

**Government Of India**

Ministry Of Housing &amp; Urban Affairs

**Central Public Works Department**

Excellence in Public Works

**Tender Published****Current Tender Details**

<b>Tender ID</b>	126649	<b>NIT/RFP NO</b>	01/e-NIT/EE/CED-IV/CCU/2025-26
<b>Name of Work</b>	(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh (SH: - Civil & Electrical Works)		
<b>Procurement Type</b>	Works	<b>Bid Type</b>	Percentage
<b>Tender Type</b>	OPEN	<b>Estimated Cost</b>	₹ 22,99,272 ( Twenty Two Lakh Ninety Nine Thousand Two Hundred and Seventy Two Rupees )
<b>Bid Submission Closing Date</b>	22/09/2025 15:00	<b>Competitive Bidding Type</b>	NCB

**Tender Published Successfully.**

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**Government Of India**

Ministry Of Housing &amp; Urban Affairs

**Central Public Works Department**

Excellence in Public Works

**Tender Consolidation View**[Print](#)[Download As Pdf](#)**Enquiry Particulars**

Regional Office	<b>EE - CED - IV</b>	Office Inviting Bids	<b>N/A</b>
Tender ID	<b>126649</b>	NIT/RFP NO	01/e-NIT/EE/CED-IV/CCU/2025-26
Name of Work	(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh (SH: - Civil & Electrical Works)	Subwork/Packages	
Time Allowed	3 months	Tender Type	OPEN
Procurement Type	WORKS	Bid Type	Percentage
Type of Work	Civil Works - Others	Category of Tender	COMPOSITE
Estimated Cost(INR)	₹ 22,99,272	Competitive Bidding Type	NCB

**Bid Submission Dates**

Last Date & Time of receipt of Pre-Bid Queries	22/09/2025 14:50	Receipt of Queries through	Email
Email	eeced4ccu-mef@gov.in		
Bid Submission Closing Date & Time	22/09/2025 15:00	Bid Validity Period (In Days)	30
Bid Validity Expiry Date	22/10/2025 15:30	Tender Notice Type	Standard Notice Tender

**Tender Inviting Authority Particulars**

Office Inviting Bids	EE - CED - IV	Designation	Executive Engineer
Address	EE BRPD-1 CHUNGTHANG SIKKIM	Contact Details	9971999755
Email	chueeccd1.cpwd@nic.in		

**EMD Details**

EMD (INR)	EMD in favour of	Mode of Payment
₹ 51,985	Executive Engineer, CED-I, CCU, MoEF&CC, New Delhi-110003	DD,FDR

## Bid Openers

Department User Name	Region	Mobile Number	Email	Designation	Certificate serial No	Certificate Expiry
Ranjan Kumar Swain	EE - CED - IV	7838353293	ranjak.swain@gmail.com	Assistant Engineer	4b42cfb27684ef95	19/06/2027 15:54
Rakesh Kumar Jain	EE - CED - IV	9971999755	eebrpd1@gmail.com	Executive Engineer	18f0167	01/08/2027 02:03

## Tender Documents

S.No	File Name	File Description	File Size (in Bytes)	Uploaded Date
1	NIT0101.pdf	NIT0101	257276	12/09/2025 16:30
2	NIT0102.pdf	NIT0102	1683782	12/09/2025 16:31
3	Eligibility.pdf	Eligibility	552077	12/09/2025 16:31

## Mandatory Documents Details

S.No	Documents Required from Vendor	Document Type
1	Insurance Surety Bond, Demand Draft/ Account Payee Bankers Cheque / FDR/ Bank Guarantee of any commercial Bank against EMD.	Mandatory
2	Receipt of deposit of EMD in any divisions of CPWD/CCU, MoEF and CC	Mandatory
3	Enlistment Order of the Contractor in appropriate class and category in CPWD.	Mandatory
4	ESI and EPF certificate of the contractor.	Mandatory
5	PAN Card issued by Income Tax Department.	Mandatory
6	GST Registration Certificate, if already obtained by the bidder	Mandatory
7	Any other Document as specified in the NIT.	Mandatory

## Eligibility Documents Details

S.No	Documents Required from Vendor	Document Type
1	Eligibility	Mandatory

## Tender Covers

S.No	Cover Name	Bid Opening date	View Details
1	Single Bid	22/09/2025 15:30	View Action

## Single Bid

S.No	File Name	File Size(in Bytes)
1	126649-PercentageComposite1.xls	60928

Done

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GOVERNMENT OF INDIA  
MINISTRY OF ENVIRONMENT, FOREST & CLIMATE CHANGE  
CIVIL CONSTRUCTION UNIT

**NIT No.: 01/e-NIT/EE/CED-IV/CCU/2025-26**

## **Notice Inviting e-Tender**

**Name of Work: (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)**

**Estimated Cost: - Rs. 25,99,272/-**

**EMD: - Rs. 51,985/-**

**(September, 2025-26)**

**ISSUED BY  
EXECUTIVE ENGINEER,  
CED-I, CCU, MoEF & CC**

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**Name of work:** (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)

**NIT No.:** 01/e-NIT/EE/CED-IV/CCU/2025-26

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This NIT contains 1 to 89 pages including this page.

Assistant Engineer (P)  
CED-IV, CCU, New Delhi

NIT No. 01/e-NIT/EE/CED-IV/CCU/2025-26 approved for Rs. 25,99,272/- (Rupees Twenty Five Lakh Ninety Nine Thousand Two Hundred Seventy Two Only) and containing pages 1 to 89.

Executive Engineer (C)  
CED-IV, CCU, MoEF&CC  
New Delhi

# **PART-A**

## **GENERAL INFORMATION**

**INFORMATION AND INSTRUCTIONS FOR BIDDERS FOR E-TENDERING  
FORMING PART OF BID DOCUMENT**

The Executive Engineer, CED-IV, Civil Construction Unit (CCU), Ministry of Environment, Forest & Climate Change (MoEF&CC), 7th Floor, Pt. Deen Dayal Antyodaya Bhawan, CGO Complex, Lodhi Road, New Delhi-110003 on behalf of President of India invites online Percentage rate bids from approved and eligible CPWD registered contractors in composite category for the following work:-

S. No.	NIT No.	Name of work and location	Estimated cost put to tender	Earnest Money	Period of Completion	Last date & time of submission of bid, copy of receipt of deposition of original EMD, and other Documents as specified in NIT	Time & date of opening of bid
1	2	3	4	5	6	8	9
1	01/e-NIT/EE/CED-IV/CCU/2025-26	(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)	<b>Rs. 25,99,272/-</b>	<b>Rs. 51,985/-</b>	<b>03 Months</b>	<b>22.09.2025 upto 3.00 PM</b>	<b>22.09.2025 at 3.30 PM</b>

\* \*To be filled by Executive Engineer, CED-IV, CCU

- The contractor submitting the tender should read the schedule of quantities, additional conditions, additional specifications, particular specifications, CPWD-6 and other terms and conditions given in the NIT and drawings. The bidder should also read the General Condition of Contract for CPWD works 2023 for Maintenance works with upto date correction slips. The Tender is available as Government of India Publications and on CPWD website at <https://etender.cpwd.gov.in> however, provisions included in the tender document shall prevail over the provisions contained in the standard form. The sets of drawings and NIT shall be available in the office of **Executive Engineer, CED-IV, CCU, MoEF&CC, New Delhi**. The contractor should also visit the site of work and acquaint himself with the site conditions before tendering. He should only submit his tender if he considers himself eligible and he is in possession of all the required documents. The following conditions, which already form part of the tender conditions, are specially brought to his notice for compliance while submitting the tender online. They are requested to comply following instructions.

- a) Tenders with any condition including that of conditional rebates shall be rejected forth with.
  - b) The successful bidder shall be required to submit a Performance Guarantee of 5% (Five Percent) of the tendered amount **within 5 days** of issue of letter of intent. This period can be further extended by Engineer-in-Charge up to a maximum period of **02 days** on the written request of the contractor and with late fee as defined in Schedule F.
  - c) GST and Labour-Cess etc. as applicable shall be borne by the contractor himself. The contractor shall quote his rates considering all such taxes and hence their quoted rates should be inclusive of all the tax components.
  - d) It will be obligatory on part of the Contractor/ Bidder to tender for and sign the tender documents for all the component parts. The department reserves right to accept tender in full or in part without assigning any reasons.
- 2) The intending bidder must read the terms and conditions of CPWD-6 carefully. He should only submit his bid if he considers himself eligible and he is in possession of all the documents required.
  - 3) Information and Instructions for bidders posted on websites all form part of bid document.
  - 4) The enlistment of the contractors should be valid on the last date of submission of bids. In case the last date of opening of bid is extended, the enlistment of contractor should be valid on the original date of opening of tender.
  - 5) The bid document consisting of plans, specifications, the schedule of quantities of various types of items to be executed and the set of terms and conditions of the contract to be complied with and other necessary documents can be seen in the office of **Executive Engineer, CED-IV, CCU, MoEF&CC, New Delhi** on all working days between 11.00 AM to 4.00 PM except Sunday and public holidays and downloaded from website <https://etender.cpwd.gov.in> free of cost.
  - 6) The bid can only be submitted **after deposition of original EMD either in the office of Executive Engineer inviting bids or division office of any Executive Engineer, CPWD/CCU, MoEF&CC within the period of bid submission** and uploading the mandatory scanned documents as mentioned in the NIT such as Insurance Surety Bond or Demand Draft or Pay order or Banker's Cheque or Deposit at call Receipt or Fixed Deposit Receipts and Bank Guarantee of any Scheduled Bank towards EMD in favour of **"Executive Engineer, CED-I, CCU, MoEF&CC, New Delhi"** receipt of deposition of original EMD to any division office of CCU, MoEF&CC/ CPWD or office of Executive Engineer, CED-I, CCU, New Delhi and all other documents as mentioned in NIT.
  - 7) The online bids will be submitted upto **3.00 PM on 01.08.2025**. The online bid shall be opened at **3:30 PM on 01.08.2025**.
  - 8) Those contractors not registered on the website mentioned above, are required to get registered beforehand. If needed they can be imparted training on online bidding process as per details available on the website.
  - 9) The intending bidder must have valid class-III digital signature to submit the bid.
  - 10) The Executive Engineer of any division of CCU, MoEF&CC/CPWD shall receive the original EMD for tender of other division/ Divisions.
  - 11) Copy of Enlistment Order and certificate of work experience and other documents as specified in the bid document shall be scanned and uploaded to the e-tendering website within the period of bid submission. However certified copy of all the scanned and uploaded documents as specified in the bid document shall have to be submitted by the lowest bidder only physically in the office



of tender opening authority as and when directed by Engineer-in-charge. **Online bid documents submitted by intending bidders shall be opened only of those bidders, whose all documents scanned and uploaded are found in order including scanned copy of EMD & receipt of Deposition of EMD.**

- 12) On opening date, the contractor can login and see the bid opening process. After opening of bids he will receive the competitor bid sheets.
- 13) Contractor can upload documents in the form of JPG format and PDF format.
- 14) In addition to this, while selecting any of the cells a warning appears that if any cell is left blank, the same shall be treated as “0”.
- 15) Therefore, if any cell is left blank and no rate is quoted by the bidder, rate of such item shall be treated as “0” (ZERO).
- 16) The required documents meeting the criteria to qualify as “approved and eligible contractors of CPWD” along with other documents as mentioned under para “List of Documents to be scanned and uploaded within the period of bid submission” below, as uploaded by the agency and hard copies received subsequently shall be checked. The financial bid of only those agencies shall be opened who are found to be eligible agencies, as per this NIT.
- 17) The department reserves the right to reject any prospective bid without assigning any reason.
- 18) After submission of the bid, the contractor can re-submit revised bid any number of times but before last time and date of submission of bid as notified.
- 19) While submitting the revised bid, contractor can revise the rate any number of times but before last time and date of submission of bid as notified.
- 20) In case of composite tenders, the contractor submitting the tender should read all the three Parts of the tender viz. Part-A, B & C, which are containing schedule of quantities, additional & special conditions, additional specifications, particular specification and other terms and conditions given in the NIT and drawings for Major as well as Minor component of work. Details of these parts are summarized as under:
  - **Part A :- CPWD-6, CPWD-7 including schedule A to F for major and minor component of the work, Standard General Conditions of Contract for CPWD 2023 (Maintenance work) as amended/ modified upto last date of submission of bid.**
  - **Part B :-** Conditions & specifications and schedule of quantities applicable to major component of the work.
  - **Part C :-** Conditions and specifications and schedule of quantities applicable to minor component of the work.The **Major** Component of work is **Civil** Work and **Minor** Component of work is **Electrical** Work.
- 21) The bidders should also read the General Conditions of Contract for CPWD 2023 (Maintenance work) amended up to last date of submission of bid of this work, which is available as Govt. of India Publications; however, provisions included in the tender document shall prevail over the provisions contained in this standard form. The set of drawings and NIT shall be available with the Executive Engineer.
- 22) The main contractor shall execute the minor component(s) also. He should be either an eligible contractor himself for associate with himself an eligible agency(s) for execution of electrical work as per CPWD-6 for e-tendering. The contractor shall indicate the names of upto three such agencies within prescribed time as “**Minor component agencies**”. In case the details of electrical agency are not submitted by the bidder or are not proper then these shall be submitted before acceptance of the bid.

- 23) After acceptance of the tender by competent authority, the EE-in-charge of major component of the work shall issue letter of award on behalf of the President of India. After the work is awarded, the main contractor will have to enter into one agreement with EE-in-charge of major component and has also to sign two/ or more copies of agreement depending upon number of EE's in-charge of minor components. One such signed set of agreement shall be handed over to EE in charge of minor component.
- 24) The main contractor has to enter into agreement with the contractor(s) associated by him for execution of minor component(s). Copy of such agreement shall be submitted to EE in charge of minor component as well as to EE in charge of major component. In case of change of associate contractor, the main contractor has to enter into agreement with the new contractor associated by him.
- 25) Tenders with any condition including that of conditional rebates in the tender document shall be rejected forthwith.
- 26) The **online percentage rate(s)** must be quoted in decimal coinage. Amount shall be calculated and rounded in full rupees by ignoring fifty paisa and considering more than fifty paisa as rupee one.
- 27) The successful bidder shall be required to submit a Performance Guarantee of **5% (Five percent)** of the composite contract amount within a period of issue of letter of acceptance as specified in schedule 'F'.
- 28) The contractor shall have to execute guarantee bonds in respect of Stone work, water supply, sanitary installation & drainage works, water proofing works, CPVC door / windows, Aluminium Works & Road works as per Performa at Annexures.
- 29) GST on materials as applicable shall be paid by the contractor himself. The contractor shall quote his rates considering all such taxes.
- 30) Attention is also drawn to Clauses 6 and 7 of **General Condition of Contract for CPWD works 2023 for Maintenance works**, which prescribes the procedure for computerized recording of measurement and preparation of bill by contractor.
- 31) Intending bidder may submit physical mile stone on the basis of their resources and methodology at the time of tendering as indicated in the "Schedule F", otherwise it will be assumed that agency is agreeable to physical milestones mentioned in the table.
- 32) Intending bidder may give detailed activities/ programme for each milestone fixed in the tender document within 15 days after award of work.
- 33) Payment for the items with less use of materials beyond permissible limits as mentioned in Schedule 'F' of Part-A & C shall not be made to contractor.

**List of Documents to be scanned and uploaded within the period of tender submission**

- 1) Insurance Surety Bond, Demand Draft/ Account Payee Banker's Cheque / FDR/ Bank Guarantee of any commercial Bank against EMD.
- 2) Receipt of deposit of EMD in any divisions of CPWD/CCU, MoEF&CC
- 3) Enlistment Order of the Contractor in appropriate class and category in CPWD.
- 4) ESI & EPF certificate of the contractor.
- 5) PAN Card issued by Income Tax Department.
- 6) GST Registration Certificate, if already obtained by the bidder.

If the bidder has not obtained GST registration as applicable, then he shall scan and upload following under taking along with bid documents.

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

- 7) Any other Document as specified in the NIT.

Executive Engineer, CED-IV, CCU  
(For and on behalf of the President of India)

**CPWD-6 FOR E-TENDERING**

1. Item rate/percentage rate bids are invited on behalf of President of India from approved and eligible contractors of CPWD for the Work of “(A) **Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)**”

The enlistment of the contractors should be valid on the last date of submission of bids.

In case the last date of submission of bid is extended, the enlistment of contractor should be valid on the original date of submission of bids.

- 1.1 The work is estimated to cost for **Rs. 25,99,272/-**. This estimate, however, is given merely as a rough guide.
2. Agreement shall be drawn with the successful bidders on prescribed Form No. CPWD 7/8 (or other Standard Form as mentioned) which is available as a Govt. of India Publication and also available on website [www.cpwd.gov.in](http://www.cpwd.gov.in). Bidders shall quote his rates as per various terms and conditions of the said form which will form part of the agreement.
3. The time allowed for carrying out the work will be **03 (Three) Months** from the date of start as defined in schedule 'F' or from the first date of handing over of the site, whichever is later, in accordance with the phasing, if any, indicated in the bid documents.
4. (i) The site for the work is available.  
or  
The site for the work shall be made available in parts as specified below: -  
.....
- (ii) The architectural and structural drawing for the work is available  
or  
The architectural and structural drawings shall be made available in phased manner, as per requirement of the same as per approved programme of completion submitted by the contractor after award of work.
5. The bid document consisting of plans, specifications, the schedule of quantities of various types of items to be executed and the set of terms and conditions of the contract to be complied with and other necessary documents except Standard General Conditions of Contract Form can be seen on website <https://etender.cpwd.gov.in> or [www.cpwd.gov.in](http://www.cpwd.gov.in) free of cost.

6. After submission of the bid the contractor can re-submit revised bid any number of times or withdraw it before last date and time of submission of bid as notified. No post-tender modification is allowed by the tenderers except through negotiations, if required. In case, any tenderer does so, the tender will be rejected and the tenderer will be debarred for future tendering in CPWD for two years by the concerned enlisting authority (in case of CPWD enlisted contractor) and by the concerned CE/SE (in case of non-enlisted contractor).
7. While submitting the revised bid, contractor can revise the rate of one or more item(s) any number of times (he need not re-enter rate of all the items) but before last time and date of submission of bid as notified.
8. When bids are invited in three stage system and if it is desired to submit revised financial bid then it shall be mandatory to submit revised financial bid. If not submitted then the bid submitted earlier shall become invalid.
9. Earnest Money in the form of Insurance Surety Bonds, Account Payee Demand Draft, Fixed Deposit Receipt, Banker's Cheque or Bank Guarantee including e- Bank Guarantee (for balance amount as prescribed) from any of the Commercial Banks (**drawn in favour of Executive Engineer, CED-I, CCU, MoEF&CC, New Delhi**) shall be scanned and uploaded on the e-Tendering website within the period of bid submission. The original EMD should be deposited either in the office of Executive Engineer inviting bids or division office of any Executive Engineer, CPWD within the period of bid submission. The EMD receiving Executive Engineer (including NIT issuing EE/AE) shall issue a receipt of deposition of earnest money deposit to the bidder in a prescribed format (enclosed) uploaded by tender inviting EE in the NIT.

