
- 8. IIA reserves the right to reject any or all tenders without assigning any reasons.
- 9. The lowest quoted bidder cannot claim as lowest bidder unless the bidder satisfies all the tender conditions, technical qualifications and eligibility with supported documents complete in all respect.

Administrative Officer IIA, Bengaluru -34.

## INDIAN INSTITUTE OF ASTROPHYSICS 2<sup>nd</sup> Block, Koramangala, Bengaluru - 560 034.

Tender Notice No.: 59/IIA/CIVIL/VBO/KAVALUR/2022-23 Dated 19.10.2022

ers for the work of "Renovation valur, Tirupattur Dist., Tamil are in a position to quote for the attached Tender Form.
e Tender Schedule.
Yours faithfully,
Administrative Officer
For Director

#### 3. INSTRUCTIONS TO THE TENDERERS

- 1. The tenderers should submit the entire tender document with duly filled with price and technical details of the firm. All the pages of document shall be duly signed.
- 2. The rates quoted by the tenderer in the schedule shall be inclusive of all taxes and levies. Such rates should provide the break-up of the cost and applicable taxes, levies etc.
- 3. The Offers should be submitted in sealed envelope super scribed with Tender for "Renovation works at lab B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu". Notice No. and due date".
- 4. If any clarification is required should be obtained before filling Tender Document.
- 5. If any discrepancy is there between figures and words for quoted rates, the lower of the two will be considered for the purpose of evaluation.
- 6. The tenderers who do not fulfill all or any of the tender conditions or if the tender is Incomplete in any respect, will be summarily rejected.
- 7. The Institute is not bound to accept the lowest tender.
- 8. Even though the Tenderers meet the above criteria, they are subject to be disqualified if they have (The Institute reserves the right to verify the particulars furnished by the tenderers.)
  - Made misleading or false representations in the forms, statements and attachments submitted in proof of the qualification requirement, Conditional bid / proposal: and / or
  - Record of poor performance such as abandoning the works, not properly completing the contract, inordinate delays in completion, litigation history, or financial failures etc.
- 9. Any effort by the contractor to influence the client in the bid evaluation, bid comparison or contract award decision results in rejection of the contractors bid.
- 10. Financial offer will be considered if the bidders fulfill all the technical and financial eligibility criteria as per tender.
- 11. Late & / delayed offer will not be considered at all.
- 12. IIA is not responsible for any delay / loss of documents in transit.
- 13. No bids will be considered if prescribed Tender Fee and bid security declaration form are not found with the bid.
- 14. All overwriting and corrections shall be duly attested with stamp & signature.
- 15. Corrigendum's / modifications / corrections, if any, will be published in the website only.
- 16. The Director, Indian Institute of Astrophysics reserves the right to accept or reject the tenders in full or part without assigning any reason thereof.

- 17. Performance certificates of the completed works issued by the clients to be enclosed in the technical bid.
- 18. The committee constituted by the Director may inspect the previously completed or the ongoing works of the bidders to assess their technical suitability for the tendered work.
- 19. All the pages of the tender document to be signed by the contractor and submit them in the respective sealed covers.
- 20. The successful contractor will have to execute an Agreement with the Institute within 21 days of receipt of Letter of Intent / Work Order.
- 21. The lowest quoted bidder cannot claim as lowest bidder unless the bidder satisfies all the tender conditions, technical qualifications and eligibility with supported documents complete in all respect.
- 22. All the bidders are requested to visit the site before quoting the rates. The complete document shall be read and understood in all respect. If any clarification is required, the same may got cleared before submitting their offers in writing by contacting the following persons:

M.V.Ramaswamy Ph. No. 080-2254 1207 Mobile: 9742410480

E-mail.: mramaswamy@iiap.res.in

23. All the bidders are requested to visit Institute website <a href="www.iiap.res.in/tenders.htm">www.iiap.res.in/tenders.htm</a> till last date of submission of bids for latest updates on addendum, corrigendum, extensions etc. which will be notified only in website. No individual information will be provided.

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# INDIAN INSTITUTE OF ASTROPHYSICS 2<sup>ND</sup> BLOCK, KORAMANGALA, BENGALURU – 560 034.

Name of Work: "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu"

Tender Notice No.: 59/IIA/CIVIL/VBO/KAVALUR/2022-23 Dated 19.10.2022

Name of	
The Firm:	
A 44	
Address:	
DI N	
Phone No:	

Last date for submission: 21.11.2022 up to 15:00 hrs

## FORMAT FOR SUBMISSION OF TECHNICAL & ORGANIZATIONAL DETAILS.

NAME OF T	HE FIRM :
1. OFFICE SE	T UP OF THE FIRM
1.1	Office Address:
1.2	Year of Establishment:
1.3	Contact Person Shri
	With Designation
	Ph No
	Fax No
	E-mail
1.4	Details of registration if any:
1.5	Organizational setup of the firm
	Total staff strength both technical
	And Administration with their name, age
	Qualification and experience:
1.6	PAN (photocopy to be enclosed)
	GSTIN No (photocopy to be enclosed)

1.7 Details of the staff as per the following format.

Sl. No	Profession/ discipline	Name	Age	Qualification	Experience (total years)	Field of experience
	Civil					

#### 2 TENDERER'S EXPERIENCE

Details of Works carried out and on hand during last five years with details such as name of work, year of completion, client name and address, cost of work, time period of construction, nature of work, etc., (It shall enclose a certificate from the owner that the service rendered by the firm has been satisfactory)

Sl. No.	Name & description of work	Value of work and date.	Period of construction and date.	Client persons to whom reference may be made.

#### 3. TOOLS AND EQUIPMENT LIST

The tenderer shall indicate herein below the equipment he has in possession and the equipment he proposes to bring to the site, in case the work is awarded to him.

Sl. No	Type and Description of the equipment.	Numbers the bidder has in possession	Numbers he proposes to bring on to site

Tenderers hereby confirms that the quantity and type of tools he will employ for construction will not be less than those listed above and agree to bring more equipment if so warranted in the opinion of the Engineer-in-charge.

4.	FINANCI	AL		
	Bank	Name:		
		Branch:		
		Account No.:		
	Avera	ge Annual Turi	nover for last 5	Years:
5.	INSURA	NCE		
	Accide	ent Insurance	Insured with: Policy No.:	
6.	Details	of Arbitration c	rases	:
7.	•	her detail you w		1
	intimat	e in support of y	our technical bid	I
	for app	ointment		:
Sig	gnature of the	e authorized		
Pe	rson with sea	al of the firm		
(N	ote: Attach s	eparate sheet for	r furnishing infor	mation in case the space in the format is insufficient)

# INDIAN INSTITUTE OF ASTROPHYSICS 2<sup>ND</sup> BLOCK, KORAMANGALA, BENGALURU – 560034.

### **PRICE BID**

#### Name of Work: "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu"

Tender Notice No.: 59/IIA/CIVIL/VBO/KAVALUR/2022-23 Dated 19.10.2022

Name of			
The Firm:	 		_
Address:			
Phone No:			

Last date for submission: 21.11.2022 at 15:00 hrs

#### Tender for the "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu"

#### **Conditions of contract**

Sealed item rate tenders are invited by Indian institute of Astrophysics for the above mentioned work

Estimated cost : Rs. 20,44,000.00 (Rupees twenty lakhs forty four

thousand only)

Time of completion : Four (04) Months

Period of commencement : 7 days from the date of receipt of work order

Retention money/Security Deposit : 5% to be deducted from each RA bill and final bill,

shall be released after one year of completion of work, deducting the cost if any towards the cost of defects rectified by employer due to lack of response of the contractor on completion of defects liability period and on certification by the engineer –in charge.

Defects liability period : 12 Months.

Amount of liquidated damage : Liquidated Damages will be deducted from the bill

amount while making final payment for delay in completion of work if any, as per the extant rules of the

CPWD.

Escalation : In view of the short duration of the contract, no

escalation will be paid to the contractor on account of changes in the market prices of any items of work or

changes in the cost of living indices etc.

Tax deduction at source : Statutory taxes will be deducted while making

payment from time to time as applicable.

The Director, Indian institute of Astrophysics reserves the right to reject any or all the tenders without assigning any reason whatsoever.

The tenderer shall be responsible for arranging and maintaining at his own cost all **materials**, **tools** and **plants**, **water**, **electricity**, facilities **for workers**, **safety norms** and all other services required for executing the work.

Timely completion of work and quality of workmanship are of prime importance and the work shall be completed within the stipulated period. Cement consumption must match with standard theoretical calculations. Recovery to be effected in the event of not fulfilling the cement consumption. The waterproofing is the main work for which five year performance guarantee need to be provided by the applicator.

I/ We have read the tender notice, specifications, schedule, drawings, general rules and all other contents of the tender conditions, and Understand that you are not bound to accept the lowest or any tender you may receive.

I/ we hereby tender for the execution for the work specified above within the time specified above, at the rates specified in the attached bill of quantities and in all respects with these specifications, design, drawings and instructions.

I/we agree that should I/we fail to commence the work specified in the above memorandum an amount equal to amount of earnest money mentioned in the form of invitation of tender shall be absolutely forfeited to the Director.

Dated:	Signature of the contractor with stamp

#### **General conditions of contract.**

#### Item rate tender for works.

The institute reserves the right to alter the scope /or reduce quantum of work before issued to the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the scope is reduced and the right to alter the right t	ue of
work order and the contractor shall not have any claim what so ever on this account.	

- Rates quoted by the contractor in item rate tender in figures and words shall be accurately filled in so that there is no discrepancy in the rates written in figures and words. However if a discrepancy is found, the rates which correspond with the words worked out by the contractor shall be taken as correct.
- □ If the amount of an item is not worked out properly by the contractor or it does not correspond with the rate written either in figures or words, then the rate quoted by the contractor in the words shall be taken as correct.
- □ When the **rates quoted by the contractor in figures and in words** tally but the amount is not worked out correctly the rate quoted in words by the contractor will be taken as correct and not the amount.
- □ The contractor shall take all precautionary measures to prevent entry of dust, dirt and noise pollution to the adjacent buildings and keep the premises neat and tidy, remove surplus materials and rubbish and shall not cause inconvenience to the staff of IIA. If the contractor or his working people or servants shall break, deface, injure or destroy any part of a building in which they may be working or any buildings, road, kerbs, fence, enclosure, water pipes cables, drains, electric and telephone posts or wire, trees grass or garden. The cost of any such damage and risks arising out of this shall be entirely borne by the contractor.
- A bill shall be submitted by the contractor each month on or before the date fixed by the Engineer- in charge. All the measurements of the work may be recorded jointly by the Engineer-in charge and the contractor or their respective representatives. The measurements will be taken at site, as per latest IS code of practice for measurements. All measurements shall be taken with steel tapes only.
- □ The Engineer- in -Charge shall have full powers to the removal from the premises of all materials and bad workmanship, which in his opinion are not in accordance with the specifications.

- □ The Engineer –in- Charge may require the contractor to dismiss or remove from the site of the work any person or persons in the contractors employ upon the work who may be in competent or misconduct himself.
- □ For working on Sundays, holidays and late hours prior permission will be accorded by the Engineer-in charge on the application made by the contractor.
- □ All works to be executed under the contract shall be executed under the direction and subject to the approval in all respects of the Engineer-in charge who shall be entitled to direct at what point or points and in what manner they are to be commenced and from time to time carried on.
- □ The contractor shall treat all materials obtained during dismantling of a structure, excavation of the site for a work etc as institute's property and such materials shall be disposed off to the best advantage of the institute.
- □ The contractor shall execute the whole and every part of the work in the most substantial and workman like manner and in strict accordance with the specifications of the CPWD / DOS / Bureau of Indian Standards. In case of any class of work for which there is no such specifications the contractor shall carry out the work in all respects in accordance with the instructions in writing of the Engineer- in charge.
- □ The Engineer-in charge shall have powers to make any alterations in, omissions from, additions to or substitutions for the original specifications, drawings, designs and instructions that may appear to him necessary or advisable during the progress of the work and the contractor shall carry out the work in accordance. The rates for such additional, altered or substituted items of work shall be worked out in accordance with the standard procedure followed in CPWD / DOS.
- □ If at any time after the commencement of the work, the Director shall for any reason whatsoever not require the whole thereof as specified in the tender to be carried out, the Engineer- in-Charge shall give notice in writing of the fact to the contractor who shall have no claim to payment of compensation whatsoever on account of any profit or advantage which he might have derived from the execution of the work in full, but which he did not derive in consequence of the full amount of the work not having been carried out, neither shall he have any claim for compensation by reason of any alterations having been made in the original specifications, drawings, designs and instructions which shall involve any curtailment of the work as originally contemplated.

- The contractor shall obtain a valid license under the Contract Labour (R&A) act 1970 and the contract labour (Regulation & Abolition) central rules, 1971 before the commencement of the work and continue to have a valid license until the completion of the work. No labour below the age of eighteen years shall be employed on the work. The contractor shall pay to labour employed by him either directly or through sub contractors, wages not less than fair wages as defined in the provision of the contract labour (R&A) act 1970 and the contract labour (R&A) central rules 1971 wherever applicable.
- □ The contractor shall at his own expenses arrange for the safety provision as per safety code framed from time to time and shall at his own expenses provide for all facilities in connection therewith.
- □ The contractor shall comply with all the provisions of the payment of wages act 1936, Minimum Wages Act 1948, Employees liability act 1938, Workmen's Compensation act 1923, Industrial Disputes Act 1961 and the Contractors Labour (R&A) Act 1970 or the modifications thereof or any other laws relating thereto and the rules made there under from time to time. The regulations aforesaid shall be deemed to be a part of this contract and any breach thereof shall be deemed to be a breach of this contract. Security deposit will not be refunded till clearance certificate from Labour Officer is obtained by contractor.
- □ The contractor shall make his /their own arrangements for water required for the works and nothing extra will be paid for the same, as the water available from the institute source may not be sufficient to meet the construction.
- □ The contractor shall have all the tools and plants necessary to carry out the work such as concrete mixer, vibrator and hoist. The contractor shall employ one graduate engineer during the execution of the work
- □ Certified plumbers should be employed by the contractor on the plumbing and sanitary work.
- □ The standard sectional weights referred to as standard tables in para 5.3.4 (TABLE 5.4) in CPWD specifications for works 2019 vol. 1 to be considered for conversion of length of various sizes of M.S bars and tor steel bars in to weight.
- The entire work is to be completed within the period stipulated i.e. **Four (04) months** from the 7<sup>th</sup> day of issue of Letter of Intent/Work Order. The period includes monsoon period also. Time shall be the essence of the contract. After the work awarded, the contractors shall furnish detailed time schedules for the approval of the Engineer-in charge which after approval shall form part of the contract and are to be strictly adhere to.
- The maintenance period for the work shall be twelve (12) months and any defects noticed during the period shall have to be rectified by contractor at his cost, failing which the action taken for maintenance Engineer-in charge shall be final over which the contractor will not have any claim.