A part of earnest money is acceptable in the form of bank guarantee also. In such case, minimum 50% of earnest money or Rs. 20 lac, whichever is less, shall have to be deposited in shape prescribed above, and balance may be deposited in shape of Bank Guarantee including e- Bank Guarantee of any Commercial bank having validity for a period of **90 days** for single bid works and **180 days** for two bid system or more from the last date of receipt of bids which is to be scanned and uploaded by the intending bidders.

The earnest money given by all the tenderers except the lowest tenderer shall be refunded immediately after the expiry of stipulated bid validity period or immediately after acceptance of the successful bidder, whichever is earlier. However, in case of two/ three bid system, earnest money deposit of bidders unsuccessful during technical bid evaluation etc. should be returned within 30 days of declaration of result of technical bid evaluation.

Copy of Enlistment Order and certificate of work experience and other documents as specified in the notice inviting e- tender shall be scanned and uploaded on the e-Tendering website within the period of bid submission. However, certified copy of all the scanned and uploaded documents as specified in e- tender notice shall have to be submitted by the lowest bidder within a week physically in the office of tender opening authority. Online bid documents submitted by intending bidders shall be opened only of those bidders, who's original EMD deposited with any division of CPWD and other documents scanned and uploaded are found in order.

The bid submitted shall be opened at **03:30 PM** on **22.09.2025**.

10. The bid submitted shall become invalid and e-Tender processing fee (if applicable) shall not be refunded if:

(i) The bidder is found ineligible.

(ii) The bidder does not upload scanned copies of all the documents stipulated in the bid document.

(iii) If any discrepancy is noticed between the documents as uploaded at the time of submission of bid and hard copies as submitted physically by the lowest bidder in the office of bid opening authority.

(iv) If a tenderer quotes nil rates against each item in item rate tender or does not quote any percentage above/below on the total amount of the tender or any section / sub head in percentage rate tender, the tender shall be treated as invalid and will not be considered as lowest tenderer.

11. The contractor whose bid is accepted will be required to furnish performance guarantee **5% (Five Percent)** of the tendered amount as mentioned in schedule E and within the period specified in Schedule F. This guarantee shall be in the form of Insurance Surety Bonds, Account Payee Demand Draft, Fixed Deposit Receipt or Bank Guarantee from any of the Commercial Banks in accordance with the prescribed form. In case the contractor fails to deposit the said performance guarantee within the period as indicated in Schedule 'F', including the extended period if any, the Earnest Money deposited by the contractor shall be forfeited automatically without any notice to the contractor. The earnest money deposited along with bid shall be returned after receiving the aforesaid performance guarantee. The contractor whose bid is accepted will also be required to furnish either copy of applicable licenses/ registrations or proof of applying for obtaining labour licenses, registration with EPFO, ESIC and BOCW Welfare Board including Provident Fund Code No. If applicable and also ensure the compliance of aforesaid provisions by the subcontractors, if any engaged by the contractor for the said work within the period specified in Schedule F.

**12. The description of the work is as follows:**

**13. (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works).**

Intending Bidders are advised to inspect and examine the site and its surroundings and satisfy themselves before submitting their bids as to the nature of the ground and sub-soil (so far as is practicable), the form and nature of the site, the means of access to the site, the accommodation they may require and in general shall themselves obtain all necessary information as to risks, contingencies and other circumstances which may influence or affect their bid. A bidder shall be deemed to have full knowledge of the site whether he inspects it or not and no extra charge consequent on any misunderstanding or otherwise shall be allowed. The bidder shall be responsible for arranging and maintaining at his own cost all materials, tools & plants, water, electricity access, facilities for workers and all other services required for executing the work unless otherwise specifically provided for in the contract documents. Submission of a bid by a bidder implies that he has read this notice and all other contract documents and has made himself aware of the scope and specifications of the work to be done and of conditions and rates at which stores, tools and plant, etc. will be issued to him by the Government and local conditions and other factors having a bearing on the execution of the work.

14. The competent authority on behalf of the President of India does not bind itself to accept the lowest or any other bid and reserves to itself the authority to reject any or all the bids received without the assignment of any reason. All bids in which any of the prescribed condition is not fulfilled or any condition including that of conditional rebate is put forth by the bidder shall be summarily rejected.
15. Canvassing whether directly or indirectly, in connection with bidders is strictly prohibited and the bids submitted by the contractors who resort to canvassing will be liable for rejection.
16. The competent authority on behalf of President of India reserves to himself the right of accepting the whole or any part of the bid and the bidder shall be bound to perform the same at the rate quoted.
17. The contractor shall not be permitted to bid for works in the **CCU, MoEF&CC/ CPWD Circle** (Division in case of contractors of Horticulture/Nursery category) responsible for award and execution of contracts, in which his near relative is posted a Divisional Accountant or as an officer in any capacity between the grades of Superintending Engineer and Junior Engineer (both inclusive). He shall also intimate the names of persons who are working with him in any capacity or are subsequently employed by him and who are near relatives to any gazetted officer in the Central Public Works Department or in the Ministry of Housing and Urban Affairs. Any breach of this condition by the contractor would render him liable to be removed from the approved list of contractors of this Department.
18. No Engineer of Gazetted Rank or other Gazetted Officer employed in Engineering or Administrative duties in an Engineering Department of the Government of India is allowed to work as a contractor for a period of one year after his retirement from Government service, without the prior permission of the Government of India in writing. This contract is liable to be cancelled if either the contractor or any of his employees is found any time to be such a person who had not obtained the permission of the Government of India as aforesaid before submission of the bid or engagement in the contractor's service.

19. The bids for the work shall remain open for acceptance for a period of **30 (thirty) days** from the date of opening of bids. Further

- (i) If any tenderer withdraws his tender within 7 days after last date and time (24 hours basis) of submission of bids, then the Government shall without prejudice to any other right or remedy, be at liberty to forfeit 50% of the earnest money absolutely irrespective of letter of acceptance for the work is issued or not.
- (ii) If any tenderer withdraws his tender after expiry of 7 days after last date and time (24 hours basis) of submission of bids, then the Government shall without prejudice to any other right or remedy, be at liberty to forfeit 100% of the earnest money absolutely irrespective of letter of acceptance for the work is issued or not.
- (iii) Withdrawal of the tender, by the tenderer, shall only be made through e-tender portal. Any other method i.e. through letter / e-mail etc. shall not be considered.
- (iv) In case of forfeiture of earnest money as prescribed in para (i) and (ii) above, the bidders shall not be allowed to participate in the rebidding process of the same work.
- (v) **Withdrawal of the tender, by the tenderer, shall only be made through e-tender portal. Any other method i.e. through letter/ e-mail etc. shall not be considered.**

20. This notice inviting Bid shall form a part of the contract document. The successful bidder/ contractor, on acceptance of his bid by the Accepting Authority shall within 15 days from the stipulated date of start of the work, sign the contract consisting of: -

- a. The Notice Inviting Bid, all the documents including additional conditions, specifications and drawings, if any, forming part of the bid as uploaded at the time of invitation of bid and the rates quoted online at the time of submission of bid and acceptance thereof together with any correspondence leading thereto.
- b. Standard C.P.W.D. Form 7/8 or other Standard C.P.W.D. Form as applicable.

21. Integrity Pact: The contractor shall download the Integrity Pact, which is a part of tender documents, affix his signature in the presence of a witness, and upload the same while submitting online bids for all works of estimated cost put to tender equal or more than the threshold value given in Schedule-F. In the event of his failure to sign and upload the Integrity Pact along with other bid documents, his bid shall be rejected.

22. The intending bidders are required to update their profile in CPWD e-tender portal and to upload their bids well in advance of last date of submission of tender. Any issue related to updating profile/uploading tender can be resolved through the concerned Executive Engineer/



Assistant Engineer (Phone no \*....., e- mail Id \*.....) or ERP helpline no. 18001803286 or e-mail Id cpwd.support@techmahindra.com. The e- tendering bidders are also advised not to wait to raise any issues till the last date of submission of bid in their own interest.

\*To be filled in by NIT approving authority

Executive Engineer, CED-IV, CCU  
(For and on behalf of the President of India)

**GOVERNMENT OF INDIA**  
**MINISTRY OF ENVIRONMENT, FORESTS & CLIMATE CHANGE**  
**PERCENTAGE RATE BID AND CONTRACT FOR WORKS**

Tender for the work of “(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)”.

- i) To be uploaded by **3:00 pm on 22.09.2025** to/upload at
- ii) To be opened in presence of tenderers who may be present at **3:30 pm on 22.09.2025** in the office of the Executive Engineer, CED-IV, CCU, New Delhi.

\*\* To be filled by EE

**TENDER**

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

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

We agree to keep the tender open for acceptance for **Thirty (30) days** from the due date of its opening of bid and not to make any modifications in its terms and conditions.

A copy of earnest money deposit receipt of prescribed amount deposited in the form of Insurance Surety Bonds, Account Payee Demand Draft, Fixed Deposit Receipt, Banker's Cheque or Bank Guarantee (as prescribed) issued by a Commercial Bank, is scanned and uploaded. If I/We, fail to furnish the prescribed performance guarantee within prescribed period, I/We agree that the said President of India or his successors, in office shall without prejudice to any other right or remedy, be at liberty to forfeit the said earnest money absolutely. Further, if I/We fail to commence work as specified, I/ We agree that President of India or the successors in office shall without prejudice to any other right or remedy available in law, be at liberty to forfeit the said performance guarantee absolutely. The said Performance Guarantee shall be a guarantee to execute all the works referred to in the tender documents upon the terms and conditions contained or referred to those in excess of that limit at the rates to be determined in accordance with the provision contained in Clause 12.2 and 12.3 of the tender form. I/We hereby declare that I/we shall treat the tender documents drawings and other records connected with the work as secret/confidential documents and shall not communicate information derived there from to any person other than a person to whom I/we

am/are authorized to communicate the same or use the information in any manner prejudicial to the safety and integrity of the State.

Further, I/We agree that in case of forfeiture of Earnest Money or Performance Guarantee as aforesaid, I/We shall be debarred for participation in the re-tendering process of the work.

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

I/We hereby declare that I/We shall treat the tender documents drawings and other records connected with the work as secret/confidential documents and shall not communicate information/derived there from to any person other than a person to whom I/We am/are authorized to communicate the same or use the information in any manner prejudicial to the safety & integrity of the State.

Signature of contractor

Postal Address               -----\*\*

Telephone No.               -----\*\*

Fax                               -----\*\*

E-MAIL                       -----\*\*

Witness:

Address:

Occupation:

\*\* To be filled by Bidder

## ACCEPTANCE

The above tender (as modified by you as provided in the letters mentioned hereunder) is accepted  
by me for and on behalf of the President of India for a sum of Rs.....  
(Rupees.....  
.....)

The letters referred to below shall form part of this contract agreement: -

(a) -----\*

(b) -----\*

(c) -----\*

For & on behalf of President of India

Signature.....\*

Dated: -----\*

Designation

.....\*

\* To be filled by Executive Engineer

**SCHEDULES (A to F)**  
(For Civil, Electrical & Mechanical Component)

**SCHEDULE 'A'**

Schedule of Quantities -

As per separate sheets attached

**SCHEDULE 'B'**

Schedule of materials to be issued to the contractor:

S. No.	Description of item	Quantity	Rates in figures & words at which the material will be charged to the contractor	Place of issue
1	2	3	4	5
-----NIL -----				

**SCHEDULE 'C'**

Schedule of Tools and Plants to be hired to the contractor:

S. No.	Description	Hire charges per day	Place of issue
1	2	3	4
-----NIL -----			

**SCHEDULE 'D'**

Extra schedule for specific requirements/document for the work, if any:	As per tender documents
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**SCHEDULE 'E'**

Reference to General Conditions of contract	General Conditions of Contract 2023 for Maintenance works, Central Public Works Department, as amended up to last date of submission of bids.
Name of Work	<b>(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil &amp; Electrical Works)</b>
Estimated cost of the work	<b>Rs. 25,99,272/-</b>
Earnest money	<b>Rs. 51,985/-</b>
Performance Guarantee	5.00% of tendered amount
Security Deposit	2.50% of tendered amount.

**SCHEDULE 'F'**

Correction – Nil    Insertion – Nil    Deletion – Nil

AE(P)

EE

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## GENERAL RULES AND DIRECTION

Officer inviting tender	Executive Engineer, CED-IV CCU, MoEF&CC, 7 <sup>th</sup> Floor, Pt. Deen Dayal Antyodaya Bhawan, CGO Complex, New Delhi-110003
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### Definitions:

2(v)	Engineer-in-Charge (Major Component)	Executive Engineer, CED-IV, CCU, MoEF&CC or his or his legal successor or Assignee thereof.
	Engineer-in-Charge (Minor Component)	Executive Engineer, CED-IV, CCU, MoEF&CC or his or his legal successor or Assignee thereof.

2(viii)	Accepting Authority	Executive Engineer, CED-IV, CCU, MoEF&CC or his or his legal successor or Assignee thereof.
2(x)	Percentage on cost of materials and labour to cover all overheads and profits	7.5% for items of supply of materials and 15% for execution of items
2(xi)	Standard Schedule of Rates	
	Civil Works	DSR 2023 Corrected up to last date of submission of bid (for civil work volume I & II)  DAR 2023 Corrected up to last date of submission of bid (for civil work volume I & II)
	Electrical & Mechanical Works	DSR-2025 Vol-II with up-to-date correction slips issued upto last date of submission of bids & Market rates
2(xii)	Department:	Civil Construction Unit, MoEF&CC
9(ii)	Standard CPWD Contract Form	CPWD Form 7 of General Conditions of Contract 2023 for Maintenance works, Central Public Works Department, as modified and corrected up to last date of submission of bids.

<b>Clause 1</b>		
i)	Time allowed for submission of Performance Guarantee, Programme Chart (Time and Progress) and applicable labour licenses, registration with EPFO, ESIC and BOCW Welfare Board or proof of applying thereof from the date of issue of letter of acceptance	5 Days
ii)	Maximum allowable extension with late fee @0.1% per day of Performance Guarantee amount beyond the period as provided in i) above	2 Days
<b>Clause 2</b>	Authority for fixing Compensation under Clause 2	Superintending Engineer, CCU, MoEF&CC. or successor thereof.
<b>Clause 5</b>	Number of days from the date of issue of letter of acceptance for reckoning date of start	7 Days

**Mile stones as per table given below**

Sl. No.	Description of mile stone (s)	Time allowed (From date of start)	Amount to be withheld in case of Non-achievement of each Mile stone(s)
1	Work done amounting to 25% of accepted tender amount (Civil + Electrical).	30 Days	1.25% of accepted tendered amount.
2	Work done amounting to 50% of accepted tender amount (Civil + Electrical).	45 Days	1.25 % of accepted tendered amount.
3	Work done amounting to 75% of accepted tender amount (Civil + Electrical).	60 Days	1.25 % of accepted tendered amount.
4	Work done amounting to 100% of accepted tender amount (Civil + Electrical).	90 Days	1.25 % of accepted tendered amount.

**Time allowed for execution of work:** **03 Months**

**Authority to decide:**

i)	Authority to convey the decision of shifting of milestone and extension of time:	Executive Engineer, CED-IV, Civil Construction Unit (CCU), Ministry of Environment, Forest & Climate Change (MoEF&CC), CGO Complex, Lodhi Road, New Delhi -110003 or his legal successor or Assignee thereof
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ii) Authority to decide rescheduling of mile stones and extension of time.	Superintending Engineer, Civil Construction Unit (CCU), MoEF&CC, CGO Complex, Lodhi Road, New Delhi -110003 or his legal successor or Assignee thereof.
iii) Shifting of date of start in case of delay in handing over of site	Superintending Engineer, Civil Construction Unit (CCU), MoEF&CC, CGO Complex, Lodhi Road, New Delhi -110003 or his legal successor or Assignee thereof.

#### **Schedule of handing over of site**

<b>Part</b>	<b>Portion of site</b>	<b>Time period for handing over reckoned from date of issue of letter of intent</b>
Part A	Portion without any hindrance	On date of commencement
Part B	Portions with encumbrances	NA
Part C	Portions dependent on work of other agencies	NA

#### **CLAUSE 5.4:** Schedule of rate of recovery for delay in submission of the modified programme in terms of delay days

<b>S.N.</b>	<b>Contract Value</b>	<b>Recovery Rs / Per day</b>
1.	Less than or equal to Rs. 1 crore	500

#### **Clause 6:** Computerised Measure Book (CMB) / Electronic Measurement Book (EMB)

i) Mode of measurement	CMB
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#### **Clause 7**

Gross work to be done together with net payment/ adjustment of advances for material collected, if any, since the last such payment for being eligible to interim payment	<b>Rs. 8.66 Lakhs</b>
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#### **Clause 7A**

No Running Account Bill shall be paid for the work till the applicable labour licenses, registration with EPFO, ESIC and BOCW Welfare Board, whatever applicable as submitted by the Bidder to the Engineer-in-Charge.	Yes
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**Clause 10 A**

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

As per details attached in the relevant pages of this bid document

**Clause 10 B**

<b>Clause 10B (ii)</b>	
Whether Clause 10 B (ii) shall be applicable	No

**Clause 10 C- Not Applicable****Clause 10CA – Not Applicable****Clause 10CC – Not Applicable****Clause 11 :**

Specifications to be followed for execution of: civil work	CPWD Specifications 2019 Volume-I and II with correction slips issued upto last date of submission of bids
Specifications to be followed for execution of: Electrical & Mechanical Works	CPWD Specifications for Electrical Work. Part-I (internal) 2023, Part-II (external) 2023

**Clause 12:**

Type of Work:	Maintenance Work	
The completion cost of shall, in no case, exceed 1.5 times the contract amount and governed as per DG CPWD Memorandum No. DG/CON/Maintenance 2023/03 dated 18.12.2023.		
Authority to decided deviation upto 1.25 times of tendered amount	Engineer-in-Charge	
Authority to decided deviation beyond 1.25 times & 1.50 times of tendered amount	Chief Engineer, CCU, MoEF&CC, New Delhi	
12.2. &12.3	Deviation limit beyond which clauses 12.2 & 12.3 shall apply for building work.	No Limit (All deviated quantities shall be paid on agreement rates)

**Clause 16:**

Competent authority for deciding reduced rates	:	Superintending Engineer, CCU, MoEF&CC or his legal successor or Assignee thereof
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**Clause 18:**

List of Mandatory Machinery, tools & plants to be deployed by the contractor at site:-

*As per details attached in the relevant pages of this bid document and as directed by Engineer Incharge will be deployed by the contractor.*

**Clause 19**

<b>Clause 19 C</b>	Authority to decide penalty for each default	Executive Engineer, CED-IV, CCU, MoEF&CC or his legal successor or Assignee thereof
<b>Clause 19 D</b>	Authority to decide penalty for each default	Executive Engineer, CED-IV, CCU, MoEF&CC or his legal successor or Assignee thereof
<b>Clause 19 G</b>	Authority to decide penalty for each default	Executive Engineer, CED-IV, CCU, MoEF&CC or his legal successor or Assignee thereof
<b>Clause 19 K</b>	Authority to decide penalty for each default	Executive Engineer, CED-IV, CCU, MoEF&CC or his legal successor or Assignee thereof

**Clause 25:** Settlement of disputes by Conciliation and Arbitration

Conciliator:	:	SE, CCU, MoEF&CC or his legal successor or Assignee thereof
Arbitrator Appointing Authority	:	Chief Engineer, CCU, MoEF&CC or his legal successor or Assignee thereof
Place of Arbitration	:	Delhi

**Clause 32 : Requirement of Technical Representative(s) and Recovery Rate N/A**

Sl. No.	Minimum Qualification of Technical Representative	Discipline	Designation	Minimum experience	Number	Rate at which recovery shall be made from the contractor in the event of not fulfilling provision of Clause 36(i)
1	Graduate Engineer Or Diploma Engineer	Civil	Project Manager cum planning/ quality/site /billing Engineer	2 or 5 years respectively	1	Rs. 15,000/- per month per person

- 1) Assistant Engineers retired from Government services that are holding Diploma will be treated at par with Graduate Engineers.
- 2) Diploma holder with minimum 10-year relevant experience with a reputed construction co. can be treated at par with Graduate Engineers for the purpose of such deployment subject to the condition that such diploma holders should not exceed 50 % of requirement of degree engineers.