- □ The contractor shall extend all co-operations to the contractors executing works such as electrical, air conditioning etc who might be working at the site and shall permit to use scaffolding etc already put up by him.
- □ The Engineer-in charge will have the right to get any item of the work included in this tender or not executed through other agencies. Schedule of probable quantities in respect of the work and specifications are enclosed. The schedules of probable quantities are liable to alterations by emission, deduction or additions at the discretion of the Engineer-in charge.
- The rates quoted by the tenderer in the schedule shall be inclusive of all taxes and levies. Such rates should provide the break-up of the cost and applicable taxes, levies etc.
- □ Samples of all materials to be incorporated in the works shall be submitted to the Engineer-in charge for his approval without claiming any extra cost. Materials not confirming strictly to the samples are liable to be rejected.
- The employment of any sub-contractors will be subjected to the approval of the Engineer-in-charge. If at any time during the progress of the work the Engineer-in charge determines that any sub-contractor is in competent or undesirable the contractor shall take steps immediately to cancel such sub-contractor. The contractor shall be entirely responsible for all the work included in the contract whether executed by him or through his sub-contractors. In particular it may be noted that the contractor shall obtain steel doors and windows from a reputed manufacturer and before placing order for these, the contractor shall obtain the concurrence of the department for the agency from whom he proposes to obtain steel doors and windows.
- □ The contractor shall prepare a CPM /PERT /BAR chart/ detailed estimate programme within a week's time of issue of Work Order.
- □ All materials and articles brought by the contractor to the work site shall have to be declared at the security gate. Similarly no materials shall be taken out from the departmental premises without proper gate pass which will be issued by the Engineer-in charge.
- □ Unless otherwise provided in the schedule of quantities the rates tendered by the contractor shall be all inclusive and shall apply to all heights, lifts, leads and depths of the building and nothing extra shall be payable to him on this account.
- Sample of various materials required for testing shall be provided free of charge by the contractor. Testing charges, if any unless otherwise provided, shall be borne by the department. All other expenditure required to be incurred for taking the samples, conveyance, packing etc. shall be borne by contractor himself. In case of concrete and reinforced concrete work, the contractor shall be required to make arrangement for carrying out compression strength tests at his own cost including preparation of cubes curing etc. complete.

For the purpose of recording measurements and preparing running account bills, the abbreviated nomenclature shall be accepted along with the item number.
The contractor shall along the tender submit a schedule of machinery to be used on the work in support of his assurance to adhere to the time schedule specified in the proforma given.
I/We declare that the work will be carried out as per the specifications in tender document and as per the specifications said above. The items of work not covered in the specifications said above will be carried out as per the specifications in the relevant CPWD specifications, and if not covered in CPWD specifications the work will be carried out as in the relevant IS specifications, and if not covered in the any of the above, the work will be carried out as directed in writing by the Engineer- in charge.
I / We declare that the rates quoted by me/us are on the basis of the above.

**Dated: -----**

Signature of the contractor with stamp

#### **TENDER FORM**

To.

The Director, Indian institute of Astrophysics, Koramangala, Bengaluru - 560034

Dear Sir,

Sub: Tender for project: "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu"

With reference to the tender invited by you for the above proposed work, I/we write this after having:

- a). Examined the designs, drawings, detailed specifications to tenders, sample agreement, the general conditions of contract and special conditions of contract annexed there to (here in after called 'the contract documents') relating to construction.
- b). Visited and examined the site of the proposed work and acquired the requisite information relating to or affecting the tender. We are agreed to the decisions of the pre bid meeting by signing and stamping the minutes of the meeting which is enclosed along with this tender.

I/We undersigned hereby offer to construct the proposed work in strict accordance with the contract document for the consideration to be calculated in terms of the priced schedule of quantities.

I/We undertake to complete the whole of the works as per the attached schedule from the date of issue of intimation by you that our tender has been accepted and up on being permitted to enter site. I/We further undertake that on failure, subject to the conditions of contract relating to extension of time, I/We shall be agreed 'Liquidated damages' for the period during which the work shall remain incomplete.

I/We	hereby	deposit	with	you	as	earnest	money	Rs	. (RUPEES
•••••	•••••	•••••		•••••	• • • • • •	•••••	• • • • • • • • • • • • • • • • • • • •	ONLY) [Carr	ying no interest]
and I/V	We fail to	take up the	contrac	t when	calle	d up on to	do so.		
0 D									
	ankers are								
1.									
2									
2.									
Place:									
Date:									
								Signat	ure of the tenderer
									artners of the firm
								•	Or
					Nam	ne of the pe	erson havii	ng power of attorney to	o sign the contract

#### **SPECIAL CONDITIONS**

#### **GENERAL:**

SPECIAL CONDITIONS OF CONTRACT shall be read in conjunction with GENERAL CONDITIONS OF CONTRACT and both form an integral part of contract. Where the two are at variance, the conditions stipulated in this as SPECIAL CONDITIONS shall supersede relevant GENERAL CONDITIONS.

#### 1. SPECIAL CONDITIONS:

#### **HELMETS:**

As a measure of safety, persons employed on the site, Engineers and Supervisors shall wear a helmet of approved make at all times when they are at the site. No visitors shall be allowed on work site without wearing helmet.

Contractors shall make arrangements to provide safety helmets to all the persons employed on the site, Engineers and Supervisors at his cost.

Contractors shall display safety and warning signs at strategic locations at the site.

#### **CHILD LABOUR:**

Contractor or his Sub-contractor shall not employ any child labourers on the work site, either permanently or temporarily. It shall be the responsibility of the main Contractor to make sure that no child labour is employed at the site. Contractor shall indemnify the Employer against any consequences statutory or otherwise, that may arise out of employing child labour on the site.

#### **TEMPORARY ELECTRICAL WIRING:**

It shall be the responsibility of the main Contractor to make sure that the temporary wiring for construction activity shall adhere to minimum safety precautions as per Electricity Act. All wires / cables shall be drawn on wooden poles properly fixed and shall be drawn overhead.

#### 2 <u>LABOUR SHEDS:</u>

Labour sheds shall be constructed with non-combustible materials like GI sheets or Asbestos sheets. Contractor will not be permitted to use combustible materials such as palm leaves etc., for the construction of the labour sheds.

#### 3. MATERIALS SUPPLY / PROCUREMENT:

No materials will be supplied by the owner. If any increase on the material procurement cost/ labour, P&M will not be entertained for any kind of escalation till completion of the project.

#### 4. <u>BILLING CERTIFICATION & PAYMENT OF BILLS:</u>

#### **BILLING:**

The contractor shall prepare measured bills after completing the quantum of work as per the standard format and submit the same to the Institute for checking and issue of Certificates for Payment. A proper tax invoice (with breakup of the cost and taxes) shall be submitted and bill shall be settled within 30 days of receipt at IIA. Running account bills shall be prepared and submitted and payment is subject to consideration of the engineer in Charge/IIA.

#### **PAYMENT OF BILLS:**

The contractor shall be paid by the Employer from time to time based on the certificate from the architect/project in charge for running bill accounts and final bill.

#### 5. REPAIR OF WORKS DONE BY OTHER AGENCIES:

The civil contractor shall make up any deficiency in the finishing of the areas damaged by other agencies in a workmanlike manner to achieve uniform finishing of the building at no extra cost.

#### 6. MATERIAL TESTS:

The contractor shall provide such assistance, instruments, machines, labour and materials as are normally required for examining, measuring and testing.

The contractor shall install a compression testing machine at site to test concrete cubes and solid blocks.

The contractor shall maintain a record of all the test results in an approved format and periodically submit the same for Architect's/Employer's scrutiny.

#### 7. PLANT & MACHINERY:

The contractor is obliged to furnish to the Employer detailed list of equipment, plant, machinery & personnel proposed to be deployed in this project.

#### 8. CLIENT'S & ARCHITECT'S OFFICES & FACILITIES:

The contractor shall supply, erect and satisfactorily maintain in good repair until final completion of works, a well lighted temporary site office.

The contractor shall provide at all times for the duration of the contract survey instruments for the exclusive use of consultants as directed by consultants for carrying out of his duties in connection with the contract.

Such instruments which must be approved by the Architect shall include but not limited to the following:

- One theodolite & tripod capable of reading to 20 seconds
- One level with horizontal circle and tripod.
- Two metric leveling staffs not less than 3.5mtr high.
- One 100 metre rustless steel band, one 30 metre rustless steel tape and two 30 metre linen tapes.
- An adequate number of ranging rods drop arrows, wooden setting-out pegs, etc.

The contractor shall be solely responsible for all such instruments and equipment's and shall ensure that they are at all times in good repair and adjustment.

#### 9. <u>SANITATION & DRAINAGE DURING CONSTRUCTION</u>:

The contractor shall provide sanitation and drainage facilities on the site as stated subsequently.

The contractor shall strictly control the labour so that the site is not polluted, made dirty or littered with debris, wastes or the likes. Any person found creating mess or litter or pollution shall be removed from the site immediately at contractor's cost.

The contractor shall provide sanitation facilities at convenient locations on site to preserve the cleanliness of the site. The effluent shall be directed as follows:

- Waste water : Collection and pumping out and disposal off the site in

approved manner.

- Sewage : Septic tank provision - sludge to be collected and

disposed off at intervals as directed.

The location of the above provisions shall be as marked on the site mobilization scheme drawing.

#### 10. DISCREPANCIES:

The contractor shall bring to the notice of the Architect any discrepancies within or between contract drawings and/or the other contract documents prior to preparation of working drawings and commencement of work and shall not proceed with work until the Architect gives clarifications and instructions to proceed.

#### 11. REPORTS BY CONTRACTOR:

- 11.1 The contractor shall file daily category-wise labour return. The report shall indicate scheduled requirement against actual strength.
- 11.2 The contractor shall prepare weekly reports of planned and actual progress of work and subsequent week's scheduled work. These will also include material procurement status. These reports shall be submitted to Architect and shall be reviewed during weekly co-ordination meeting.
- 11.3 The contractor shall submit monthly report along with monthly bills.
- 11.4 Further progress charts and schedules shall be prepared by the contractor as directed by the Architect.
- 11.5 The contractor shall submit re-conciliation statement of all the materials supplied by the Client, if any, along with every running &final bill.

#### 12. FORCE MAJEURE:

If the work(s) be delayed by:-

- (i) Force majeure, or
- (ii) Abnormally bad weather, or
- (iii) Serious loss or damage by fire, or
- (iv) Civil commotion, local commotion of workmen, strike or lockout, affecting any of the trades employed on the work, or
- (v) Delay on the part of other contractors or tradesmen engaged by Engineer-in-Charge in executing work not forming part of the Contract, or
- (vi) Non-availability of stores, which are the responsibility of Government to supply
- (vii) Non-availability or break down of tools and Plant to be supplied or supplied by Government or

(viii) Any other cause which, in the absolute discretion of the Engineer-in-Charge is beyond the Contractor's control.

Then upon the happening of any such event causing delay, the Contractor shall immediately give notice thereof in writing to the authority as indicated in Schedule but shall nevertheless use constantly his best endeavours to prevent or make good the delay and shall do all that may be reasonably required to the satisfaction of the Engineer-in-Charge to proceed with the works.

#### 13. PERFORMANCE GUARANTEE:

To ensure due performance of the contract, performance security or Performance Bank Guarantee (PBG) is to be obtained from the successful bidder awarded the contract. Performance security should be for an amount of three (3) percent of the value of the contract or as per the prevailing notification on the date of work order.

In works contract it is usual to take three percent of contract value Performance Security. Performance security may be furnished in the form of an 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 client's interest in all respects.

Performance Security is to be furnished by a specified date generally 21 (twenty-one) days after notification of the award 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).

The performance security will be forfeited and credited to the procuring entity's account in the event of a breach of contract by the contractor. It should be refunded to the contractor without interest, after he duly performs and completes all obligations under the contract but not later than 365 days of completion of the Defect Liability Period (DLP). Return of Bid/ Performance Securities should be monitored and delays should be avoided. If feasible, so as to make the process transparent and visible.

#### 14. ARBITRATION:

All disputes or differences which may arise between the IIA and the contractor, with regard to the meaning or interpretation or matter or things done or to be done in pursuance thereof, shall be resolved as per the Indian Arbitration Act 1996 by the Sole Arbitrator. The Director IIA is the sole arbitrator and his decision shall be final and binding on both the parties.

In case any dispute or difference shall arise between the IIA and the contractor either during the progress or after the completion or abandonment of the works as to the construction of this contract or as to any matter or thing of whatsoever nature arising there under or in connection therewith, then such dispute or difference shall be and is hereby referred to the Arbitration of a common Arbitrator, if agreed upon or otherwise to two Arbitrators one to be appointed by each party to the dispute and the Arbitration shall be governed by the Arbitration Act, for the time being in force.

#### 15. PLANNING AND DESIGNING IN PURVIEW OF VULNERABILITY ATLAS OF INDIA:

Vulnerability Atlas of India (VAI) is a comprehensive document which provides existing hazard scenario for the entire country and presents the digitized State/UT-wise hazard, maps with respect to earthquakes, winds and floods for district-wise identification of vulnerable areas. It also includes additional digitized maps for thunderstorms, cyclones and landslides. The main purpose of this Atlas is its use for disaster preparedness and mitigation at policy planning and project formulation stage.