#### Clause 38

(i)	(a)	Schedule/statement for determining theoretical quantity of cement & bitumen on the basis of (for civil work)	Delhi Schedule of Rates 2023 printed by C.P.W.D. with upto date correction slip upto last date of bid submission.
		Schedule/statement for determining theoretical quantity of cement & bitumen on the basis of (for Electrical work)	Delhi Schedule of Rates 2025 printed by C.P.W.D. with upto date correction slip upto last date of bid submission.
(ii)		Variations permissible on theoretical quantities:	
	(a)	Cement	
		For works with estimated cost put to tender more than Rs. 25 lakhs.	<b>2% (Two percent) plus/minus.</b>
	(b)	Bitumen for all works	<b>2.5% (Two-point five percent) plus only and nil on minus side.</b>
	(c)	Steel Reinforcement and structural steel sections for each diameter, section and category	<b>2% (Two percent) plus / minus</b>
	(d)	All other materials	<b>Nil</b>

#### RECOVERY RATES FOR QUANTITIES BEYOND PERMISSIBLE VARIATION

S. No.	Description of item	Rates in figures and words at which recovery shall be made from the Contractor	
		Excess beyond permissible variation	Less use beyond permissible variation not permitted
1.	Cement OPC 43 grade	-	-

	/PCC		
2.	Steel reinforcement bars	-	-
3.	Structural steel	-	-

- Nothing extra shall be paid for excess use of materials beyond the theoretical consumption.
- Less use of materials from the theoretical consumption is not permitted.

**PROFORMA FOR THE RECEIPT TO BE ISSUED BY THE EXECUTIVE ENGINEER  
RECEIVING THE EMD**

Receipt of deposition of original EMD (drawn in favour of <b><u>Executive Engineer, CED-I, CCU, MoEF&amp;CC, New Delhi</u></b> ) (Receipt No. .... / Date.....)	
Name of work	: (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)
NIT No	: <b>01/e-NIT/EE/CED-IV/CCU/2025-26</b>
Estimated Cost	: <b>Rs. 25,99,272/-</b>
Amount of Earnest Money Deposit	: <b>Rs. 51,985/-</b>
Last date of submission of bid	: <b>22.09.2025</b>
To be filled by EMD receiving Executive Engineer	
Name of contractor	:
Form of EMD	:
Amount of Earnest Money Deposit	:
Date of Submission of EMD	:
	<div align="right">           (Signature)            Name and Designation of EMD receiving officer            (EE/AE(P)/AO/AAO) along with office stamp         </div>

**(On non-judicial stamp paper of minimum Rs. 100)**

(Guarantee offered by Bank to CCU, MoEF&CC in connection with the execution of contracts)

**Form of Bank Guarantee for Earnest Money/Performance Guarantee/Security Deposit**

Whereas The Executive Engineer, CED-IV, Civil Construction Unit (CCU), Ministry of Environment, Forest & Climate Change (MoEF&CC), 7th Floor, Pt. Deen Dayal Antyodaya Bhawan, CGO Complex, Lodhi Road, New Delhi-110003 on behalf of the President of India (here in after called "The Government") has invited bids under **NIT Number 01/e-NIT/EE/CED-IV/CCU/2025-26** for **“(A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works).”**

The Government has further agreed to accept irrevocable Bank Guarantee for Rs ..... (Rupees ..... only) valid upto..... (date)\*..... as **Earnest Money** from ..... (name and address of contractor) ..... (hereinafter called "the contractor") for compliance of his obligations in accordance with the terms and conditions of the said NIT.

OR\*\*

Whereas The Executive Engineer, CED-IV, Civil Construction Unit (CCU), Ministry of Environment, Forest & Climate Change (MoEF&CC), 7th Floor, Pt. Deen Dayal Antyodaya Bhawan, CGO Complex, Lodhi Road, New Delhi-110003 on behalf of the President of India (hereinafter called "The Government") has entered into an agreement bearing number ..... with ..... (Name and address of the contractor) ..... (hereinafter called "the Contractor") for execution of work ..... (name of work) ..... The Government has further agreed to accept an irrevocable Bank Guarantee for Rs ..... (Rupees ..... only) valid upto ..... (date) ..... as **Performance Guarantee/security Deposit/Mobilization Advance** from the said Contractor for compliance of his obligations in accordance with the terms and conditions of the agreement.

- 1) We ..... (Indicate the name of the bank) ..... (herein after referred to as “the Bank”), hereby undertake to pay to the Government an amount not exceeding Rs ..... (Rupees ..... only) on demand by the Government within 10 days of the demand.
- 2) We ..... (Indicate the name of the Bank) ..... do here by undertake to pay the amount due and payable under this guarantee without any demur, merely on a demand from the Government stating that the amount claimed is required to meet the recoveries due or likely to be due from the said contractor. Any such demand made on the Bank shall be conclusive as regards the amount due and payable by the Bank under this Guarantee. However, our liability under this guarantee shall be restricted to an amount not exceeding Rs..... (Rupees ..... only).
- 3) We ..... (indicate the name of the Bank) ....., further undertake to pay the Government any money so demanded notwithstanding any dispute or disputes raised by the contractor in any suit or proceeding pending before any court or Tribunal, our liability under this Bank Guarantee being absolute and unequivocal. The payment so made by us under this Bank

Guarantee shall be a valid discharge of our liability for payment there under and the contractor shall have no claim against us for making such payment.

- 4) We..... (indicate the name of the Bank) ..... further agree that the Government shall have the fullest liberty without our consent and without affecting in any manner our obligation here under to vary any of the terms and conditions of the said agreement or to extend time of performance by the said contractor from time to time or to postpone for any time or from time to time any of the powers exercisable by the Government against the said contractor and to forbear or enforce any of the terms and conditions relating to the said agreement and we shall not be relieved from our liability by reason of any such variation or extension being granted to the said contractor or for any forbearance, act of omission on the part of the Government or any indulgence by the Government to the said contractor or by any such matter or thing whatsoever which under the law relating to sureties would, but for this provision, have effect of so relieving us.
- 5) We ..... (indicate the name of the Bank) ..... further agree that the Government at its option shall be entitled to enforce this Guarantee against the Bank as a principal debtor at the first instance without proceeding against the contractor and notwithstanding any security or other guarantee the Government may have in relation to the Contractor's liabilities.
- 6) This guarantee will not be discharged due to the change in the constitution of the Bank or the Contractor.
- 7) We ..... (indicate the name of the Bank) ..... undertake not to revoke this guarantee except with the consent of the Government in writing.
- 8) This Bank Guarantee shall be valid up to ..... unless extended on demand by the Government. Notwithstanding anything mentioned above, our liability against this guarantee is restricted to Rs ..... (Rupees ..... only) and unless a claim in writing is lodged with us within the date of expiry or extended date of expiry of this guarantee, all our liabilities under this guarantee shall stand discharged.

Date.....

Witnesses:

1. Signature.....

Name and address

Authorized signatory

Name

Designation

Staff code no.

Bank seal

2. Signature .....

Name and address

\*Date to be worked out on the basis of validity period of 90 days where only financial bids are invited and 180 days for two/three bid system from the date of submission of tender.

\*In paragraph-1, strike out the portion not applicable. Bank Guarantee will be made either for earnest money or for performance guarantee/security deposit/mobilization advance, as the case may be.

## LIST OF EQUIPMENTS FOR TESTING OF MATERIALS & CONCRETE AT SITE LABORATORY

All necessary equipment for conducting all necessary tests shall be provided at the site in the well-furnished site laboratory by the contractor at his own cost. The following minimum laboratory equipment's shall be set up at site office laboratory:

Sl.No.	Equipment	Numbers (Minimum)
1	Compressing testing machine	As per Requirement of work
2	Cube mould	
3	Slump cone, steel plate, tamping rod, steel scale, scoop	
4	Graduated glass measuring cylinder	
5	Sets of sieves of 450mm internal dia for coarse aggregate [100mm, 80mm, 40mm; 20mm; 12.5mm, 10mm; 4.75mm complete with lid	
8	Sets of sieves of 200mm internal dia for fine aggregate [4.75mm; 2.36mm; 1.18mm; 600 microns; 300 microns & 150 micron ,	
9	Sieve Brushes and sieve shaker capable of 200mm and 300mm dia sieves, manually operated with timing switch assembly	
10	Electronic balance 600gx0.1g., 10kg and 50kg	
11	Physical balance weight upto 5 kg	
12	Measuring jars 100ml, 200ml, 500ml	
13	Gauging trowels 100mm & 200mm with wooden Handle	
14	Spatula 100mm & 200mm with long blade wooden Handle	
15	Vernier callipers 12" & 6" size	
16	GI tray 600x450x50mm, 450x300x40mm, 300x250x40mm	
17	Screw gauge 0.1mm-10mm, least count 0.05	
18	Set of box spanner	
19	Hammer 1lb & 2lb	
20	Rubber Hammer	
21	Hacksaw with 6 blades	
22	Measuring tape 5mtr	
23	Depth gauge 20cm	
24	Shovels & Spade	

**Note:** The above list is only indicative and not exhaustive. The contractor may be required to provide more equipment's as per the requirement of work and as per the direction of the engineer-in-charge.



**LIST OF MANDATORY MACHINERY, TOOLS & PLANTS TO BE DEPLOYED BY  
THE CONTRACTOR AT SITE**

<b>S. No</b>	<b>Equipment</b>	<b>Numbers (Minimum)</b>
1.	Needle Vibrators.	As per Requirement of work
2.	Plate Vibrator	
3.	JCB, Excavator, Dumper, Tipper	
4.	Reinforcement cutting & Bending machines	
5.	Total station.	
6.	Auto level & staff.	
7.	Water tanker (Minimum capacity of 5000 litres)	
8.	Welding machine 400 Ampere	
9.	Screener for coarse sand and fine sand	
10.	Centrifugal mono block water pump minimum capacity 2 HP	
11.	Steel Shuttering with necessary steel props	
12.	Steel scaffolding and staging materials	
13.	Plain Concrete/Mortar Mixer	
14.	Semi-Automatic Pavement Concrete Paver	
15.	Screed Vibrator	
16.	Any other machinery required for completion of the work as per decision of Engineer-in-charge.	

## **ADDITIONAL CONDITIONS**

### **1. GENERAL**

- 1.1.** The Contractors are advised to inspect and examine the site and its surroundings and satisfy themselves with the nature of site, the means of access to the site, the constraints of space for stacking material / machinery, labour etc., constraints put by local regulations (if any), weather conditions at site (rainfall, snowfall, winter/summer temperatures etc.), general ground / subsoil conditions etc. or any other circumstances which may affect or influence their tenders. No claims, whatsoever, shall be entertained at a later date for any errors found, on plea that the information supplied by the Department in the tender is insufficient or is at variance with the actual site conditions.
- 1.2.** The work shall generally be carried out in accordance with the “CPWD Specifications 2019 Vol. I & II” with correction slips up to last date of submission of bid (including any extension in last date of bid submission), additional/Particular Specifications, Architectural/Structural drawings and as per instructions of Engineer-in-Charge. Any additional item of work, if taken up subsequently, shall also conform to the relevant specifications mentioned above.
- 1.3.** The several documents forming the tender are to be taken as mutually complementary to each other. Detailed drawings shall be followed in preference to small scale drawings and figured dimensions in preference to scale dimensions. Between two or more Clauses of this Contract, the provisions of a specific Clause relevant to the issue under consideration shall prevail over those in other Clauses.
- 1.4.** The work shall be carried out in accordance with the Architectural drawings and Structural drawings, to be issued by the Engineer-in-Charge. Before commencement of any item of work, the contractor shall correlate all the relevant architectural, structural and services drawings issued for the work and satisfy himself that the information available there from is complete and unambiguous. The discrepancy, if any, shall be brought to the notice of the Engineer-in-Charge before execution of the work. The contractor alone shall be responsible for any loss or damage occurring by the commencement of work on the basis of any erroneous and or incomplete information.
- 1.5.** Should there be any difference or discrepancy between the description of items as given in the particular specifications for individual items of work, special conditions and I.S. Codes, drawings etc., the following order of preference shall be observed-
  - (i) Nomenclature of items as per Schedule of Quantities
  - (ii) Special/Additional Conditions
  - (iii) Particular Specifications
  - (iv) Architectural/Structural drawings
  - (v) CPWD Specifications including upto date correction slips.
  - (vi) CPWD General Conditions of Contract (2023) for Maintenance works including correction slips issued up to last date of submission of bid including extensions if any.
  - (vii) Indian Standards Specifications of B.I.S.
  - (viii) ASTM, BS, or other foreign origin code mentioned in tender document.
  - (ix) Manufacturer’s specifications and as decided by the Engineer-in-Charge.
  - (x) Sound Engineering practices or well-established local construction practices.
- 1.6.** A reference made to any Indian Standard Specifications in these documents, shall imply to the latest version of that standard, including such revisions / amendments as issued by the Bureau of Indian Standards up to last date of receipt of tenders. The Contractor shall keep at his own cost all such publications of relevant Indian Standard applicable to the work at site.

- 1.7. The tenderer shall acquaint himself with the proposed site of work, its approach roads, working space available etc. before quoting his rates and no claim on this account shall be entertained by the department.
- 1.8. The contractor shall keep the site neat & clean during execution of the work and cover the building materials with cloths. In case of any mis-happening with visitors or animals due to scattered materials / malba at his site the contractor shall be held responsible for the same.
- 1.9. The contractor(s) shall get himself acquainted with nature and extent of the work and satisfy himself about the availability of materials from kiln or approved quarries for collection and conveyance of materials required for construction.
- 1.10. Any legal or financial implications resulting out of disposal of earth shall be sole responsibility of the contractor. Nothing extra shall be paid on this account.
- 1.11. The contractor(s) shall give to the local body, police and other authorities all necessary notices etc. that may be required by law and obtain all requisite licenses for temporary obstructions, enclosures etc. and pay all fee, taxes and charges which may be levied on account of these operations in executing the contract.
- 1.12. The contractor shall ensure that there is no damage to adjoining property. If any such untoward incident happens, he shall be entirely responsible for any consequences besides making good any damages to the adjoining property whether public or private. He shall supply and maintain lights either for illumination or for cautioning the public at night.
- 1.13. The building work shall be carried out in the manner complying in all respects with the requirements of the relevant bylaws and regulations of the local body under the jurisdiction of which the work is to be executed or as directed by the Engineer-in-charge and nothing extra shall be paid on this account.
- 1.14. The contractor shall take all necessary precautions to prevent any nuisance or inconvenience to the owners, tenants or occupiers of adjacent properties and to the public in general and to prevent any damage to such properties and any pollution of smoke, streams and water-ways. He shall make good at his cost and to the satisfaction of the Engineer-in-Charge, any damage to roads, paths, cross drainage works or public or private property whatsoever caused thereon by the contractor. All waste or superfluous materials shall be carried away by the contractor without any reservation entirely to the satisfaction of the Engineer-in-Charge.
- 1.15. Utmost care shall be taken to keep the noise level to the barest minimum so that no disturbance as far as possible is caused to the occupants / users of building/adjacent properties.
- 1.16. Other agencies may also simultaneously execute and install the works of other civil and E&M services for the work. The contractor shall afford necessary facilities for the same. The contractor shall leave such recesses, holes, openings, trenches etc. as may be required for such related works and the contractor shall fix the same at time of casting of concrete, stone work and brick work, if required, and nothing extra shall be payable on this account.
- 1.17. The contractor shall conduct work so as not to interfere with or hinder the progress or completion of the work being performed by other contractor(s) or by the Engineer-in-Charge and shall as far as possible arrange his work and shall place and dispose of the materials

being used or removed so as not to interfere with the operations of other contractor or he shall arrange his work with that of the others in an acceptable and coordinated manner and shall perform it in proper sequence to the complete satisfaction of others.

- 1.18.** Some restrictions may be imposed by the security agencies /client on the working and on movement of labour, materials etc. in the campus/site and may require to issue identity cards to all persons authorized by contractor to do work / visit the work site. The contractor shall be bound to follow all such restrictions / instructions and no claim whatsoever shall on this account will be entertained. The loss of time on this account, if any, shall have to be made up by generating additional resources etc. at no extra cost.
- 1.19.** The rates quoted by the contractor are deemed to be inclusive of site clearance, setting out work, profile, establishment of reference bench mark, spot levels, construction of all safety and protection devices, barriers, earth embankments, preparatory works, all testing of materials, working during monsoon, working at all depths, height and locations etc. unless specified in the schedule of quantities.
- 1.20.** Royalty at the prevailing rates wherever payable shall have to be paid by the contractor on the boulders, metal, shingle, sand, local earth/soil and bajri etc. or any other material collected by him for the work direct to revenue authorities and nothing extra shall be paid by the department for the same.
- 1.21.** No payment shall be made for any damage caused by rain, snowfall, flood or any other natural calamity, whatsoever during the execution of the work. The contractor shall be fully responsible for any damage to the govt. property and work for which the payment has been advanced to him under the contract and he shall make good the same at his risk and cost. The contractor shall be fully responsible for safety and security of his material, T&P, Machinery brought to the site by him.
- 1.22.** The contractor shall deploy adequate resources e.g. manpower, labour, T&P, Plant & Equipment etc. as per actual requirement of work.
- 1.23.** The rates for all items of work shall, unless clearly specified otherwise, include cost of all labour, material, tools and plants and other inputs including all heights/depths, leads and carriages involved in the execution of the item.
- 1.24.** The Contractor shall keep himself fully informed of all acts/laws of the Central/State/Local Governments, orders of central/state/local Government, decrees of statutory bodies, tribunals having any jurisdiction or authority, which in any manner may affect those engaged or employed and anything related to carrying out the work. All the rules & regulations and bye-laws laid down by Collector / Municipal Corporation of area (where site is located) and any other statutory bodies shall be adhered to, by the contractor, during the execution of work. The Contractor shall also adhere to all traffic restrictions notified by the national/state/local authorities. The contractor shall abide and ensure compliances to terms and conditions of various approvals obtained for the project. He shall protect and indemnify the Department and its officials & employees against any claim and /or liability arising out of violations of any such laws, ordinances, orders, decrees, by himself or by his employees or his authorized representatives. The Contractor shall indemnify the Department against all claims in respect of patent rights, royalties, design, trademarks- of name or other protected rights, damages to adjacent buildings, roads or members of public, in course of execution of work or any other reasons whatsoever, and shall himself defend all actions arising from such claims and shall indemnify the Department in all respect from such actions, costs and expenses. Nothing extra shall be payable on this account.