This Atlas is one of its kind single point source for the various stakeholders including policy makers, administrators, municipal commissioners, urban managers, engineers, architects, planners, public etc. to ascertain proneness of any city/location/site to multi-hazard which includes earthquakes, winds, floods thunderstorms, cyclones and landslides. While project formulation, approvals and implementation of various urban housing, buildings and infrastructures schemes, this Atlas provides necessary information for risk analysis and hazard assessment. The Vulnerability Atlas of India has been prepared by Building Materials and Technology Promotion Council under Ministry of Housing and Urban Affairs, Government of India and available at their website www.bmtpc.org.

It is mandatory for the bidders to refer Vulnerability Atlas of India for multi-hazard risk assessment and include the relevant hazard proneness specific to project location while planning and designing the project in terms of :

- i) Seismic zone (II to V) for earthquakes
- ii) Wind velocity (Basic Wind Velocity: 55, 50, 47, 44, 39 & 33 m/s)
- iii) Area liable to floods and Probable max. surge height
- iv) Thunderstorms history
- v) Number of cyclonic storms/severe cyclonic storms and max. sustained wind specificto coastal region.
- vi) Landslides incidences with Annual rainfall normal
- vii) District wise Probable Max. Precipitation

#### SPECIAL NOTE TO THE BIDDERS

- 1. The bidders are requested to visit the site and to get complete knowledge about the site conditions before quoting the rates. The date of site visit is on 04.11.2022 in presence of concerned officers/Engineers of IIA.
- 2. The availability of materials, transportation of materials etc. to be ascertained before quoting the rate.
- 3. No labour will be allowed to work/stay beyond working hours and during institute holidays. If need to work/stay beyond working hours on holidays, prior permission from the Engineer in Charge / Scientist in Charge should be obtained in writing.
- 4. No water and electricity will be supplied by IIA and separate arrangement has to be made by the contractor.
- 5. Quality and time for completion are the main essence of the contractor and contractor has to keep in mind while quoting the rates.
- 6. Since the area under renovation is scientific activity area, proper care to be taken to avoid disturbance to the working personnel.
- 7. All the debris shall be kept in one place as directed by the Engineer in Charge and disposed off outside the campus on working days. Working area / surrounding area shall be kept neat and clean every day after the work is completed.
- 8. All the materials shall be approved by IIA by providing sample / mock up before executing the complete work. Clarification regarding tender clauses, technical specification, rate analysis etc. will be confirmed by referring to CPWD guidelines, works manual, specifications and analysis of rate which is binding on the contractor. Indian Standards (IS) shall be followed for execution of works. The same will be referred for any clarification during execution of works.
- 9. The lowest quoted bidder cannot claim as lowest bidder unless the bidder satisfies all the tender conditions, technical qualifications and eligibility with supported documents complete in all respect.
- 10. Please find the check list enclosed in the last page of this tender document and comply accordingly. (No document will be considered without check list compliance)

#### **COVID-19 Guidelines for Construction Workers**

- ❖ IIA is committed for protecting the health and safety of construction workers and workplaces during the COVID-19 pandemic. The contractor is hereby informed to adhere the following steps to reduce risk of spread to the corona virus for construction workers:
- ❖ Instruct workers who are sick/ having symptoms to stay away from site.
- ❖ Implement physical distancing practices to maintain at least 2 mts between coworkers/contractors/visitors, including while inside work trailers.
- Minimize close discussions at site among workers and visitors (including toolbox talks and safety meetings).
- ❖ Provide and have all workers wear face coverings (i.e., cloth face coverings or surgical masks) that have at least two layers of tightly woven breathable fabric, unless their work task requires a respirator. Face coverings should be provided at no cost to workers.
- ❖ Continue to use other normal control measures, including personal protective equipment, necessary to protect workers from other job hazards associated with construction activities.
- ❖ Provide and ensure workers use the supplies necessary for good hygiene practices. If workers do not have immediate access to soap and water, use alcohol-based hand sanitizers that contain at least 60 percent ethanol or 70% isopropanol.
- ❖ Do not allow workers to share tools and equipment. If sharing cannot be eliminated, clean and disinfect between each use.
- Clean and disinfect portable jobsite toilets and fill hand sanitizer dispensers regularly.
- ❖ IIA will take safety measures in view of COVID-19 at main gate by way of thermal scanning and hand sanitization for which all workers should cooperate.

#### LIST OF APPROVED MATERIALS

#### **CIVIL**

Sl. No	Material	Make
1	Steel	SAIL – TMT, VIZAG STEEL
2	Cement	ACC / Birla / L & T
3	Acrylic Exterior Emulsion	Asian Paints
4	Plastic Emulsion Paint	Asian Paints
5	Enamel Paint	Asian Paints
6	Aluminium	Tata / Jindal or equivalent
7	Glass	Saint Gobain, Modi
8	Flush Door	Greenply / Century door / Kutty's Bond Wood
9	M.S. sections	Zindal / Tata / Vizag steel
10	Veneer / laminate /ply	Century / Greenlam / merino
11	Waterproofing	Fosroc / IS approved or equivalent
12	Vitrified Tiles	Kajariya / Cera / Nitco / Rak / Johnson
13	Ceramic tiles	Kajariya / Cera / Nitco / Rak / Johnson

#### WATER SUPPLY AND SANITARY WORKS

Sl.No.	Material	Make		
1	PVC	Ashirvad / Kisan / Supreme		
2	CPVC	Astral / Ashirvad / Supreme		
3	C.P. Fittings	Jaguar / Hindware / approved equivalent		
4	Ceramic fittings	Hindware / Jaguar / approved equivalent		
5	SFRC manhole frame and Covers	Southern Concrete Industries/approved equivalent		
6	Kitchen sink	Hindware / Cera / Nirali / Approved Equivalent		
7	Anchor bolts	Hilti / approved equivalent		
8	SS Grating & MH frame & cover	NECO / Approved equivalent		

# BILL OF QUANTITIES

## Bill of quantities for the work of "Renovation works at lab - B building, Vainu Bappu Observatory (VBO), IIA, Kavalur, Tirupattur Dist., Tamil Nadu"

#### (NOTE: Rates shall be quoted after reading the complete Specifications and understanding site conditions)

Sl.No	Description	Quantity	Unit		Amount (Rs.)	
				In figures		In words
1	<b>Dismantling tile</b> work in floors and roofs laid in cement mortar including stacking material within 50 metres lead.					
1.1	For thickness of tiles 10 mm to 25 mm	251.00	sqm			
2	<b>Demolishing brick work</b> manually/ by mechanical means including stacking of serviceable material and disposal of unserviceable material within 50 metres lead as per direction of Engineer-in-charge.					
2.1	In cement mortar	2.00	cum			
3	<b>Dismantling doors, windows, ventilators</b> and clerestory windows (steel or wood) shutter including chowkhats, architrave, holdfasts etc. complete and stacking within 50 metres lead:					

Sl.No	Description	Quantity	Unit		Amount (Rs.)	
				In figures	In words	
3.1	Of area 3 sq. metres and below	2.00	each			
4	Dismantling W.C./Indian Pan, wash basin, urinal, etc of all sizes with accessories/fixtures including disposal of dismantled materials i/c malba all complete as per directions of Engineer-in-Charge.	28.00	each			
5	Dismantling G.I. pipes (surface/concealed work) including excavation and refilling trenches after taking out the pipes, manually/ by mechanical means including stacking of pipes within 50 metres lead as per direction of Engineer-in-charge:					
5.1	15 mm to 40 mm nominal bore	180.00	rm			
6	Removing white or colour wash or emulsion paint by scrapping and sand papering and preparing the surface smooth including necessary repairs to scratches etc. complete	125.00	sqm			
7	<b>Hacking</b> of CC flooring including cleaning for surface etc. complete as per direction of the Engineer-in-Charge.	250.00	sqm			

Sl.No	Description	Quantity	Unit		Amount (Rs.)	
				In figures	In words	
8	<b>Brick work</b> with common burnt clay machine moulded perforated bricks of class designation 12.5 conforming to IS: 2222 in superstructure above plinth level up to floor five level in cement mortar 1:6 (1 cement : 6 coarse sand) : Note: Rate is including scaffolding, curing, etc					
8.1	With Modular bricks	1.00	cum			
9	Half brick masonry with common burnt clay F.P.S. (non modular) bricks of class designation 7.5 in superstructure above plinth level up to floor V level. Note: Rate is including scaffolding, curing, etc					
9.1	Cement mortar 1:4 (1 cement :4 coarse sand)	1.00	sqm			
10	Plastering on internal & external surface of 12mm thick with cement mortar specified below, finished smooth, including scaffolding, curing, etc; complete for INTERNAL & EXTERNAL SURFACES of stone masonry/brick masonry walls sills, jambs, etc; complete all as per specifications UPTO FLOOR LEVEL, mix specified is for cement: fine sand.NOTE: CM 1:3 OR 1:4 is generally applicable for ceilings and RCC surfaces unless otherwise specified.					

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
			-	In figures	In words	
10.1	1:6 (1 cement: 6 fine sand) Wall surfaces	8.00	sqm			
11	Providing and laying in position specified grade of <b>reinforced cement concrete</b> , excluding the cost of centering, shuttering, finishing and reinforcement - All work up to plinth level:					
11.1	1:1.5:3 (1 cement : 1.5 coarse sand (zone-III) derived from natural sources : 3 graded stone aggregate 20 mm nominal size derived from natural sources)	1.50	cum			
12	<b>Centering and shuttering</b> including strutting, propping etc. and removal of form for:					
12.1	Walls (any thickness) including attached pilasters, butteresses, plinth and string courses etc.	9.00	sqm			
13	Steel <b>reinforcement</b> for R.C.C. work including straightening, cutting, bending, placing in position and binding all complete above plinth level.					
13.1	Thermo-Mechanically Treated bars of grade Fe-500D or more.	155.00	kg			

Sl.No	Description	Oventity	Quantity Unit		Rate (Rs.)	Amount (Rs.)
		Quality		In figures	In words	
14	<b>Supplying, filling, spreading &amp; leveling stone boulders</b> of size range 5 cm to 20 cm, in pit, in the required thickness, for all leads & lifts, all complete as per direction of Engineer-in-charge.	4.00	cum			
15	Providing and laying in position <b>cement concrete</b> of specified grade excluding the cost of centering and shuttering - All work up to plinth level :					
15.1	1:3:6 (1 Cement : 3 coarse sand (zone-III) : 6 graded stone aggregate 20 mm nominal size).	1.50	cum			
16	Cutting holes of required size in brick masonry wall for fixing of exhaust fan including providing and fixing 300 mm dia PVC pipe conforming BIS-12818 and making good the same etc. complete as per direction of Engineer-in-charge.	7.00	each			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words	
17	Providing and fixing Ist quality <b>ceramic</b> glazed <b>wall tiles</b> conforming to IS: 15622 (thickness to be specified by the manufacturer), of approved make, in all colours, shades except burgundy, bottle green, black of any size as approved by Engineer-in-Charge, in skirting, risers of steps and dados, over 12 mm thick bed of cement mortar 1:3 (1 cement : 3 coarse sand) and jointing with grey cement slurry @ 3.3kg per sqm, including pointing in white cement mixed with pigment of matching shade complete. Basic rate: 75/sft.	250.00	sqm			
18	Providing and laying rectified Glazed Ceramic floor tiles (Anti-skid) of size 300x300 mm or more (thickness to be specified by the manufacturer), of 1st quality conforming to IS: 15622, of approved make, in all colours, shades, except White, Ivory, Grey, Fume Red Brown, laid on 20 mm thick Cement Mortar 1:4 (1 Cement: 4 Coarse sand), jointing with grey cement slurry @ 3.3 kg/ sqm including pointing the joints with grouting and matching pigments etc., complete. Basic rate: 75/sft.	60.00	sqm			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words	
19	Providing and laying <b>vitrified floor tiles</b> in different sizes including skirting (thickness to be specified by the manufacturer) with water absorption less than 0.08% and conforming to IS: 15622, of approved make, in all colours and shades, laid on 20mm thick cement mortar 1:4 (1 cement : 4 coarse sand), jointing with grey cement slurry @ 3.3 kg/sqm including grouting the joints with white cement and matching pigments or grouting etc., complete. Note: Tiles either glossy/double charge/mat finish may be finalized based on decision of Engineer incharge. Basic rate: 90/sft.					
19.1	Size of Tile 600x600 mm	267.00	sqm			
20	Chequered terrazo tiles 22 mm thick with graded marble chips of size up to 6 mm in floors, jointed with neat cement slurry mixed with pigment to match the shade of the tiles or grouting, including rubbing and polishing complete, on 20 mm thick bed of cement mortar 1:4 (1 cement :4 coarse sand): Basic rate: 75/sft.					
20.1	Medium shade pigment using 50% white cement, 50% ordinary cement.	17.00	sqm			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words	
21	Providing and fixing stainless steel (Grade 304) hand rail made of Hollow tubes, channels, plates etc., including welding, grinding, buffing, polishing and making curvature (wherever required) and fitting the same with necessary stainless steel nuts and bolts complete, i/c fixing the railing with necessary accessories & stainless steel dash fasteners, stainless steel bolts etc., of required size, on the top of the floor or the side of waist slab with suitable arrangement as per approval of Engineer-in-charge, (for payment purpose only weight of stainless steel members shall be considered excluding fixing accessories such as nuts, bolts, fasteners etc.).	100.00	kg			
22	Providing and applying white cement based <b>putty</b> of average thickness 1 mm, of approved brand and manufacturer, over the plastered wall surface to prepare the surface even and smooth complete. Note: Rate is including scaffolding, etc Brand: Birla	470.00	sqm			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words	
23	Wall painting with <b>premium acrylic emulsion paint</b> of interior grade, having VOC (Volatile Organic Compound) content less than 50 grams/ litre of approved brand and manufacture, including applying additional coats wherever required to achieve even shade and colour. Note: Rate is including scaffolding, etc Brand: Asian paints					
23.1	Two coats	930.00	sqm			
24	Painting with <b>synthetic enamel paint</b> of approved brand and manufacture of required colour to give an even shade: Note: Rate is including scaffolding, etc Brand: Asian paints					
24.1	One or more coats on old/new work	60.00	sqm			
25	Making <b>groove cutting</b> in walls & Floor for laying of electrical conduits, modules, etc and making the surface smooth by plastering in CM 1:3 with GI/fibre mesh.	198.00	rm			
26	Fixing of electrical modular box /metal box of various size in position including packing, alignment, etc and finishing the surface smooth by plastering in CM 1:3 with GI mesh.	34.00	each			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)				
		Quantity		In figures	In words					
27	<b>Disposal of building rubbish</b> / malba / similar unserviceable, dismantled or waste materials by mechanical means, including loading, transporting, unloading to approved municipal dumping ground or as approved by Engineer-in-charge, beyond 50 m initial lead, for all leads including all lifts involved.	10.00	cum							
	Joinery works									
28	Providing wood work in frames of doors, windows, clerestory windows and other frames, wrought framed and fixed in position with hold fast lugs or with dash fasteners of required dia. & length									
28.1	Sal wood	0.10	cum							
29	Providing and fixing ISI marked waterproof flush door shutters conforming to IS:2202 (Part I) decorative type, core of block board construction with frame of 1st class hard wood and well matched teak 3 ply veneering with vertical grains or cross bands and face veneers on both faces of shutters.									
29.1	35 mm thick including ISI marked Stainless Steel butt hinges with necessary screws	2.00	sqm							