- 1.25.** The fee payable to statutory authorities for obtaining the various permanent service connections and occupancy certificate for the building shall be borne by the Department.
- 1.26.** The rates for all items shall be considered as inclusive of pumping/baling out water, if necessary, for which no extra payment shall be made. The conditions shall be considered to include water from any source such as inflow of flood, rain water, surface drainage, sewerage or due to any other reason including surface and sub-soil water etc. and shall apply to the execution in any season.
- 1.27.** Unless otherwise specified in the schedule of quantities, the rates tendered by the contractor shall be inclusive of all costs & taxes and shall apply to all leads, lifts, depth and height and nothing extra shall be payable on this account.
- 1.28.** No foreign exchange shall be made available by the Department for importing (purchase) of equipment, plants, machinery, materials of any kind or any other items required to be carried out during execution of the work. No delay and no claim of any kind shall be entertained from the Contractor, on account of variation in the foreign exchange rate.
- 1.29.** All ancillary and incidental facilities required for execution of work like labour camp, stores, fabrication yard, offices for Contractor, watch and ward, temporary ramp required to be made for working at the basement level, temporary structure for plants and machineries, temporary barricading or fencing around the working sites, water storage tanks, installation and consumption charges of temporary electricity, telephone, water etc. required for execution of the work, protection works, testing facilities / laboratory at site of work, facilities for all field tests and for taking samples etc. during execution or any other activity which is necessary (for execution of work and as directed by Engineer-in-Charge), shall be deemed to be included in rates quoted by the Contractor. Nothing extra shall be payable on these accounts. Before start of the work, the Contractor shall submit to the Engineer-in-Charge, a site / construction yard layout, specifying areas for construction, site office, positioning of machinery, material yard, cement & other storage, fabrication yard, site laboratory, water tank etc. for approval.
- 1.30.** For completing the work in time, the Contractor might be required to work in two or more shifts (including night shifts). Normally contractors shall not be allowed to execute the RCC, electrical and finishing work at night. Work at night shall, however, be allowed if the site conditions/circumstances so demand. No claim whatsoever shall be entertained on this account, not with-standing the fact that the contractor may have to pay extra amounts for any reason, to the labours and other staff engaged directly or indirectly on the work according to the provisions of the labour Act and other statutory bodies regulations and the agreement entered upon by the contractor with them.
- 1.31.** The contractor shall maintain in perfect condition, all portions executed till completion of the entire work allotted to him. Where however phased delivery of work is contemplated these provisions shall apply separately to each phase.
- 1.32.** All material shall only be brought at site as per program finalized with the Engineer-in-Charge. Any pre-delivery of the material not required for immediate consumption shall not be accepted and thus not paid for.
- 1.33.** The contractor(s) shall take instructions from the Engineer-in-Charge regarding collection and stacking of materials at any place. No excavated earth or building rubbish shall be stacked on areas where other buildings, roads, services and compound walls are to be constructed. The stacking shall take place as per stacking plan however, if any change is required, the

same shall be done with the approval of Engineer-in-Charge.

- 1.34.** The Contractor shall bear all incidental charges for all type of cartage/carriage upto execution site, storage and safe custody of materials issued by department/arranged by the contractor.
- 1.35.** The terms machine batched, machine mixed and machine vibrated concrete used elsewhere in agreement shall mean the concrete produced in concrete batching and mixing plant and if necessary, transported by transit concrete mixers, placed in position by the concrete pumps, tower crane and vibrated by surface vibrator /needle vibrator / plate vibrator, as the case may be to achieve required strength and durability.
- 1.36.** The work should be planned in a systematic manner so that chase cuttings in the walls, ceilings and floors are minimized. Wherever absolutely essential, the chase shall be cut using chase cutting machines. Chases will not be allowed to be cut using hammer / chisel. The electrical boxes should be fixed in walls simultaneously while raising the brick work. The contractor shall ensure proper coordination of various disciplines viz. sanitary & water supply, electrical, fire- fighting and any other services.
- 1.37.** In case of local Municipal regulations / restrictions by client /non-availability space at site if huts for labours are not allowed to be erected at the site of work, the contractor shall be required to provide such accommodation at suitable place at his own cost and nothing extra shall be paid on this account.
- 1.38.** Any cement slurry added over base surface for continuation of concreting for better bond is deemed to have been built in the items and nothing extra shall be payable and no extra cement considered in consumption on this account.
- 1.39.** Existing drains, pipes, cables, over-head wires, sewer lines, water lines and similar service encountered in the course of the execution of work shall be protected against the damage by the contractor at his own expense. In case the same are to be removed and diverted. The same shall be payable to the contractor. The contractor shall work out the cost and the same shall be approved by Engineer-in-Charge. The contractor shall not store materials or otherwise occupy any part of the site in a manner likely to hinder the operation of such services.
- 1.40.** The contractor shall be responsible for the watch and ward / guard of the building's safety, fittings and fixtures provided by him against pilferage and breakage during the period of installations and thereafter till the building is physically handed over to the department. No extra payment shall be made on this account.
- 1.41. SETTING OUT:**
- (i) The contractor shall carry out survey of the work area, setting out the layout and fixing of alignment of the building as per architectural and Structural drawings in consultation with the Engineer-in-Charge and proceed further ensuring full structural continuity and integrated and monolithic construction. Any discrepancy between the architectural drawings and actual layout at site shall be brought to the notice of the Engineer-in-charge. It shall be responsibility of the contractor to ensure correct setting out of alignment/layout using total station instrument. Nothing extra shall be payable on this account.
  - (ii) The contractor shall establish, maintain and assume responsibility for grades, lines, levels and bench marks. He shall report any errors or inconsistencies regarding grades, lines, levels, dimensions to the Engineer-in-Charge before commencing work. Commencement of work shall be regarded as the contractor's acceptance of such

grades, lines, levels and dimensions and no claim shall be entertained at a later date for any errors found.

- (iii) The initial levels shown in the layout plan are indicative and the actual ground levels may vary with the levels shown in the layout plan. Though the site levels are indicated in the drawings the Contractor shall ascertain and confirm the site levels with respect to benchmark from the concerned authorities. No claim due to difference in ground levels as per layout plan and as per actual on ground shall be entertained.
- (iv) If at any time, any error appears due to grades, lines, levels and benchmarks during the progress of the work, the Contractor shall, at his own expense rectify such error, if so required, to the satisfaction of the Engineer -in-Charge. Nothing extra shall be payable on this account.
- (v) The Contractor shall protect and maintain temporary/ permanent benchmarks at the site of work throughout the execution of work. These benchmarks shall be got checked by the Engineer-in-Charge or his authorized representatives. The work at different stages shall be checked with reference to bench marks maintained for the said purpose. Nothing extra shall be payable on this account.
- (vi) The approval by the Engineer-in-Charge, of the setting out by the Contractor, shall not relieve the Contractor of any of his responsibilities and obligation to rectify the errors/ defects, if any, which may be found at any stage during the progress of the work or after the completion of the work.

#### **1.42. SAFETY PRECAUTIONS**

- (i) Contractor shall within two weeks of award of work, submit to the Engineer-in-Charge for his approval, list of measures for maintaining safety of manpower deployed for construction.
- (ii) The contractor(s) shall erect the barricading of required height with Precoated galvanized iron profile sheet/MS sheets with proper structural support for enclosing the full area of constructions as per direction of Engineer-in-charge.
- (iii) *Entry to the site shall be controlled for proper security of man and materials and to avoid accidents.*
- (iv) Necessary personal protective and safety equipment's such as helmet, safety shoes & harness, gloves etc. shall be provided to the all-site Engineers, Supervisory staff, labour and technical staff of the contractor by the Contractor at his own cost and to be used at site.
- (v) The Contractor(s) shall take all precautions to avoid accidents by exhibiting necessary caution boards, day & night speed limit boards, red flags, red lights and providing barriers. He shall be responsible for all damages and accidents caused to existing/new work due to negligence on his part. No hindrances shall be caused to traffic during the execution of the work.
- (vi) In case of any accident of labours/ contractual staff's the entire responsibility will rest on the part of the contractor and any compensation under such circumstances if becomes payable the same shall be entirely borne by the contractor and department shall have no role on this account.
- (vii) It shall be ensured by the contractor that no electric live wire is left exposed or unattended to avoid any accidents in this regard.



- (viii) Any trenching and digging for laying sewer lines/water lines/cables etc. shall be commenced by the contractor only when all men, machineries and materials have been arranged and closing of the trench(s) thereafter shall be ensured within the least possible time.
- (ix) For facia work, outer finishing and other RCC works etc. double steel scaffolding having two sets of vertical supports with steel staircase for inspection of works by engineer in charge shall be used. The supports shall be sound and strong, tied together with horizontal piece over which scaffolding planks shall be fixed.
- (x) *The contractor shall have to work in pandemic / epidemic conditions such as **COVID 19** for which he has to make safety arrangement / measures for the workers / staff and for the premises meant for them, as per guidelines issued by Government and directions issued by Engineer-in-charge from time to time and nothing extra shall be paid on this account.*

### 1.43. QUALITY ASSURANCE

- (i) The contractor shall ensure quality work in a planned and time bound manner. Any sub-standard material/work beyond set out tolerance limit shall be summarily rejected by the Engineer-in-charge & contractor shall be bound to replace / remove such sub-standard / defective work immediately. If any material, even though approved by Engineer-In-Charge is found defective or not conforming to specifications shall be replaced / removed by the contractor at his own risk & cost.
- (ii) All materials and fittings brought by the contractor to the site for use shall conform to the samples approved by the Engineer-in-charge which shall be preserved till the completion of the work. If a particular brand of material is specified in the particular specification, the same shall be used after getting the same approved from Engineer-In-Charge. Wherever brand / quality of material are not specified in the particular specifications; the contractor shall submit the sample as per list of preferred make given in tender documents. For all other items, materials and fittings of ISI Marked shall be used with the approval of Engineer-In-Charge. Wherever ISI Marked material / fittings are not available, the contractor shall submit samples of materials / fittings manufactured by firms of repute conforming to relevant specifications or IS codes and use the same only after getting the approval of Engineer-In-Charge.
- (iii) The Contractor shall procure and provide all the materials from the manufacturers / suppliers as per the item description in schedule of quantity and particular specifications for the work. The equivalent brand other than brand / make mentioned in particular specification for any item, shall be permitted to be used in the work, only when the specified make is not available. This is, however, subject to documentary evidence produced by the contractor for non-availability of the brand specified and also subject to independent verification by the Engineer-in-Charge. In exceptional cases, where such approval is required, the decision of Engineer-in-Charge as regards equivalent make of the material shall be final and binding on the Contractor. No claim, whatsoever, of any kind shall be entertained from the Contractor on this account. Nothing extra shall be payable on this account. Also, the material shall be procured only after written approval of the Engineer-in-Charge.
- (iv) Water tanks, taps, sanitary, water supply and drainage pipes, fittings and accessories should conform to byelaws and municipal body / corporation where CPWD Specifications are not available. The contractor should engage licensed plumbers



for the work and get the materials (fixtures/fittings) tested by the Municipal Body/Corporation authorities wherever required at his own cost. Nothing extra shall be paid on this account.

- (v) The tests, as necessary, shall be conducted in the laboratory approved by the Engineer-in-Charge. The samples shall be taken for carrying out all or any of the tests stipulated in the particular specifications and as directed by the Engineer-in-Charge or his authorized representative.
- (vi) All the registers of tests (carried out at Site or in outside laboratories) and all material at site (MAS) registers including cement register shall be maintained by the contractor which shall be issued to the contractor by Engineer-in-charge. All the entries in the registers will be made by the designated Engineering Staff of the contractor and same should be regularly reviewed by JE/AE/AEE/EE. Contractor shall be responsible for safe custody of all the registers.
- (vii) The Contractor shall at his own risk and cost make all arrangements and shall provide all such facilities including material and labour, the Engineer-in-Charge may require for collecting, preparing, forwarding the required number of samples for testing as per the frequency of test stipulated in the contract specifications or as considered necessary by the Engineer-in-Charge, at such time and to such places, as directed by the Engineer-in-Charge. Nothing extra shall be payable for the above.
- (viii) The Contractor or his authorized representative shall associate in collection, preparation, forwarding and testing of such samples. In case he or his authorized representative is not present or does not associate him, the result of such tests and consequences thereon shall be binding on the Contractor. The Contractor or his authorized representative shall remain in contact with the Engineer-in-Charge or his authorized representative associated for all such operations. No claim of payment or claim of any other kind, whatsoever, shall be entertained from the Contractor.
- (ix) All the testing charges shall be borne by contractor.
- (x) All the hidden items such as water supply lines, drainage pipes, electrical conduits, sewers etc. are to be properly tested as per the design conditions before covering.
- (xi) The contractor shall give performance test of the entire installation(s) as per the standing specifications before the work is finally accepted and nothing extra whatsoever shall be payable to the contractor for the test.
- (xii) The contractor shall make available, on request from the department, the copies of challan, cash memos, receipts and other certificates, if any, vouchers towards the quantity and quality of various materials procured for the work. The contractor shall also provide information and necessary documentation on the name of the manufacturer, manufacturer's product identification, manufacturer's instructions, warning, date of manufacturing and test certificates (from manufacturers for the product for each consignment delivered at site), shelf life, if any etc., for the department to ensure that the material have been procured from the approved source and is of the approved quality, as directed by the Engineer-in-Charge. Wherever specified, day-to-day account of receipt of such material shall be maintained at site of work.

- (xiii) If the Contractor does not provide adequate supporting staff or labour or both for carrying out field tests or collecting and forwarding samples to outside laboratory or for maintaining test records, Engineer in charge may carry out field tests or collect and forward sample to outside laboratory or appoint any person to maintain the registers at risk and cost of Contractor. The charges so incurred shall be entirely borne by contractor and shall be deducted from Running or final bill of contractor. Further, *recovery of Rs. 1000/- for each default shall be levied to contractor.*

#### **1.44. CLEANLINESS OF SITE**

- (i) The Contractor shall not stack building material / malba / muck on the land or road of the local development authority or on the land owned by the others, as the case may be. So, the muck, rubbish etc. shall be removed periodically, from the site of work to the approved dumping grounds as per the local byelaws and regulations of the concerned authorities and all necessary permissions in this regard from the local bodies shall be obtained by the Contractor. Nothing extra shall be payable on this account. In case, the Contractor is found stacking the building material / malba as stated above, the Contractor shall be liable to pay the stacking charges / penalty as may be levied by the local body or any other authority and also to face penal action as per the rules, regulations and bye-laws of such body or authority. The Engineer –in-Charge shall be at liberty to recover, such sums due but not paid to the concerned authorities on the above counts, from any sums due to the Contractor including amount of the Security Deposit and performance guarantee in respect of this contract agreement.
- (ii) If the contractor fails to comply the above conditions for removal / disposal of malba, a fine of Rs.500/- for each fault per day shall be recovered from the contractor. The department may remove the malba so generated and dumped, by issue of a notice or instruction through site order book, by Junior Engineer/Assistant Engineer/ Engineer-in-charge, concerned and a recovery of Rs.300/- per cum shall be made from the contractor. No claim / dispute shall be entertained on these conditions at any stage either during execution of work or after completion of work and decision of the Engineer-in-charge shall be final and binding.
- (iii) The contractor shall take instructions from the Engineer-In-Charge regarding collection and stacking of materials at any place. No excavated earth or building rubbish shall be stacked on areas where other buildings, roads, services and compound walls are to be constructed.
- (iv) The site of work shall be always kept clean due to constraints of space and to avoid any nuisance to the users of buildings in the adjacent plots. The Contractor shall take all care to prevent any water- logging at site. The wastewater, slush etc. shall not be allowed to be collected at site. For discharge into public drainage system, necessary permission shall be obtained from relevant authorities after paying the necessary charges, if any, directly to the authorities. The work shall be carried out in such a way that the area is kept clean and tidy. All the fees/charges in this regard shall be borne by the Contractor. Nothing extra shall be payable on this account.
- (v) It is the responsibility of contractor to keep building neat and clean. The contractor shall spray the chemicals fumigate site area to check the mosquitoes at frequent interval or as directed by the Engineer in charge. The contractor shall also make lighting and temporary ventilation arrangement in basement.

- (vi) The contractor shall not wash the drum of TM (transit mixture) at site and shall avoid the spread of leachate / cement slurry to be spread at the site of work and all care shall be taken to keep the site neat and clean at his own cost.
- 1.45. Employ measures to segregate the waste on-site into inert, chemical or hazardous wastes. Recycle the unused chemical/hazardous wastes such as oil, paint, batteries and asbestos. The inert waste is to be disposed off to Municipal Corporation/local bodies dump yard and landfill sites.
- 1.46. The contractor shall provide potable water for all workers. The contractor shall provide the minimum level of sanitation and safety facilities for the workers at site. The contractor shall ensure cleanliness of workplace with regard to the disposal of waste and effluent; provide clean drinking water and latrines and urinals as per applicable standard.
- 1.47. The provisions of “Construction and Demolition Waste Management Rules 2016 in exercise of powers conferred by Environment (Protection) Act 1986 (available at web address [www.moef.gov.in](http://www.moef.gov.in)) as notified by Ministry of Environment, Forests & Climate Change vide notification dated 29.03.2016 and incorporated vide OM No. DG/CON/Misc./04 dated 23.01.2017 issued by the Office of DG, CPWD, MoUD is to be complied with. **Directives on Air Pollution from construction and demolition activity (DG/SE/CM/CON/Misc./02 dated 16.03.2016)** shall be complied with.
- 1.48. **Water for construction purpose:** For water supply, the contractor shall make his own arrangements including boring of tube well, if necessary and nothing extra shall be paid by the department for arrangement of water or on its treatment. The contractor shall get the water tested with regard to its suitability and conforming to the relevant IS code. The contractor shall obtain the written approval from the Engineer-in-charge before he proceeds for using the same for execution of work. The water testing charges shall be borne by the contractor.
- 1.49. The contractor shall keep at his own cost all publications of relevant Indian standard (BIS) applicable to the work at site. In case of non-compliance, these standards will be purchased by the Engineer-in-charge and actual cost of purchase will be recovered from the Bill of the Contractor.
- 1.50. Senior Officers of CCU/Ministry/Client Department may inspect the on-going work at site at any time with or without prior intimation. The contractor shall facilitate them in inspection.
- 1.51. Jurisdiction of Court - Courts at Delhi alone shall have the jurisdiction to decide any dispute arising out of or in respect of this contract.
- 1.52. **CONDITIONS FOR WATER SUPPLY, SANITARY INSTALLATIONS AND DRAINAGE WORK:**
- a) The contractor shall only employ experienced and specialized workmen for carrying out the Water supply, sanitary installations and Drainage work.
- b) Five years Guarantee bond in prescribed proforma attached with NIT shall be submitted by the contractor to meet his liabilities under the Guarantee Bond. The sole responsibility about quality of Water supply, Sanitary installations and Drainage work shall rest with the contractor.