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quality 1		In figures	In words	
30	Repairing of existing Main door shutters with provision of door seal strip which may be made by wood/PVC/metal, etc and providing & fixing of necessary fixtures such as hinges, tower bolts, handles, beadings and door locks, etc., complete.	13.00	each			
31	Repairing of existing toilet door shutters with provision of aluminium sheet of 0.6mm thick on full surface of inner side of the door for water protection and providing & fixing of necessary fixtures such as hinges, tower bolts, handles, beadings and door locks, etc.,	13.00	each			
32	Taking out existing wooden window shutters, repair by replacing SS mesh, beadings, tower bolt, cutting, painting, etc. and re-fixing of repaired windows shutters to existing frames, including replacement of hinges with screws, etc. as required, all complete as per the direction of the Engineer-in-charge.Note: quoting rate should be each window, which may consist of two or three or more shutters.	13.00	each			

Sl.No	Description	Quantity	Unit	In figures	Rate (Rs.) In words	Amount (Rs.)
33	Providing and fixing Glass Reinforced Plastic/polyester (GRP) Door Frames of cross-section 90 mm x 45 mm having single rebate of 32 mm x 15 mm to receive shutter of 30 mm thickness. The laminate shall be moulded with fire resistant grade unsaturated polyester resin and chopped mat. Door frame laminate shall be 2mm thick and shall be filled with suitable wooden block in all the three legs. The frame shall be covered with fiber glass from all sides. M.S. stay shall be provided at the bottom to steady the frame. Note: Rate is including fixtures for fixing the frames, i.e screws, etc,	6.00	rm	In figures	III words	
34	Providing and fixing to existing door frames.					
34.1	Plastic/polyester (GRP) panelled door shutter of required colour and approved brand and manufacture, made with fire retardant grade unsaturated polyester resin, moulded to 3 mm thick GRP laminate for forming hollow rails and styles, with wooden frame and suitable blocks of seasoned wood inside at required places for fixing of fittings, cast monolithically with 5 mm thick GRP laminate for panels conforming to IS: 14856, including fixing to frames.Note: Rate is inclusive of tower bolt on both inner & outer sides and handles, etc.	2.00	sqm			

Sl.No	Description	Quantity	Unit	In figures	Rate (Rs.) In words	Amount (Rs.)
		water	supply	and sanitary w		
35	Providing and fixing Chlorinated Polyvinyl Chloride (CPVC) pipes, having thermal stability for hot & cold water supply, including all CPVC plain & brass threaded fittings, i/c fixing the pipe with clamps at 1.00 m spacing. This includes jointing of pipes & fittings with one step CPVC solvent cement and the cost of cutting chases and making good the same including testing of joints complete as per direction of Engineer in Charge. Concealed work, including cutting chases and making good the walls etc.					
35.1	20 mm nominal dia Pipes	180.00	rm			
35.2	25 mm nominal dia Pipes	75.00	rm			
36	Providing, laying and jointing unplasticized <b>PVC pipes</b> and specials of working pressure as mensioned below conforming to IS:4985 including cost of necessary jointing materials, wall clips & labour for excavation of trenches, testing, refilling etc., complete all as per specifications.Note: Rate is including removal of old CI/GI pipes which is concealed or surface.					

Sl.No	Description	Quantity	Unit	T 01	Rate (Rs.)	Amount (Rs.)
36.1	6Kg/Sqcm and 75mm OD	100.00	rm	In figures	In words	
36.2	6Kg/Sqcm and 110mm OD	185.00	rm			
36.3	6Kg/Sqcm and 140mm OD	5.00	rm			
37	Providing and fixing white vitreous china pedestal type water closet ( <b>European type W.C.</b> pan) with seat and lid, 10 litre low level white P.V.C. flushing cistern, including flush pipe, with manually controlled device (handle lever), conforming to IS: 7231, with all fittings and fixtures complete, including cutting and making good the walls and floors wherever required: Basic rate: 6,500/-(wall/floor mounted) Make: Hindware/Jaquar.					
37.1	W.C. pan with ISI marked white solid plastic seat and lid each	13.00	each			

Sl.No	Description	Quantity	Unit		Rate (Rs.)	Amount (Rs.)
38	<b>Divyangjan toilet:</b> Providing and fixing white vitreous china extended wall/floor mounting European water closet of size 780x370x690 mm of approved shape including providing & fixing white vitreous china cistern with dual flush fitting, of flushing capacity 3 litre/ 6 litre (adjustable to 4 litre/ 8 litres), including seat cover, and cistern fittings, nuts, bolts and gasket etc complete. Make: Jaquar/Hindware, Basic rate: 9,000/-	1.00	each	In figures	In words	
39	Providing and fixing white vitreous china wash basin including making all connections and including the cost of all fittings such as anchor bolt, waste coupling, waste pipe, bottle trap, etc Basic rate: 3,500/-					
39.1	Flat back wall mount wash basin of size 630x450 mm each. Make: hindware / CERA / RAK	14.00	each			
40	Supplying and fixing in CP <b>Pillar cock</b> with wall flange including testing of joints complete as per direction of Engineer in Charge. Concealed work, including cutting chases and making good the walls etc. Make:- Jaquar & Model No. FLR-CHR-5011N	14.00	each			

Sl.No	Description	Quantity Un		Quantity	Unit		Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words			
41	Providing and fixing white vitreous china flat back half stall <b>urinal</b> of size 580x380x350 mm with white PVC automatic flushing cistern, with fittings, standard size C.P. brass flush pipe, spreaders with unions and clamps (all in C.P. brass) with waste fitting (waste coupling & flexible hose/pipe) as per IS: 2556, C.I. trap with outlet grating and other couplings in C.P. brass, including painting of fittings and cutting and making good the walls and floors wherever required: Make: Hindware/Jaquar, Base Rate: 6,500/-							
41.1	Single half stall urinal with 5 litre P.V.C. automatic flushing cistern	1.00	each					
42	Providing and fixing 600x450 mm beveled edge <b>mirror</b> of superior glass (of approved quality) complete with 6 mm thick hard board ground fixed to wooden cleats with C.P. brass screws and washers complete. Note: mirror size may vary as decided by competent authority. Base Rate: 2,500/-	14.00	each					
43	Supplying and fixing in CP 2 in 1 bib cock with wall flange including testing of joints complete as per direction of Engineer in Charge. Concealed work, including cutting chases and making good the walls etc. Make: Jaquar & Model: FLRCHR-5041N	14.00	each					