- c) Ten percent of the cost of Water supply, Sanitary installations and Drainage work shall be retained as security deposit and the amount so withheld would be released after five years from the date of completion of the entire work under the agreement, if the performance of the work done is found satisfactory. If any defect is noticed during the guarantee period, it shall be rectified by the contractor within seven days of receipt of intimation of defects in the work. If the defects pointed out are not attended to within the specified period, the same will be got done by the Engineer-in-charge at the risk and cost of contractor.

However, the security deposit deducted may be released in full against Bank Guarantee of equivalent amount in favour of Engineer-in-charge, if so, decided by the Engineer-in-charge. The security deposit against this work shall be in addition to the security deposit mentioned elsewhere in contract form.

# **PART-B**

**GURANTEE BOND, PREFERRED MAKES OF MATERIALS  
AND SCHEDULE OF QUANTITIES OF THE CIVIL WORKS.**

**GUARANTEE BOND TO BE EXECUTED BY THE CONTRACTOR FOR REMOVAL OF DEFECTS AFTER COMPLETION OF WATER SUPPLY, SANITARY INSTALLATIONS AND DRAINAGE WORK WORKS**

The agreement made this..... day of ..... (Two Thousand----- only) ..... between .....S/o .....(hereinafter called the GUARANTOR of the one part) and the PRESIDENT OF INDIA (hereinafter called the Government of the other part)

WHEREAS THIS agreement is supplementary to a contract (Hereinafter called the Contract) dated ..... and made between the GUARANTOR OF THE ONE PART AND the Government of the other part whereby the contractor inter alia undertook to remove all the defects in .....(name of specialized work) in said contract completely.

AND WHEREAS THE GUARANTOR agreed to give a guarantee to the affect that the said work will remain intact without any defect for ..... (No. of years) from the date of completion of the work.

NOW THE GUARANTOR here by guarantee that the works executed by him will remain intact and full functional without any defects of any kind for ..... (No. of years) to be reckoned from the date of completion of work under the contract.

The decision of the Engineer-in-Charge with regard to nature and cause of defects shall be final.

During this period of guarantee, the guarantor shall make good all defects and in case of any defect being found in the .....(name of specialized works) to the satisfaction of the Engineer-in-Charge at his cost and shall commence the work for such rectification within seven days from the date of issue of the notice from Engineer-in-Charge calling upon him to rectify the defects failing which the work shall be got done by the Department by some other contractor at the Guarantor's risk and cost. The decision of the Engineer -in-charge as to the cost payable by the Guarantor shall be final and binding.

That if the guarantor fails to make good all defects or commits breach there under, then the Guarantor will indemnify Engineer-in-Charge and his successor against all loss, damage, cost expense or otherwise which may be incurred by him by reason of any default on the part of the GUARANTOR in performance and observance of this supplementary agreement. As to the amount of loss and/or damage and / or cost incurred by the Government, the decision of the Engineer-in-charge will be final and binding on both the parties.

IN WITNESS WHEREOF these presents have been executed by the obligator ..... and ..... by ..... for and on behalf of the PRESIDENT OF INDIA on the day, month and year first above written.

SIGNED, sealed and delivered by OBLIGATOR in the presence of: -

1. .... 2. ....

SIGNED FOR AND BEHALF OF THE PRESIDENT OF INDIA BY ..... in the presence of

1. .... 2. ....

### **LIST OF ACCEPTABLE MAKES FOR CIVIL WORKS**

Acceptable makes of materials to be used in the work are enclosed. In case of non-availability of these makes, the Executive Engineer, CED-IV, CCU may allow use of alternative. Only BIS marked materials in the list shall be used in the work. Non-BIS marked materials may be permitted by the Engineer-in-charge only when BIS marked materials are not manufactured. If approved make/brand of any material is not given in the list, the same will be approved by the Engineer-in-charge.

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
1	ANTI TERMITE PESTICIDES	BAYER, FMC INDIA, HINDUSTAN INSECTICIDES
2	STEEL (TMT FE-550D)	TATA TISCON, RINL, JINDAL STEEL & POWER LTD, JSW STEEL LTD. AND SAIL
3	STRUCTURAL STEEL SECTIONS	TATA, JINDAL, SAIL, RINL
4	CEMENT [OPC 43 GRADE AND P.P.C.]	ACC, AMBUJA, ULTRATECH, WONDER, JK, SHREE
5	PRECAST DUCTS/DRAINS/ DRAIN COVER/KERB CHANNEL	KK, NITCO, KERAKROME, TERRAFIRMA, FUJISILVERTECH
6	WHITE CEMENT	BIRLA WHITE, J.K. WHITE, ULTRATECH
7	CC PAVERS	NITCO, UNISTONE, KK, CICO
8	VITRIFIED TILES (DOUBLE CHARGED / FULL BODY/ULTRA SLIM /ANTISKID / ACID-ALKALI RESISTANT)- (ALL TILES SHALL BE PROCURED FROM FULLY OWNED FACTORY OF THE MANUFACTURER AND NOT FROM JV / OUTSOURCED)	SOMANY, KAJARIA, RAK
9	CERAMIC GLAZED TILES	SOMANY, KAJARIA, RAK
10	WATER-PROOF CEMENT PAINT	SNOWCEM, ASIAN PAINT, SIKKA, NEROLAC
11	SYNTHETIC ENAMEL PAINT	ASIAN PAINT, AKZONOBEL (DULUX), NEROLAC, ICI
12	PLASTIC EMULSION PAINT	ASIAN PAINT, NEROLAC, AKZONOBEL (DULUX), ICI
13	DISTEMPER/ACRYLIC EMULSION PAINT	ASIAN PAINT, BERGER, NEROLAC, DULUX
14	TEXTURED PAINT	ASIAN, OIKAS, DULUX
15	STEEL PRIMER	NEROLAC, BERGER, ASIAN PAINTS
16	WOOD PRIMER	NEROLAC, BERGER, ASIAN PAINTS
17	EXTERIOR WATERPROOFING PAINT	RAINCOAT (DR. FIXIT), ASIAN, BERGER

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
18	WOOD FINISH (MELAMINE & PU POLISH)	ASIAN. ICI, JOTUN, NEROLAC
19	LAMINATE	MERINO, GREENLAM, CENTURY, DURO
20	PLY BOARD, PLYWOOD (PINE BOARD)	GREEN, MERINO, CENTURY, DURO
21	SELF LEVELLING COMPOUND	MAPAI, ARDEX ENDURA, BIZZAR
22	EPDM GASKET	HANU, ANAND, VICTOR
23	WOOD ADHESIVE	FEVICOL, 3M, ARALDITE, SIKA
24	FLUSH DOOR (ALL FLUSH DOORS SHALL BE PROCURED FROM FULLY OWNED FACTORY OF THE MANUFACTURER AND NOT FROM JV / OUTSOURCED)	GREEN, MERINO, CENTURY, DURO
25	WATER REPELLENT PAINT	ARDEX ADURA, WEBER, PIDILITE
26	FIRE SEALANT	HILTI, 3M, MCCOY
27	TILE ADHESIVE	PIDILITE, ARDEX ENDURA, WEBER, MAPEI
28	STONE ADHESIVE	PIDILITE, ARDEX ENDURA, WEBER
29	DASH, ANCHORING FASTENERS	HILTI, FISCHER, CANON
30	ALUMINIUM COMPOSITE PANEL	ALUCOBOND, REYNOBOND, ALPOLIC
31	EPOXY GROUTING COMPOUND	PIDILITE, ARDEX ENDURA, WEBER, MAPEI
32	READY MIX GYPSUM PLASTER	SAINT GOBAIN, USG BORAL, ULTRATECH
33	READY MIX CONCRETE	ACC, NDCON, ULTRATECH, RMC INDIA, SHRI RAM
34	SILICON SEALANT	GE, DOW CORNING, PIDILITE
35	GYPSUM BOARD	USG BORAL, LAFAGE, SAINT GOBAIN, KNAUF DANOLINE
36	FLOAT GLASS	ASAHI, MODI GLASS, SAINT GOBAIN GLASS
37	MECHANICAL COUPERS	USHA MARTIN, DEXTRA, HALFEN
38	CRYSTALLIANE CEMENTITIOUS WATERPROOFING COMPOUND	XYPEX CONSTRUCTION CHEMICAL, KRYTONE, PENETRON



S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
39	WATERPROOFING MEMBRANE (SBS/HDPE/POLYUREA/CEMENTITIOUS ETC.)	SIKA, GRACE, SOPREMA
40	WATERPROOFING CUM PU FOAM INSULATION	SIKA, GRACE, SOPREMA
41	VERMICULLITE TREATMENT	NEWKEM, GRACE, SOPREMA
42	HOLLOW METAL PRESSED DOORS (METAL DOORS)	NAVAIR, TATA PRAVESH, SHAKTI HORMANN
43	ROLLER BLIND	VISTA, MAC, HUNTER DOUGLUS
44	PRELAMINATED PARTICLE BOARD	MERINO, CENTURY PLY, GREENLAM
45	HYDRAULIC DOOR CLOSER, FLOOR SPRING, DOOR AUTOMATION	DORMA, GEZE, HAFELE, HORMANN
46	HARDWARES FOR FIRE RATED DOORS	HAFELE, DORMA, GEZE, HORMANN
47	HARDWARE FOR FURNITURE ITEMS	HETTICH, EBCO, HAFELE
48	STAINLESS STEEL FITTINGS/HARDWARE FOR WOODEN/METAL/GLAZED/STEEL DOOR & WINDOWS	HAFELE, DORMA, GEZE, HORMANN
49	WIRE MESH	STERLING ENTERPRISES, MICROMESH, HARVER STANDARD, INDIA WIRE MESH
50	ADHESIVE TAPE	3M, NORTON, BOPD, TESA
51	HIGH PERFORMANCE EPOXY BASED RESIN ANCHOR SYSTEM	FOSROC, CICO, SIKA
52	EPOXY MORTAR	FOSROC, SIKA, MYK LATICRETE, CICO
53	NUTS, BOLTS & SCREWS	GKW, KUNDAN, PRIYA, ATUL
54	ALUMINIUM SECTIONS FOR DOORS & WINDOWS ETC.	JINDAL, HINDALCO, BHORUKA
55	HARDWARE FITTINGS FOR ALUMINIUM WINDOWS & DOORS	GEZE, HAFELE, DORMA
56	MS SECTIONS (PIPES, BOXES CHANNELS)	JINDAL HISAR, TATA, SURYA
57	S.S. MATERIAL/HADRAILS/RAILINGS	JINDAL STAINLESS STEEL LTD., TATA STEEL, SAIL
58	WALL PUTTY	JK, BIRLA, ASAIN PAINT
59	FLOOR HARDENER	PIDILITE, FOSROC, SIKA, CICO

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
60	POLYSULPHIDE SEALANT	PIDILITE, ARDEX ENDURA, WEBER, BASF.
61	EXPANSION JOINT	MIGUA, CS, CAMEO
62	WATERPROOFING COMPOUND	FOSROC, SIKA, PIDILITE
63	ADMIXTURES/CURING COUMPOUND	FOSROC, SIKA, ATPL, KUNALCOM CHEM, ASIAN PAINT, PIDILITE
64	REFLECTIVE GLASS, TINTED GLASS, HIGH PERFORMANCE GLASS, LACQUERED GLASS	SAINT GOBAIN, ASAHI (INDIA), PILKINGTON
65	LOOKING GLASS / MIRROR	ATUL, MODI GUARD, GOLDEN FISH
66	HIGH PERFORMANCE GLASS	SAINT GOBAIN, ASAHI, PILKINGTON
67	METAL/ALUMINUM FALSE CEILING	SAINT GOBAIN, HUNTER DOUGLUS, ARMSTRONG
68	AAC BLOCK	AEROCON, JINDAL BLOCK, MODCRETE, FINECRETE
69	AAC BLOCK ADHESIVE	ARDEX ENDURA, PIDILITE, WEBER
70	HIGH PRESSURE LAMINATE INTERIOR/EXTERIOR GRADE	MERINO, FUNDERMAX, GREENLAM
71	UPVC DOORS & WINDOWS	FENESTA, ALUPLAST, KOENMERLING
72	WALL GUARD, HAND RAIL, CORNER GUARD	CONSTRUCTION SPECIALITIES / GRADUS INPROCORP INDIA PVT. LTD./WINDOWTECH
73	SOLID ACRYLIC SURFACE	MERINO, LG, GRANIMUM, SAMSUNG- STARON
74	VINYL / CONDUCTIVE FLOORING, DADO SKIRTING	FORBO, TARAKETT, ARMSTRONG, GERFLOOR
75	CALCIUM SILICATE TILES FALSE CEILING	AEROLITE, RAMCO, HILUX
76	FIRE CHECK DOORS (METAL/ROLLING/GLAZED)	NAVAIR, TATA PRAVESH, SHAKTI HORMANN
77	FIRE CURTAIN	ORIENT, PACIFIC, KENT, NECO
78	LEAD LINED DOOR	NAVAIR, SHAKTI HORMANN, METAFLEX, RESPONSIVE
79	FIRE RESISTANT GLASS	SAINT GOBAIN, ASAHI, PILKINGTON

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
80	ALUMINIUM GLAZED DOORS/WINDOWS	HINDALCO, SHAKTI HORMANN, GLAZE TECHNO, SARLA
81	POLYESTER POWDER COATING/ PVDF COATING	JOTUN, AKZONOBEL, ASIAN PPG, NIPPON
82	GLASS PROCESSOR FOR MAKING DGU/TOUGHENING	AIS, ART N GLASS, GSC, KAENAL GLASS, SAINT GOBAIN
83	PVB/ SGP LAMINATE FILM, SENTRY FILM	DUPONT, SAFLEX, EASTMAN, LG, 3M
84	ACOUSTIC SEAL / DOOR SEAL	LORIENT, RAVEN, DORMA, 3M, HAFELE
85	PAINT AND PRIMER FOR FIRE CHECK DOOR.	VIPER, BERGER, NULLIFIRE
86	INTUMESCENT FIRE / SMOKESEAL	ASTRO FLAME, RAVEN, SEALZ, LORIENT
87	CALCIUM SILICATE BOARD FOR FIRE DOOR	PROMOTECH, PROMINA, RAMCO
88	FRP DOOR & FRAMES	FIBREWAYS, JAISHREE, FIBRE TECHNO, BHATT FRP, JAYNA
89	FLY ASH BRICKS	POWERBRICKS, PAUBHARA, YBW
90	INSULATION	UP TWIGA, LLOYD, ROXUL ROCKWOOL, ROCKWOOLINDIA
91	ANTI BACTERIAL PAINT	JOTUN/LIQUIDE PLASTIC /CONSTRUCTION SPECIALITY
92	GRAPHIC FILM	3M, AVERY DENNISON
93	GRC/ FRP	BIRLA WHITE, UNISTONE, SANDERSON, SHENISHA CORPORATION
94	PLASTER OF PARIS	JK, BIRLA, SAKARNI, ULTRATECH
95	MR BOARD	SAINT GOBAIN, USG BORAL, ARMSTRONG
96	MINERAL FIBRE SUSPENDED CEILING SYSTEM	SAINT GOBAIN, USG BORAL, ARMSTRONG, KNAUF AMF
97	CURTAIN TRACK AND CURTAIN FABRIC	WINDOWTECH, DECOREX, MEDFRESHE, RESPONSIVE
98	POLYMER MODIFIED ADHESIVE	ULTRATECH, BALL ENDURA, PIDILITE, WEVER

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
99	ANTI BACTERIAL AND ANTI SKID VITRIFIED TILES	SOMANY, SIMPOLO, KAJARIA, JOHNSON, RAK
100	POLYCARBONATE SHEET	DANPALON, SOLALITE, DPI SYSTEM, EVERLITE, CPI, ULTRALITE, LEXAN
101	GI PIPES	JINDAL, PRAKASH SURYA
102	GI FITTINGS	UNIK, KS, ICS
103	CPVC PIPES	ASTRAL, PRINCE, SFMC
104	HDPE PIPES	SUPREME, FINOLEX, ASTRAL, RELIANCE, SMARTFLOW
105	CC (SPUN) IRON PIPE	NECO, SKF, HIF
106	CI SOIL, WASTE, VENT PIPES & FITTINGS	NECO, SKF, HIF
107	C.P. BRASS FITTING	JAQUAR, ROCA, KOHLER
108	SS SINK	NILKANTH, NIRALI, JAYNA
109	C.P. BRASS BATHROOM ACCESSORIES / FITTINGS	JAQUAR, ROCA, KOHLER
110	GLASS SHOWER PARTITION	DORMA, HAFELE, GEZE
111	SANITARY WARE (URINAL, WASH BASIN, WC ETC.)	JAQUAR, GROHE, KOHLER
112	GLASS MOSAIC TILE	ITALIA, CORAL, KAJARIA
113	LIQUID SOAP DISPENSER	EURONICS, TOSHI, UTEC, DOLPHY
114	HAND DRIER	EURONICS, TOSHI, UTEC, DOLPHY
115	AROMA DISPENSER	EURONICS, TOSHI, UTEC, DOLPHY
116	SHOE SHINNING MACHINE	EURONICS, TOSHI, UTEC, DOLPHY
117	TISSUE DISPENSER WITH TRASH	EURONICS, TOSHI, UTEC, DOLPHY
118	HAND TOWEL DISPENSER	EURONICS, TOSHI, UTEC, DOLPHY
119	NITRILE RUBBER INSULATION	ARMACELL, K-FLEX, A-FLEX, SUPREME
120	FAÇADE AND WINDOW SYSTEM	SCHUCO, ALUK, REYNAERS, GUTMANN
121	FIRE STOP IN CURTAIN WALL SYSTEM	HILTI, 3M, FISCHER, LORIENT
122	POP OUT VENT FOR FAÇADE AND SYSTEM WINDOW HARDWARE	COTSWOLD, SCHUCO, ALUK, REYNAERS