Sl.No	Description	Quantity Unit	Rate (Rs.)		Amount (Rs.)	
	_		-	In figures	In words	
44	Supplying and fixing in CP <b>Health Faucet</b> with 1 m connection pipe & wall hanger, including testing of joints complete as per direction of Engineer in Charge. Concealed work, including cutting chases and making good the walls etc. Make: Jaquar & Model No. ALD-573	14.00	each			
45	Providing and fixing of PVC Nahani trap (4") with single or multiple outlet including testing of joints complete as per direction of Engineer in Charge. Concealed work, including cutting chases and making good the walls etc.	28.00	each			
46	Providing and fixing of CP <b>shower rose</b> of 100mm dia with arm of 250 mm & wall flange as per IS standard of approved brand and design as approved by Engineer-Inchage. Basic price: 2,000/- Make: Jaquar	14.00	each			
47	Providing and fixing of <b>3 in 1 wall mixer</b> with wall flange as per IS standard of approved brand and design as approved by Engineer-In-chage. Make: Jaquar & Model No. CON-CHR273KNUPR	14.00	each			
48	Providing and fixing C.P. brass <b>angle valve</b> with wall flange for basin mixer, geyser points, etc of approved quality conforming to IS:8931 Make: Jaquar					

Sl.No	Description	Quantity Unit			Rate (Rs.)	Amount (Rs.)
		Quantity		In figures	In words	
48.1	15mm nominal bore	57.00	each			
49	Providing and fixing of <b>CP collection hose</b> to flush tank, wash basin, geyser & sink cock as per IS standard of approved brand and design as approved by Engineer-In-chage. Make: Jaquar	57.00	each			
50	Providing and fixing <b>ball valve</b> (brass) of approved quality, High or low pressure, with plastic floats complete:					
50.1	25 mm nominal bore	14.00	each			
51	Providing and fixing <b>CP towel rail</b> complete with brackets fixed to wooden cleats with CP brass screws with concealed fittings arrangement of approved quality and colour.					
51.1	600 mm long towel rail with total length of 645 mm, width 78 mm and effective height of 88 mm, weighing not less than 190 gms.	14.00	each			
52	Providing and fixing <b>CP double hanger</b> with CP brass screws with concealed fittings arrangement of approved quality and colour.	14.00	each			

Sl.No	Description	Onantita Unit		Rate (Rs.)	Amount (Rs.)	
	-	Quantity		In figures	In words	
53	Supplying and fixing in 100 mm dia. SS grating with or without hole as per direction of Engineer in Charge. Including making the surface good etc.	28.00	each			
54	Providing and fixing S S soap tray / holders with screws (two of soap holders), etc of approved quality and colour. Make: Jaquar	14.00	each			
55	Providing and fixing S S soap dispensor with screws, etc of approved quality and colour. Make: Jaquar	14.00	each			
56	Providing and fixing toilet <b>paper holder</b> with screws, etc of approved quality. Make: Jaquar					
56.1	C.P. brass	14.00	each			
57	Providing and fixing of <b>SS/CP grab bar</b> as per design & IS standard with screws, etc for fixing the fixture and finishing the surface good Make: Jaquar/CERA /Equivalent					
57.1	Wall mounted rail (with hinge) 600 x 100 mm (flip/foldable type) Brand: CERA, New cat no: B2210107	2.00	each			
57.2	Wall mounted inverted 'L' shaped grab bar with 500 and 700 mm long bars Brand: CERA, New cat no: B2210103	1.00	each			

Sl.No	Description	Quantity	Unit	Unit Rate (Rs.)		Amount (Rs.)
		Qualitity		In figures	In words	
58	Constructing brick masonry chamber for underground inspection chamber and bends with bricks in cement mortar 1:4 (1 cement: 4 coarse sand) FRP cover with frame (Medium duty) 610x610 mm internal dimensions, R.C.C. top slab with 1:1.5:3 mix (1 cement: 1.5 fine sand: 3 graded stone aggregate 20 mm nominal size), foundation concrete 1:5:10 (1 cement: 5 fine sand: 10 graded stone aggregate 40 mm nominal size), inside plastering 12 mm thick with cement mortar 1:3 (1 cement: 3 coarse sand), finished smooth with a floating coat of neat cement on walls and bed concrete etc. complete as per standard design:					
58.1	Inside dimensions 610x610 mm and 60 cm deep for single /multiple pipe line: Note: Rate shall be inclusive of demolition of existing chamber, excavation, refilling, foot rests (if required) and 12mm thick cement plaster at the external surface.	10.00	each			
	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5					

Sl.No	Description	Overtity Un		O	04:4	0	Unit		Rate (Rs.)	Amount (Rs.)
	•	Quantity	-	In figures	In words	,				
59	Providing and fixing square-mouth PVC <b>S.W. gully trap</b> complete with grating brick masonry chamber with water tight FRP cover with frame (Medium duty) of 300 x300 mm size (inside) as per standard design: Note: Rate shall be inclusive of demolition of existing chamber, excavation, refilling, foot rests (if required) and 12mm thick cement plaster at the external surface.									
	100x100 mm size P type									
59.1	With common burnt clay F.P.S. (non modular) bricks of class designation 7.5	10.00	each							
60	Making <b>plinth protection</b> 50mm thick of cement concrete 1:3:6 (1 cement : 3 coarse sand (zone - III) : 6 graded stone aggregate 20 mm nominal size) over 75mm thick bed of dry brick ballast 40 mm nominal size, well rammed and consolidated and grouted with fine sand, including necessary excavation, levelling & dressing & finishing the top smooth.	45.00	sqm							
Sub Total (A)										
GST on (A) @ 18% = (B)										
Grand total $(A) + (B) = (C)$										

Grand Total amount in words	
Date:	
Place:	Signature of the contractor with seal

## **CHECK LIST**

## ALL THE BIDDERS ARE REQUESTED TO COMPLETE THE CHECK LIST WITH NECESSARY DOCUMENTS AND COMPLY ACCORDINGLY

Sl. No.	Document to be furnished	YES/NO	REMARKS
1	COVER 1 (TECHNICAL BID)		
a	Complete tender document duly signed by contractor / authorized representative. Power of Attorney to be attached in case of partnership firm) (Published in IIA website)		
b	Tender document fee (Non Refundable)		
С	Earnest Money Deposit (EMD)		
d	Valid class I Contractor License issued by PWD / CPWD, etc.		
e	PAN Details		
f	GST Details with latest 3 GST paid receipts		
g	Work completion certificates indicating name of the work, work order details, executed amount, date of completion, etc for each work issued by competent authority as per tender eligibility criteria		
h	Financial Documents like turnover certificate, IT returns for last 3 Financial Years, assessment order issued by Income Tax dept.		
2	COVER 2 (FINANCIAL BID)		
a	Bill of quantities (signed by contractor / authorized)		
3	COVER 3 (BOTH COVER 1 & 2)		
a	Note: Please mention the name of the work, tender number, contractor address etc. on cover 3 / envelop		

Signature of the Contractor with Stamp