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
123	ALUMINIUM OPERABLE LOUVER	TECHNAL, DOMAL, YOGI GLAZE, SCHUCO
124	AIR TRANSFER GRILL	RUSKIN, SYSTEM AIR, TROX, TREMCO
125	POLYURETHANE CONCRETE FLOORING, EPOXY FLOORING, SELF-LEVELLING FLOORING	ARDEX ENDURA, SIKA, MAPEI, SAINT GOBAIN - WEBER
126	ENGINEERED WOODEN FLOORING AND SKIRTING	MIKASA (GREENLAM), TARKETT, HAVWOODS, PARADOR (HIL), PERGO, KAHRS
127	RAISED/ FALSE ACCESS FLOORING SYSTEM	LINDNER, UNIFLOOR, TANKARIA, FLEXI FLOOR
128	SOLID SURFACE (CORIAN)	DUPONT, LG, STARON-SAMSUNG, LUXOR (DURLAX)
129	CAR DECK FLOORING SYSTEM	MAPEI, SAINT GOBAIN – WEBER, MYK ARMENT
130	ENGINEERED MARBLE	HR JOHNSON, KALINGA STONE, NITCO, QUASTONE
131	RUBBERISED PAVERS	SUNFLEX, FLOOR GUARD, BORON RUBBERS
132	COLOUR HARDENER	SIKA, FOSROC, PIDILITE
133	IPE WOOD	HKS FLOORING, INDIANA, RESHAWOOD
134	SYNTHETIC THATCH ROOFING	PALMEX, WINROYAL, SYNTHETIC THATCH
135	ASPHALT CEMENT SHINGLES	TAPCO, CERTAINTEED, MALARKEY
136	STRETCH MEMBRANE / TENSILE FABRIC	SERGE FERRARI, CHUKOH, MEHLER, VERSAIDAG
137	STAMP CONCRETE PIGMENT / APPLICATOR	UNITED FLOORING, CONCRETE BY DESIGN, FLEX STONE
138	SS TACTILE	EMINENT, FERROTECH, SUNDARAM, JINDAL
139	BAMBOO DECKING, ROOFING & CLADDING	ECO GREEN FLOORING, EPITOME BAMBOOWOOD, LAMIWOOD
140	OUTDOOR SIGNAGES	3M, AVERY DENNISON, VEDAAANSHI SIGNS
141	ACOUSTIC PANELS	ARMSTRONG, USG BORAL, ANUTONE, ROCKWORTH,

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
142	C&D WASTE PRECAST ELEMENT	GM CONCRETE, ILFS
143	THERMOPLASTIC PAINT/ROAD MARKING PAINT	NEROLAC, ASIAN, SHALIMAR, BERGER, STP LTD
144	WEATHER/STRUCTURE SILICON SEALANT	WACKER, MCCOY, DOW CORNING
145	BACKER ROD	SUPREME/SYSTRANS
146	POLYSTRENE BOARD	SUPREME, DOW CORNING, TEXAS, PIDILITE
147	DUCTILE IRON PIPES	ELECTROSTEEL, KESORAM, TISCO
148	STAINLESS STEEL PIPES AND FITTINGS	VIEGA, JINDAL STAINLESS STEEL, J-PRESS
149	SLUICE VALVES	SANT, ADVANCE, AUDCO, ZOLOTO, KIRLOSKAR, LEADER
150	GATE / BALL VALVES	SANT, LEADER, ZOLOTO
151	ELECTROMAGNETIC FLOWMETER	ENDRESS HAUSER, KROHNE MARSHALL, NEXTENG ENVIRO PVT LTD, SEIMENS, ABB
152	CI/DI MANHOLE COVER	NECO, SKF, RIF, BIC
153	DWC PIPES	NOBLE POLYTEC, ALOM POLY EXTRUSIONS LTD., ASTRAL, ANEK INDUSTRIAL PLASTICS
154	DRAIN CHANNEL WITH SS SLOTTED GRATING	ACO, KESSEL, PRUTHA
155	WATER BASED MELAMINE POLISH	ASIAN, PIDILITE, DULUX
156	ALL FURNITURE ITEMS (CHAIRS / WORKSTATIONS/BEDS, STORAGE UNITS ETC.)	ROCKWORTH / STEELCASE / HERMAN MILLER/ HAWORTH/DURIAN/ GODREJ
157	CARPET	SUPINOE/ MILLIKAN/ SHAW
158	IRRIGATION FITTINGS, VALVES AND OTHER ACCESSORIES	RAIN BIRD / NETAFIM / BERMAD / HUNTER / TORO
159	IRRIGATION PUMPS	LUBI / RAIN BIRD / GRUNDFOS
160	PVC WATER TANK	SINTEX, SUPREME, VECTUS, POLYCON
161	INJECTION GROUTING	ECMAS, SIKA

S. NO.	DETAILS OF MATERIALS	MANUFACTURERS NAME
162	RCC PIPES (NP-2)/ (NP-3)	BRHC PIPES INDUSTRIES, JAIN SPUN PIPE, LAKSHMI CONCRETE PRODUCT

**Note: - Executive Engineer, CED-IV, CCU, MoEF&CC, New Delhi reserves the right to add or delete any materials and Brands in the list of approved materials/brands.**

**SCHEDULE OF QUANTITY**  
**FOR CIVIL WORK**



### **SCHEDULE OF QUANTITY**

**Name of work:** - (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works).

Sl. No.	Description of items	Qty	Unit	Rate	Amount	DSR/MR
1	Steel work in built up tubular (round, square or rectangular hollow tubes etc.) trusses etc., including cutting, hoisting, fixing in position and applying priming coat of approved steel primer, including welding and bolted with special shaped washers etc. complete.					10.16
1.1	Hot finished welded type tubes	500.00	Kg	194.40	97,200.00	10.16.1
2	Welding by gas or electric plant including transportation of plant at site etc. complete.	1000.00	cm	3.7	3,700.00	10.22
3	Providing and laying rectified Glazed Ceramic floor tiles of size 300x300 mm or more (thickness to be specified by the manufacturer), of 1st quality conforming to IS : 15622, of approved make, in colours 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 grouting the joints with white cement and matching pigments etc., complete.	30.00	sqm	1330	39,900.00	11.39
4	Providing and fixing precoated galvanised iron profile sheets (size, shape and pitch of corrugation as approved by Engineer-in-Charge) of total coated thickness 0.50 mm (base metal of minimum 0.45 mm thickness with total coating thickness of 0.05mm) with zinc coating 120 grams per sgm as per IS: 277, in 240 mpa steel grade, 5-7 microns epoxy primer on both side of the sheet and polyester top coat 15-18 microns. Sheet should have	650.00	sqm	738.65	4,80,123.00	12.50

	protective guard film of 25 microns minimum to avoid scratches during transportation and should be supplied in single length upto 12 metre or as desired by Engineer-in-charge. The sheet shall be fixed using self drilling /self tapping screws of size (5.5x 55 mm) with EPDM seal, complete upto any pitch in horizontal/ vertical or curved surfaces, excluding the cost of purlins, rafters and trusses and including cutting to size and shape wherever required.					
5	Providing and fixing pre-coated galvanised steel sheet roofing accessories of total coated thickness 0.50 mm (base metal of minimum 0.45 mm thickness with total coating thickness of 0.05 mm) with Zinc coating 120 gram per sqm as per IS: 277, in 240 mpa steel grade, 5-7 microns epoxy primer on both side of the sheet and polyester top coat 15-18 microns using self drilling/ self tapping screws complete :					12.51
5.1	Ridges plain (500 - 600mm)	70.00	mtr	532.35	37,265.00	12.51.1
6	Providing and Fixing 15 mm thick densified tegular edged eco friendly light weight calcium silicate false ceiling tiles of approved texture of size 595 x 595 mm in true horizontal level, suspended on inter locking metal grid of hot dipped galvanised steel sections (galvanising @ 120 grams per sqm including both side) consisting of main 'T' runner suitably spaced at joints to get required length and of size 24x38 mm made from 0.33 mm thick (minimum) sheet, spaced 1200 mm centre to centre, and cross "T" of size 24x28 mm made out of 0.33 mm (Minimum) sheet, 1200 mm long spaced between main'T' at 600 mm centre to centre to form a grid of 1200x600 mm and secondary cross 'T' of length 600 mm and size 24 x28 mm made of 0.33 mm thick (Minimum) sheet to be inter locked at middle of the 1200x 600 mm panel to from grid of size 600x600 mm, resting on periphery walls partitions on a Perimeter wall angle pre-coated steel of	300.00	sqm	2158.15	6,47,445.00	12.53

	size(24x24X3000 mm made of 0.40 mm thick (minimum) sheet with the help of rawl plugs at 450 mm centre to centre with 25 mm long dry wall screws @ 230 mm interval and laying 15 mm thick densified edges calcium silicate ceiling tiles of approved texture in the grid, including, cutting/ making opening for services like diffusers, grills, light fittings, fixtures, smoke detectors etc., wherever required. Main 'T' runners to be suspended from ceiling using G.I. slotted cleats of size 25x35x1.6 mm fixed to ceiling with 12.5 mm dia and 50 mm long dash fasteners, 4 mm G.I. adjustable rods with galvanised steel level clips of size 85 x 30 x 0.8 mm, spaced at 1200 mm centre to centre along main 'T'. Bottom exposed with 24 mm of all T-sections shall be pre-painted with polyester baked paint, for all heights, as per specifications, drawings and as directed by Engineer-in-Charge.					
	Note :- Only calcium silicate false ceiling area will be measured from wall to wall. No deduction shall be made for exposed frames/opening (cut outs) having area less than 0.30 sqm. The calcium silicate ceiling tile shall have NRC value of 0.50 (Minimum), light reflection > 85%, non- combustible as per B.S. 476 part IV, 100% humidity resistance and also having thermal conductivity <0.043 w/mK.					
7	Painting with synthetic enamel paint of approved brand and manufacture of required colour to give an even shade :					13.99
7.1	One or more coats on old work	200.00	sqm	102.80	20,560.00	13.99.1
8	Dismantling steel work in built up sections in angles, tees, flats and channels including all gusset plates, bolts, nuts, cutting rivets, welding etc. including dismembering and stacking within 50 metres lead.	100.00	Kg	5.65	565.00	15.18
9	Dismantling tile work in floors and roofs laid in cement mortar including stacking material within 50 metres lead.					15.23
9.1	For thickness of tiles 10 mm to 25 mm	5.00	sqm	73.40	367.00	15.23.1

10	Dismantling roofing including ridges, hips, valleys and gutters etc., and stacking the material within 50 metres lead of:					15.28
10.1	G.S. Sheet	650.00	sqm	164.95	1,07,218.00	15.28.1
11	Dismantling aluminium/ Gypsum partitions, doors, windows, fixed glazing and false ceiling including disposal of unserviceable material and stacking of serviceable material with in 50 meters lead as directed by Engineer-in-charge.	500.00	sqm	56.35	28,175.00	15.57
12	12 mm cement plaster of mix :					13.4
12.1	1:4 (1 cement: 4 coarse sand)	36.00	sqm	357.35	12,865.00	13.4.1
13	6 mm Cement plaster of mix:					13.16
13.1	1:3 (1 cement : 3 fine sand)	35.00	sqm	300.45	10,516.00	13.16.1
14	Providing and applying white cement based putty of average thickness 1 mm, of approved brand and manufacturer, over the plastered wall surface to prepare the surface even and smooth complete.	70.00	sqm	156.05	10,924.00	13.8
15	Wall painting with acrylic emulsion paint, 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.					13.82
15.1	Two coats	70.00	sqm	137.45	9,622.00	13.82.2
16	Painting with synthetic enamel paint of approved brand and manufacture of required colour to give an even shade :					13.99
16.1	One or more coats on old work	15.00	sqm	102.80	1,542.00	13.99.1
17	Disconnecting damaged overhead/terrace PVC water storage tank of any size from water supply line and removing from the terrace including shifting at ground level as per direction of Engineer-in-charge.	3.00	Each	433.75	1,301.00	14.79
18	Dismantling W.C. Pan of all sizes including disposal of dismantled materials including malba all complete as per directions of Engineer-in-Charge.	7.00	Each	134.10	939.00	14.82
19	Dismantling tile work in floors and roofs laid in cement mortar including stacking material within 50 metres lead.					15.23

19.1	For thickness of tiles 10 mm to 25 mm	20.00	sqm	73.40	1,468.00	15.23.1
20	Dismantling G.I. pipes (external 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 :					15.44
20.1	15 mm to 40 mm nominal bore	20.00	mtr	149.80	2,996.00	15.44.1
21	Dismantling of flushing cistern of all types (C.I./PVC/Vitrious China) including stacking of useful materials near the site and disposal of unserviceable materials within 50 metres lead.	7.00	Each	112.05	784.00	15.52
22	Dismantling old plaster or skirting raking out joints and cleaning the surface for plaster including disposal of rubbish to the dumping ground within 50 metres lead.	70.00	sqm	54.65	3,826.00	15.56
23	Providing and fixing water closet squatting pan (Indian type W.C. pan ) with 100 mm sand cast Iron P or S trap, 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:					17.1
23.1	White Vitreous china Orissa pattern W.C. pan of size 580x440 mm with integral type foot rests	3.00	Each	6767.40	20,302.00	17.1.1
24	Providing and fixing white vitreous china pedestal type water closet (European type W.C. 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 :					17.2
24.1	W.C. pan with ISI marked white solid plastic seat and lid	4.00	Each	6515.55	26,062.00	17.2.1
25	Providing and fixing wash basin with C.I. brackets, 15 mm C.P. brass pillar taps, 32 mm C.P. brass waste of standard pattern, including painting of fittings and brackets, cutting and making good the walls wherever require:					17.7

25.1	White Vitreous China Wash basin size 550x400 mm with a pair of 15 mm C.P. brass pillar taps	5.00	Each	2301.75	11,509.00	17.7.3
26	Providing and fixing 8 mm dia C.P. / 8.8. Jet with flexible tube upto 1 metre long with 8.8. triangular plate to European type W.C. of quality and make as approved by Engineer - in - charge.	4.00	Each	349.15	1,397.00	17.16A
27	Providing and fixing white vitreous china flat back or wall corner type lipped front urinal basin of 430x260x350 mm or 340x410x265 mm sizes respectively.	1.00	Each	1648.95	1,649.00	17.23
28	Providing and fixing P.V.C. waste pipe for sink or wash basin including P.V.C. waste fittings complete.					17.28
28.1	Flexible pipe					17.28.2
28.1.1	32 mm dia	6.00	Each	119.55	717.00	17.28.2.1
29	Providing and fixing toilet paper holder :					17.34
29.1	C.P. brass	4.00	Each	803.70	3,215.00	17.34.1
30	Deduct for not Providing and fixing trap of self cleansing design with screwed down or hinged grating with or without vent arm complete, including cost of cutting and making good the walls and floors :					17.6
30.1	100 mm inlet and 100 mm outlet					17.60.1
30.1.1	Sand cast iron S&S as per IS: 3989	3.00	Each	-1996.50	- 5,990.00	17.60.1.1
31	Providing and fixing uplasticised PVC connection pipe with brass unions :					18.21
31.1	45 cm length					18.21.2
31.1.1	15 mm nominal bore	13.00	Each	97.75	1,271.00	18.21.2.1
32	Providing and placing on terrace (at all floor levels) polyethylene water storage tank, IS : 12701 marked, with cover and suitable locking arrangement and making necessary holes for inlet, outlet and overflow pipes but without fittings and the base support for tank.	2000.00	ltr	11.00	22,000.00	18.48
33	Providing and fixing C.P. brass bib cock of approved quality conforming to IS:8931					18.49
33.1	15 mm nominal bore	7.00	each	506.80	3,548.00	18.49.1
34	Providing and fixing C.P. brass angle valve for basin mixer and					18.53

	geyser points of approved quality conforming to IS:8931					
34.1	15 mm nominal bore	13.00	Each	574.30	7,466.00	18.53.1
	<b>Total</b>				<b>16,12,447.00</b>	
	<b>Modified Estimated cost after using correction factor on DSR 2023 on account GST 0.973(with ref. file no. 158/SE(TAS)GST/2024/02-E dated 08.08.2024</b>				<b>15,68,910.93</b>	
	<b>Add cost index 3%</b>				<b>47,067.33</b>	
	<b>Total (A)</b>				<b>16,15,978.26</b>	<b>X</b>
35	Providing and Fixing 15 mm thick densified tegular edged eco friendly light weight calcium silicate false ceiling tiles of approved texture of size 595 x 595 mm in true horizontal level, suspended on inter locking metal grid of hot dipped galvanised steel sections (galvanising @ 120 grams per sqm including both side) consisting of main 'T' runner suitably spaced at joints to get required length and of size 24x38 mm made from 0.33 mm thick (minimum) sheet, spaced 1200 mm centre to centre, and cross "T" of size 24x28 mm made out of 0.33 mm (Minimum) sheet, 1200 mm long spaced between main'T' at 600 mm centre to centre to form a grid of 1200x600 mm and secondary cross 'T' of length 600 mm and size 24 x28 mm made of 0.33 mm thick (Minimum) sheet to be inter locked at middle of the 1200x 600 mm panel to from grid of size 600x600 mm, resting on periphery walls partitions on a Perimeter wall angle pre-coated steel of size(24x24X3000 mm made of 0.40 mm thick (minimum) sheet with the help of rawl plugs at 450 mm centre to centre with 25 mm long dry wall screws @ 230 mm interval and laying 15 mm thick densified edges calicum silicate ceiling tiles of approved texture in the grid, including, cutting/ making opening for services like diffusers, grills, light fittings, fixtures, smoke detectors etc., wherever required. Main 'T' runners to be suspended					

	from ceiling using , 4 mm G.I. adjustable rods with galvanised steel level clips of size 85 x 30 x 0.8 mm, spaced at 1200 mm centre to centre along main 'T'. Bottom exposed with 24 mm of all T-sections shall be pre-painted with polyester baked paint, for all heights, as per specifications, drawings and as directed by Engineer-in-Charge.					
35.1	Note :- Only calcium silicate false ceiling area will be measured from wall to wall. No deduction shall be made for exposed frames/opening (cut outs) having area less than 0.30 sqm. The calcium silicate ceiling tile shall have NRC value of 0.50 Minimum), light reflection > 85%, non- combustible as per B.S. 476 part IV, 100% humidity resistance and also having thermal conductivity <0.043 w/mK.					
35.1.1	Note: False ceiling Tile will be provided by department free of cost and new frame work for false ceiling provided by contractor.	210.00	sqm	943.75	1,98,188.00	MR 1
36	Credit for steel & GI material scrap obtained after dismantling from site as per direction of Engineer-in-Charge.	1800.00	Kg	-33.00	- 59,400.00	MR 2
	<b>Total(B)</b>				<b>1,38,788.00</b>	
	<b>Grand total(A+B)</b>				<b>17,54,766.00</b>	

Assistant Engineer (P)  
CED-IV, CCU, New Delhi

Executive Engineer,  
CED-IV, CCU, New Delhi



# **PART-C**

## **ADDITIONAL CONDITIONS, SPECIFICATIONS AND SCHEDULE OF QUANTITIES APPLICABLE TO ELECTRICAL AND MECHANICAL COMPONENT OF THE WORK**

### **ADDITIONAL CONDITIONS**

1. The scope includes Planning, Design & preparation of Drawings for E&M services, obtaining approvals from the department, supplying, Installation, testing and commissioning of Internal & External Electrical Installations, Point Wiring, Power wiring, LT Cabling Work, LED light Fittings, Ceiling fans, Switch boards, MCB / MCCB DBs, LAN, EPABX, as per CPWD specifications and relevant BIS standards as amended up to last date of submission of bid including extensions if any.
2. The work shall be carried out strictly in accordance with CPWD specification for electrical works CPWD general specification Part-I (Internal) & Part-II (External) 2023, and amended up to date and in accordance with Indian Electricity Rules, 1956, Indian Electricity Act, 2003 as amended up to date and NBC 2016 as amended up to date and as per instructions of the Engineer-in-Charge i/c as below and nothing extra will be paid.
3. The scope of works & specification is given in general but they are not exhaustive i.e. does not mention all the incidental works required to be carried out for complete execution of the item of work. The work shall be carried out, all in accordance with true intent and meaning of the specifications and the drawings taken together, regardless of whether the same may or may not be particularly shown on the drawings and/ or described in the specifications, provided that the same can be reasonably inferred there from. There may be several incidental works, which are not mentioned in the contract document/specifications but will be necessary to complete the item in all respect.
4. All these incidental works/ costs which are not mentioned, but are necessary to complete the work shall be deemed to have been included in the overall amount quoted by the contractor for various components of work. No adjustment of rates shall be made for any variation in quantum of incidental works due to variation/change in actual working drawings.
5. Adjustment of rates shall not be made due to any change in incidental works or any other deviation in such element of work (which is incidental to the items of work and are necessary to complete such items in all respects) on account of the directions of Engineer-in-charge. Nothing extra shall be payable on this account.
6. Agency will get the scheme approved from the local bodies wherever required before start of the work and if required after completion of the work also.
7. Three final copies of the documents prepared shall be submitted to Engineer-in-charge for record. All the documents created out of the assignment will become the sole property of the Department. The contractor shall obtain completion certificate after completion of the project from statutory local bodies before handing over.
8. **Stage Payment for E&M packages: The following percentage of contract rates shall be payable against the stages of work shown herein:**

<b>S. No.</b>	<b>Stage of Work</b>	<b>Payment terms in %</b>
<b>1</b>	<b>On initial inspection of materials and delivery at site in good condition on basis</b>	<b>50%</b>
<b>2</b>	<b>On completion of installation</b>	<b>25%</b>
<b>3</b>	<b>On completion of testing and commissioning</b>	<b>20%</b>
<b>4</b>	<b>On Handing Over</b>	<b>5%</b>
	<b>Total</b>	<b>100%</b>

9. The contractor has to submit MOU with associated contractor (in case electrical contractor is associated), engineers name, credential, email address & mobile no. before start of work. The main agency should possess a valid electrical contractor licence for executing EI works otherwise he has to associates contractor having valid electrical contractor licence.
10. The contractor shall employ Supervisory staff as per NIT provision who will be constantly in touch with the department and will sign site order book.
11. All the material to be used on this work by the contractor shall be got approved from the Engineer-in-Charge in advance before installation at the site.
12. The work shall be carried out according to instructions of the Engineer-in-Charge.
13. All damages done to the building during the execution of electrical work shall be the responsibility of the contractor and the same will be made good immediately at his own cost to the satisfaction of the Engineer-in-Charge. In case, the repair is not satisfactory, the department will get it rectified & any expenditure incurred by the department in this connection shall be recovered from the contractor and decision of the Engineer-in-charge about recovery shall be final & binding on the contractor.
14. The bad workmanship will not be accepted and defects shall be rectified at contractor's cost to the satisfaction of the Engineer-in-Charge. The program of electrical works is to be coordinated in accordance with the civil work.
15. All the debris of the electrical works should be removed and the site should be cleared by the contractor immediately after the accruing of debris daily. Similarly rejected material if any should be immediately cleared off from the site by the contractor.
16. Cement for work is to be arranged and used by the contractor himself and nothing extra will be paid on this account.
17. The contractor or his engineer is bound to sign the site order book as and when required by the Engineer-in-Charge and to comply with the remarks therein.

18. The size of conduit and wiring shall be got approved from the Engineer-in-Charge before the execution of work.
19. The contractor shall make his own arrangement at his own cost for Electrical/ General tools and plants required for the work. In case, proper tools are not available, the department will purchase the tools for bonafide use of work at the risk & cost of the contractor.
20. Main board and main distribution board: The work shall be carried out according to the drawing/details as approved by the Engineer-in-Charge. The contractor shall have to get the sample approved before the whole lot is brought to site. The main board, distribution board shall be properly labelled.
21. No tax shall be separately paid by the department. The rates tendered should be inclusive all taxes and duties. Statutory deductions at source shall be made while releasing payment through running/final bills as applicable. A certificate specifying the rate and amount of deduction shall however be issued by the department. The entire installation shall be at the risk and responsibility of the contractor until these are tested and handed over to the department. The watch & ward is the responsibility of the contractor till handing over.
22. Notwithstanding the schedule of quantities, all items of interrelated works considered necessary to make the installation complete and operative are deemed to be included, shall be provided by the contractor at no extra cost.
23. The connection inter connection, earthing and inter earthing shall be done by the contractor wherever required and nothing extra shall be paid on this account.
24. Nothing extra shall be paid for inter connections with thimbles/Wires/Tapes strips etc. used on the work.
25. The contractor has to make his own arrangements for stores and watch and ward and no extra claim for this will be entertained.
26. The contractor shall make his own arrangements for electrical power supply for the construction activities. No extra payments for the same will be made.
27. The wiring and conduit route shall be marked by the contractor on the drawing first, and shall be got approved from the Engineer-in-charge.
28. The rupturing capacity of the MCB's shall be 10KA. The MCB's shall have ISI mark.
29. The insulated copper wire to be used on this work shall be FRLS type of multi stranded.
30. Make of MCB/MCCB shall be the same as the make of MCB DB.
31. The contractor shall on demand by the Engineer-in-charge, furnish the proof to the satisfaction of Engineer-in-charge regarding purchase of Wires, Modular switches & accessories, MCBs MCBDB fan & fixture and accessories and other items, from the manufactures authorized outlets.

32. All PVC/MS conduits accessories shall be of the same make as conduits and shall be ISI marked. The conduits shall be terminated as switch boxes/metallic junction boxes with suitable glands/check nuts.
33. Cutting of brick walls shall be done with due care. All repairs and patch works shall be neatly carried out to match the original finish and to the entire satisfaction of the Engineer in Charge.
34. All the sub main and circuits wiring includes loose wire for connections inside switch boxes and MCB DBs. No payment for these loose wires shall be made. However, wires within the cubicle panel will be measured and paid under relevant item of work.
35. To facilitate drawing of wires, 18 SWG GI fish wire shall be provided along with laying of recessed conduit for which no extra payment shall be made. Conduits laid for other services, like TV, Telephone etc., where wiring is not done along with IEI work, fish wire shall be invariably drawn.
36. The connection between incoming switch/isolator and bus bar shall be made with suitable size of thimble and cable at no extra cost.
37. Copper conductor of insulated cables of size 1.5 Sq.mm and above shall be stranded and terminals provided with crimped lugs.
38. All hardware items such as screws, thimbles, GI wire etc. which are essentially required for completing an item as per specification will be deemed to be included in the item even when the same have not been specifically mentioned.
39. All hardware items such as nuts/bolts/screws/washers etc. to be used in work shall be of zinc/cadmium plated iron.
40. While laying conduit, suitable size junction boxes shall be provided for pulling the wire as per the decision of the Engineer-in-charge.
41. Materials to be used in work are to be ISI marked. The make of the materials has been indicated in the list of preferred makes. No other makes will be acceptable. The materials to be used in the work shall be got approved by the Engineer in Charge/his representative before its use at site. The Engineer-in-charge shall reserve the right to instruct the contractor to remove the material which, in his opinion, is not acceptable.
42. Where switches / sockets / regulator / telephone / TV / internet outlets are to be provided, the same shall be of only one make. Modular accessories for UPS outlets shall be of distinguishable colour.
43. The materials used in the work shall be of approved make as per list of preferred makes. In the preferred makes of fitting model no. of one of the acceptable makes has been mentioned for guidance. However, the contractor is free to supply other makes mentioned therein, provided the parameters of the fittings match with the fitting model No. mentioned in NIT. The decision of Engineer-in-charge shall be final.

44. The contractor shall have to work as per the convenience of the concerned Department.
45. Any conduit which is not to be wired by the contractor shall be provided with GI fish wire for wiring for some other agency subsequently. Nothing extra shall be paid for the same.
46. In case the main contractor is himself eligible (as per eligibility criteria) for executing any specific minor component and intends doing the job himself, he may not be required to associate with another agency for that minor component of work. In such cases the main contractor also has to submit the documents as per eligibility criteria mentioned for associated agency of individual E&M component.
47. In support of the eligibility conditions of the proposed Associated Contractor, copy of their registration documents, Electrical License, GST Documents duly attested by the applicants (Main Contractor) shall be submitted to the **Executive Engineer, CED-IV, CCU, New Delhi** for deciding the eligibility. Each such Associated Contractor will certify that they are not debarred as on the day of application for tender participation. Proposal for associating agency for minor components of work shall be submitted in **Form 'B'** of this tender document from each associate independently for all electrical and mechanical components.
48. The main contractor should submit an affidavit of MoU signed with eligible associated contractor. The MoU in the enclosed **Form 'C'** shall be signed by both the parties, main contractor as 1<sup>st</sup> party and associated contractor as 2<sup>nd</sup> party independently for all electrical and mechanical components.
49. In the event of the concerned E&M agency not performing satisfactorily or failure of associate contractor to complete the E&M work, the main contractor on written directions of the department, shall remove the Associate contractor deployed on the work and shall submit name of new associate agency who fulfil the conditions mentioned in the NIT to execute the leftover work without any loss of time or variation in cost to the department. **Such associates shall also give an undertaking along with the main tenderer but both of them together will stand guarantee for the equipment's already supplied for which payment has been released by the department in part.** If any equipment supplied for the work, during the currency of the earlier Associate contractor and paid partly by the Department, becomes redundant / not in a position to be installed and commissioned and put to beneficial use due to change in agency for execution of E&M work, the main contractor shall be liable for replacement of the equipment(s) at no cost to Department. No change of Associated Contractor will be allowed without prior approval of the Engineer-in-charge of the work.
50. In respect of all works i.e., Electrical installation., the materials shall be procured only from the original equipment manufacturers / authorized dealers of OEM. The contractor shall submit all documentary details in fulfilment of these conditions regarding procurement of materials including relevant test certificates.
51. Before completion of defect liability period as per condition laid down in GCC 2023, the main contractor has to submit security deposit of 5% of 80% of the price of LED fittings, for the remaining 4 years warranty period for LED fittings, in acceptable form i.e. FDR/ Bank

guarantee to Engineer in charge. The Security Deposit deducted from the bills of contractor shall be refunded to the main contractor only after submission of above security deposit for LED fittings, by main contractor, failing which this security deposit shall be deducted from Security Deposit deducted for total work and balance amount only will be refunded after completion of defect liability period. The LED fittings, Security Deposit will be released after completion of warranty period of 5 years to the main contractor.

52. The contractor shall execute the whole work in the most substantial and workman like manner in strict accordance with the specifications, approved design, drawings, particular specifications, special conditions, additional conditions and instructions of the Engineer-in-Charge.
53. The contractor shall at his own expense and risk arrange land for accommodation of labour, setting up of office, storage of materials, erection of temporary workshops, construction of approach roads to the site of work, including land required for carrying out of all jobs connected with the completion of the work. The contractor shall have to abide by the regulations of the authorities concerned and the directions of the Engineer-in-Charge for use of land available at the site of work. If it becomes necessary during construction to remove or shift the stored materials, shed, workshop, access roads, etc, to facilitate execution of the work included in this agreement or any other work by any other agency, the contractor shall remove or shift these facilities as directed by the Engineer-in-Charge and no claim whatsoever shall be entertained on this account.
54. The contractor shall at his own cost submit samples of all materials sufficiently in advance and obtain approval of Engineer-in-Charge. The materials to be used in actual execution of the work shall strictly conform to the quality of samples approved by the Engineer-in-Charge and nothing extra shall be paid on this account. The acceptance of any sample or material on inspection shall not be a bar to its subsequent rejection, if found defective.
55. The contractor shall at his cost, make all arrangements and shall provide necessary facilities as the Engineer-in-Charge may require for collecting, preparing, packing, forwarding and transportation of the required number of samples for tests and for analysis at such time and to such places as directed by the Engineer-in-Charge. Nothing extra shall be paid for the above operations including the cost of materials required for tests and analysis. All expenditure to be incurred for testing of samples e.g. Packaging, sealing, transportation, loading, unloading etc including testing charges shall be borne by the contractor.
56. The necessary tests shall be conducted in the laboratory approved by the Engineer-in-Charge. The samples for carrying out all or any of the tests shall be collected by the Engineer-in-charge or on his behalf by any other officer of CCU. The contractor or his authorized representative shall associate himself in collection, preparation, packing and forwarding of such samples for the prescribed tests and analysis. In case the contractor or his authorized representative is not present or does not associate himself in the aforesaid operation the results of such tests and consequences thereon shall be binding on the contractor.

57. Materials used on work without prior inspection and testing (where testing is necessary) and without approval of the Engineer-in-Charge are liable to be considered unauthorized, defective and not acceptable. The Engineer-in-Charge shall have full powers to require the removal of any or all of the materials brought to site by contractor which are not in accordance with the contract specifications or do not conform, in character or quality to the samples approved by the Engineer-in-Charge. In case of default on the part of the contractor in removing rejected materials, the Engineer-in-Charge shall be at liberty to have them removed at the risk and cost of the contractor.
58. The contractor shall make his own arrangement of water required for execution of work and get the water tested at his own cost with regard to its suitability for use in the works and get written approval from the Engineer-in-Charge before he proceeds with the use of same for execution of work.
59. The work shall be carried out in such a manner so as not to interfere or adversely affect or disturb other works being executed by other agencies, if any.
60. Any damage done by the contractor to any existing works or work being executed by other agencies shall be made good by him at his own cost.
61. The work shall be carried out in the manner complying in all respects with the requirement of relevant rules and regulations of the local bodies under the jurisdiction of which the work is to be executed and nothing extra shall be paid on this account.
62. For completing the work in time, the contractor may have to work in two or more shifts and no claims whatsoever shall be entertained on this account, notwithstanding the fact that the contractor will have to pay to the labourers and other staff engaged directly or indirectly on the work according to the provisions of the labour regulations and the agreement entered upon and/or extra amount for any other reasons.
63. The contractor shall take all precautions to avoid all accidents by exhibiting necessary caution boards and by providing red flags, red lights and barriers. The contractor shall be responsible for any accident at the site of work and consequences thereof.
- 64. Quality Assurance Manual (Quality Assurance Plan & Checklist for E &M Service).**
- (a) Main contractor/Associate shall submit the required quantity of materials as sample for Testing from Govt. / approved private Laboratory.
  - (b) The decision on testing shall be as per E&M quality checklist of CPWD vide OM No. 51(4)/CE(E)/CSQ/2016/293 (H) dated 31.03.2016 as applicable or as per direction of Engineer in charge and shall be binding on contractor. Contractor shall submit the required size and quantity of samples for the testing.
  - (c) Department shall send the samples to the testing laboratory & the test results shall directly come to department.
65. All the equipment shall be delivered with (i) Manufacturer's test certificate, (ii) Manufacturer's technical catalogues and Installation / Instruction (O&M) manuals. For LED



luminaries, the contractor shall also submit the LM-79 test report of LED luminaries from NABL accredited laboratory.

66. Models of the fittings other than that mentioned in list of preferred make may be accepted provided the performance parameters are at par or higher than the model mentioned therein. Nothing extra shall be paid on this account.
67. Scaffoldings & any other T & P required for execution, testing and commissioning of work shall be arranged by the contractor and is included in the cost of work tendered by the contractor.
68. **Inspection before Dispatch:** All routine tests shall be conducted before dispatch of equipment. No equipment shall be dispatched out from the manufacturer's premises before such tests are conducted and test result recorded. These test certificates shall be given along with the supply of equipment. The Engineer- In-charge shall, if he so desires inspect and witness the pre-delivery tests. For this purpose, the agency shall give 15 days advance notice. Agency shall arrange for inspection of the department. Department shall bear expenses of its officials for inspection as far as travelling, boarding and / lodging is concerned. However, the inspection shall be done at the discretion of the department without any cost implication but **ROUTINE TEST & TYPE TEST Certificates** shall have to be submitted for all the equipment.
69. Prior to dispatch, all equipment shall be adequately protected & insured for the whole period of transit, storage and erection against corrosion and incidental damages etc. from the effect of vermin, sunlight, rain, heat, humid climate and accidents etc.
70. **APPROVAL OF MATERIALS, SHOP FLOOR DRAWINGS AND COMMENCEMENT OF WORK:** The contractor shall submit list of makes & Model numbers of all items of equipment and accessories for each Sub Head of work. Catalogues of the equipment to be supplied. Shop floor drawings of each packages/ Sub work shall be submitted separately for approval. It is the responsibility of the tenderer to get the makes, models and shop floor drawings approved by the department before placing of order.
71. **Insurance:** The agency shall include storage cum erection insurance including third party insurance right from the storage to commissioning and handing over of various equipment. In insurance, the beneficiary shall be Engineer-In-charge at the cost of the agency. All insurance which the agency is required to enter into under the contract shall be affected by any authorized general insurance company and the agency shall produce the policies of insurance. In case of any delay in handing over, the insurance cover will be suitably extended by the contractor at his own cost.
72. **Remedy of failure to insure:** If the agency fails to effect and keep in force the insurance referred to in the preceding sub-clause and in case of unforeseen eventuality of theft/damage etc. to any material, the contractor only shall be held responsible and necessary rectification/replacement has to be done by contractor himself.

- 73. Quality of material and workmanship:** All parts of the equipment shall be of such design, size and material so as to function satisfactorily under all rated conditions of operation. All components of the equipment shall have adequate factor of safety. The work of fabrication and assembly shall conform to sound engineering practice and on the basis of “Fail Safe Design”. The mechanical parts subject to wear and tear shall be easily replaceable type. The construction of the equipment shall be such as to facilitate easy operation, inspection, maintenance and repairs. All connections and contacts shall be designed to minimize risk of accidental short circuits caused by animals, birds and vermin etc. All identical items and their component parts should be completely interchangeable including spare parts.
- 74. Inspection and testing at Factory and site:** The department reserves the right to inspect the equipment and get it tested at factory itself for which the Contractor has to give 15 day's notice for inspection. The travelling cost of Officers will be borne by the Department. The installation shall be subject to necessary inspection during every stage of erection, by the Engineer In-charge or his authorized representative. The successful bidder shall provide all facilities and assistance for the purpose. The completed installation shall be inspected and tested by the Engineer-in charge in the manner as will be laid down by department. All instruments and facilities necessary for the tests shall be provided by the agency.
- 75. QUALITY ASSURANCE:** The Contractor shall make available, on request from the Department, for record, copies of challans, cash memos, receipts and other certificates, if any, vouchers towards the quantity and quality of various materials procured and the same shall be kept in record. These shall also provide information on the name of the manufacturer, manufacturer's product identification, manufacturer's instructions, warning, date of manufacturing and test certificates from manufacturers for the product for each consignment delivered at site, shelf life, if any, for the department to ensure that the material have been procured from the approved source and of the approved quality, as directed by the Engineer-in-Charge.
- 76.** Storage and safe custody of all materials shall be the sole responsibility of the Contractor. Nothing extra shall be payable on this account. This shall include cost of painting of the entire installation. The major equipment's shall be factory final finish painted. The agency shall be required to do only touch up to the damages caused to the painting during transportation, handling & installation at site, if there is no major damage to the painting. However, hangers, supports etc. of bus trunking & cable tray etc. shall be painted with required shade including painting with two coats of anticorrosive primer paint or pressurized paint for touch up of powder coated equipment at site.
- 77.** The scope of works includes the on job technical training of two persons of department at site. Nothing extra shall be payable on this account.
- 78. Interpreting Specifications:** In interpreting the specifications, the following order of decreasing importance shall be followed in case of contradictions:

- i) Nomenclature of items as per Schedule of Quantities
- ii) Special/Additional Conditions
- iii) Particular Specifications
- iv) Architectural/Structural drawings
- v) CPWD Specifications including upto date correction slips.
- vi) CPWD General Conditions of Contract (2023) for Construction works including correction slips issued up to last date of submission of bid including extensions if any.
- vii) Indian Standards Specifications of B.I.S.
- viii) ASTM, BS, or other foreign origin code mentioned in tender document.
- ix) Manufacturer's specifications and as decided by the Engineer-in-Charge.
- x) Sound Engineering practices or well-established local construction practices

**CONSENT LETTER FROM ELIGIBLE ASSOCIATE AGENCY OF MINOR  
COMPONENT OF WORK**

**Name of work:** .

I / We hereby give my consent to associate with M/s....., for  
Executing the minor component of work of .....  
(Mention category).

I / We will execute the work as per specifications and conditions of the agreement and as per  
directions of the Engineer –in-Charge for the corresponding minor work till the completion of  
the work.

I / We will be responsible for necessary action to handover the installations and for rectification  
of defects and repair during the maintenance / warranty period.

Also, I / We will employ full time technically qualified Engineer / supervisor for the minor  
component of the work as required for the work. I / We will attend inspection of officers of the  
department as and when required.

Date:

Signature with date of Major component  
Contractor  
Address

Signature with date of Associate/Minor Component  
Contractor  
Address

Witness with address  
(From major component contractor side)

Witness with address  
(From minor component contractor side)

**PROPOSAL FOR ELIGIBLE ASSOCIATING AGENCIES FOR MINOR  
COMPONENTS OF WORK**

I/we hereby propose the following agencies as mentioned against each for executing corresponding minor components of work. Their consent letters are also attached.

<b>Sl. No</b>	<b>Name of Associated Contractor</b>	<b>Category and class of registration</b>	<b>Enlistment copy / Completion Certificates attached</b>	<b>Monetary Limit of work</b>	<b>Validity of registration</b>	<b>Consent Letter Attached (Yes/No)</b>
1)						

**Note:** Self-Attested photocopies of enlistment order, valid electrical contractor license, work experience certificates of each agency for each component of E&M work shall be submitted.

Signature of contractor

**AFFIDAVIT OF MEMORANDUM OF UNDERSTANDING (MOU)**

(to be submitted for each and every E&M component)

M/s. (Name of the firm with full address) .....Enlistment Status (Valid Upto)  
.....(Henceforth called the main Contractor)

M/s. (Name of the firm with full address)..... Enlistment Status (Valid  
Upto).....(Henceforth called Associated Contractor)

For the execution of E &M component Works

**Name of work:** .....

We state that M.O.U between us will be treated as an agreement and has legality as per Indian Contract Act (amended up to date) and the department (CCU) can enforce all the terms and conditions of the agreement for execution of the above work. Both of us shall be responsible for the execution of work as per the agreement to the extent this MOU allows. Both the parties shall be paid consequent to the execution as per agreement to the extent this MOU permits. In case of any dispute, either of us will go for mediation by the Engineer In charge. Any of us may appeal against the mediation to the Chief Engineer, ..... His decision shall be final and binding on both of us.

We have agreed as under:

The Associated Contractor will execute all E & M works in the wholesome manner as per terms and conditions of the agreement.

The Associated Contractor shall be liable for disciplinary action if he fails to discharge the action(s) and other legal action as per agreement.

All the machinery and equipments, tools and tackles required for execution of the E & M works, as per agreement, shall be the responsibility of the Associated Contractor.

The site staff required for the E & M work shall be arranged by the Associated Contractor as per terms and conditions of the agreement.

SIGNATURE OF MAIN CONTRACTOR

Date:

Place:

SIGNATURE OF ASSOCIATED CONTRACTOR

Date :

Place:

Witness with address

(From major component contractor side)

Witness with address

(From minor component contractor side)

**UNDERTAKING LETTER FROM MANUFACTIRERES OF LED FITTINGS  
(ON THEIR LETTER HEAD)**

We hereby agree that:

1. All the LED fittings supplied by us are guaranteed for five years including drivers from the date of handing over.
2. In case of discontinuation of model and non-availability of spares, we will replace the fittings with equivalent/ high end model in case of manufacturing defect during the warranty period of 5 years.

For M/S .....,

.....

(Authorized signatory of manufacturer of LED luminaries)

Counter Signature,

Major contractor



## **LIST OF PREFERRED MAKES OF MATERIALS**

SL. NO.	ITEMS	MAKES
	<b>ELECTRICAL INSTALLATIONS &amp; GENERAL</b>	
1	WIRES AND CABLES a) PVC INSULATED FRLS COPPER CONDUCTOR SINGLE CORE CABLE b) 1.1 KV GRADE XLPE POWER CABLE AND CONTROL CABLE c) FIRE SURVIVAL CABLE d) 11 KV GRADE XLPE POWER CABLE e) COMMUNICATION CABLE	POLYCAB/ KEI/ HAVELLS/ RR KABEL/ FINOLEX
2	a) MS/ PVC CONDUIT AND ITS ACCESSORIES b) GI PERFORATED CABLE TRAY c) GI RACEWAY	AKG / BEC / NIC / PRECISION
3	MODULAR SWITCH & SOCKET	MK -ORNA / HAVELLS (CRABTREE MURANO) / SCHNEIDER LIVIA OR MILUZ LARA
4	ANCHOR FASTENER	HILTI/ 3M/ FISCHER
5	CABLE LUGS AND BRASS GLAND	GRIPWEL / DOWELL/ COMET
6	a) CAT-6 UTP b) CAT-6A, UTP c) UTP PATCH CORD d) FIBRE OPTICS CABLE	PANDUIT/ BELDEN / 3C3 / DERWISER
7	JACK PANEL	BELDEN/ CORNING/ SYSTIMAX/ PANDUIT PAN NET
8	UPVC / HDPE PIPE/DWC	DURALINE/ REX/ TIRUPATI
9	RACK FOR ALL (EPABX / AUDIO VIDEO / CCTV etc.)	PANDUIT/ APC INDIA / 3C3 / IMPULSE / NEXXUX / BELDEN
10	PAINT, PRIMER	ASIAN PAINT/ NEROLAC / BERGER/ ICICI
11	MS PIPE, GI PIPE	SAIL/ TATA/ JINDAL (HISSAR)/JINDAL STAR
12	SERVER / DESKTOP	DELL / HP/ IBM / LENOVO / PANASONIC
13	WI- FI SYSTEM & NETWORK SWITCHES	CISCO/ JUNIPER/ NEXXUUS / NETGEAR
14	STRUCTURAL STEEL	TATA/ SAIL/ JINDAL HISSAR / APL-APOLLO
15	WATER SUPPLY, STP, DRAINAGE, SUBMERSIBLE PUMPS	KIRLOSKAR /KSB/ GRUNDFOSS/ WILO/ XYLEM/ ARMSTRONG/LUVI
16	MCCB	SCHNEIDER – COMPACT NSX/ L&T DU/ ABB TMAX
17	MCB/ RCCB/ ISOLATOR	SCHNEIDER - ACTI9/ HAGER-H3/ SIEMENS BETA GUARD 10KA/ ABB SB200M
18	MCB DB	HAGER (H3) / SIEMENS (BETAGARD) /SCHNEIDER (ACTI-9)/ABB (ITUS)
19	MAIN LT PANEL/ SUB LT PANELS/ CAPACITOR PANEL/ SYNCHRONIZING	NEPTUNE/ ADVANCE PANELS & SWITCHGEAR (P) LTD / PRECISION SYSTEM CONTROL/ ADLEC

	PANEL WITH ACCESSORIES/ STARTER PANEL	
20	BUS DUCT, AIR INSULATED COMPACT RISING MAINS, END FEED UNIT, TAP-OFF BOX (PLUG-IN TYPE)	SCHNEIDER ELECTRIC/ LEGRAND / L&T/RR
21	HT, LT JOINTING KIT & TERMINATION KIT	REYCHEM / 3M / ABB
22	SOFT STARTERS	SIEMENS/ SCHNEIDER/ ABB / L&T
23	CT, PT	ADVANCE / KAPPA / AE
	<b><u>LIGHTING, FIXTURES &amp; FANS</u></b>	
1	CEILING FAN / EXHAUST FAN / KITCHEN FRESH AIR/ WALL FAN	HAVELLS/ CROMPTON/ USHA/ ORIENT
2	A) LED INDOOR LUMINAIRES B) LED DECORATIVE LIGHT LUMINAIRES C) LED STREET LIGHT D) BOLLARDS & OUTDOOR FITTINGS	PHILIPS/ REGENT/ LIGHTING TECHNOLOGY
3	MS DECORATIVE POLE	PHILIPS/ BAJAJ / HILITE/ TWINKLE LUXMAX/ HAVELLS/ LUSTER
4	POLYCARBONATE JUNCTION BOX WITH CONNECTOR	HENSEL / RITTAL/ SCHNIEDER
5	SENSORS & TIMER FOR LIGHT CONTROL	PHILIPS / HONEYWELL / SCHNEIDER ELECTRIC / HAVELLS

# **SCHEDULE OF QUANTITY FOR ELECTRICAL WORK**

## SCHEDULE OF QUANTITY (E&M WORK)

**Name of work: (A) Renovation of G.I Profile sheets and false ceiling of the 6 rooms for admin office & Scientific staff of BGIR, Noida. (SH:- Electrical works)**  
**(B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR Campus, Noida, Uttar Pradesh. (SH:- Electrical works)**

S. No.	Description of Items	Qty.	Unit	Rate	Amount
1	Wiring for light point/ fan point/ exhaust fan point/ call bell point with 1.5 sq.mm FRLS PVC insulated copper conductor single core cable in surface / recessed medium class PVC conduit, with modular switch, modular plate, suitable GI box and earthing the point with 1.5 sq.mm. FRLS PVC insulated copper conductor single core cable etc as required.				
a)	Group C	41	Point	1704.00	69864.00
2	Wiring for group controlled (looped) light point/fan point/exhaust fan point/ call bell point (without independent switch etc.) with 1.5 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed PVC conduit, and earthing the point with 1.5 sq. mm FRLS PVC insulated copper conductor single core cable etc. as required.				
a)	Group C	12	Point	994.00	11928.00
3	Wiring for light/ power plug with 2X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed medium class PVC conduit along with 1 No 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	240	Metre	373.00	89520.00
4	Wiring for light/ power plug with 4X4 sq. mm FRLS PVC insulated copper conductor single core cable in surface/ recessed medium class PVC conduit along with 2 Nos 4 sq. mm FRLS PVC insulated copper conductor single core cable for loop earthing as required.	70	Metre	587.00	41090.00
5	Wiring for circuit/ submain wiring along with earth wire with the following sizes of FRLS PVC insulated copper conductor, single core cable in surface/ recessed medium class PVC conduit as required				
a)	2 X 1.5 sq. mm + 1 X 1.5 sq. mm earth wire	140	Metre	267.00	37380.00
6	Supplying and drawing following sizes of FRLS PVC insulated copper conductor, single core cable in the existing surface/ recessed steel/ PVC conduit as required.				
a)	6 x 1.5 sq. mm	70.00	Metre	195.00	13650.00
B)	6 x 4 sq. mm	50.00	Metre	424.00	21200.00

7	Supplying and fixing of following sizes of medium class PVC conduit along with accessories in surface/recess including cutting the wall and making good the same in case of recessed conduit as required.				
a)	25 mm	190	Metre	168.00	31920.00
8	Supplying and fixing following size/ modules, GI box alongwith modular base & cover plate for modular switches in recess etc. as required.				
a)	3 module	6	Each	384.00	2304.00
b)	8 Module (Horizontal type)	12	Each	517.00	6204.00
9	Supplying and fixing following modular switch/ socket on the existing modular plate & switch box including connections but excluding modular plate etc. as required.				
a)	15/16 amp switch	12	Each	176.00	2112.00
b)	3 pin 5/6 amp socket outlet	36	Each	136.00	4896.00
c)	Bell push	6	Each	159.00	954.00
d)	RJ-45 internet socket outlet with shutter	12	Each	478.00	5736.00
10	Supplying and fixing modular blanking plate on the existing modular plate & switch box excluding modular plate as required.	20	Each	47.00	940.00
11	Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 6 pin 5/6 & 15/16 A modular socket outlet and 15/16 A modular switch, connections etc. as required.	16	Each	659.00	10544.00
12	Supplying, drawing, Installation, Testing and commissioning of Cat6A UTP 4 pair, 23 AWG solid copper cable in existing conduit/ on surface, U/FTP, LSZH, Non-Plenum, Horizontal (solid) Cable suitable for high speed data networking application supporting upto 10Gbps over a 100 meter channel. The 4 Unshielded Twisted Pairs (UTP) cable with color coded insulation for easy identification should have FLAME PROPERTIES i.e. Flammability Test - IEC 60332-1, Smoke Density - IEC 61034, LSZH standards compliance: ANSI/TIA- 568 C.2, ISO/IEC 11801, IEEE 802.3an, RoHS. Delay Skew should be < 45NS. The outer Cable Diameter should be 7.5 + 2 mm. Cable should have been tested and verified by UL/ ETL.				
a)	1 run of cable	75	Metre	74.00	5550.00
b)	2 run of cable	30	Metre	124.00	3720.00
13	Supplying and fixing suitable size GI box with modular plate and cover in front on surface or in recess, including providing and fixing 2 Nos. 3 pin 5/6 A modular socket outlet and 2 Nos. 5/6 A modular switch, connections etc. as required. (For light plugs to be used in non residential buildings).	6	Each	874.00	5244.00

14	Supplying & fixing suitable size GI box with modular plate and cover in front on surface or in recess including providing and fixing 25 A modular socket outlet and 25 A modular SP MCB, "C" curve including connections, painting etc. as required.	6	Each	807.00	4842.00
15	Supplying and fixing following way, single pole and neutral, sheet steel, MCB distribution board, 240 volts, on surface/ recess, complete with tinned copper bus bar, neutral bus bar, earth bar, din bar, interconnections, powder painted including earthing etc. as required. (But without MCB/RCCB/Isolator				
a)	8 way, Double door	1	Each	2773.00	2773.00
16	Supplying and fixing following way, horizontal type three pole and neutral, sheet steel, MCB distribution board, 415 volts, on surface/ recess, complete with tinned copper bus bar, neutral bus bar, earth bar, din bar, interconnections, powder painted including earthing etc. as required. (But without MCB/RCCB/Isolator)				
a)	6 way (4 + 18), Double door	2	Each	5299.00	10598.00
17	Supplying and fixing Cable End Box (Loose wire box)(IP 43) suitable for following triple pole and neutral, sheet steel, MCB distribution board, 415 V, on surface/ recess, complete with testing and commissioning etc. as required.				
a)	For 6 way, Double door TPN MCBDB	2	Each	1223.00	2446.00
18	Supplying and fixing 5 A to 32 A rating, 240/415 V, 10 kA, "C" curve, miniature circuit breaker suitable for inductive load of following poles in the existing MCB DB complete with connections, testing and commissioning etc. as required.				
a)	Single pole	54	Each	285.00	15390.00
19	Supplying and fixing following rating, double pole, 240 volts, isolator in the existing MCB DB complete with connections, testing and commissioning etc. as required.				
a)	40 A	1	Each	472.00	472.00
20	Supplying and fixing following rating, four pole, 415 V, isolator/ MCB in the existing MCB DB complete with connections, testing and commissioning etc. as required.				
a)	63 A	1	Each	1115.00	1115.00
b)	100 A	1	Each	1317.00	1317.00
21	Earthing with G.I. earth pipe 4.5 metre long, 40 mm dia including accessories, and providing masonry enclosure with cover plate having locking arrangement and watering pipe etc. with charcoal/ coke and salt as required.	2.00	set	7658.00	15316.00
22	Providing and laying earth connection from earth electrode with 6 SWG dia G.I. Wire in 15 mm dia G.I. pipe from earth electrode including connection with G.I. thimble excavation and re-filling as required.	6.00	Mtr.	313.00	1878.00

23	Providing and fixing 6 SWG dia G.I. wire on surface or in recess for loop earthing as required.	6.00	Mtr.	84.00	504.00
24	<b>Brush Less Direct Current (BLDC) Motor</b> Supply, Installation, Testing and Commissioning of ceiling fan with Brush Less Direct Current (BLDC) Motor, class of insulation: B, 3 nos. metal( Aluminum alloy) blades, 30 cm long down rod, 2 nos. canopies, shackle kit, safety rope, copper winding, steel/Al bodyPower Factor not less than 0.9, Service Value (CM/M/W) minimum as below, 350 RPM (tolerance as per IS : 374-2019), THD (Total Harmonic Distortion) less than 10%, remote (prefreably mobile app based) for speed control and all remaining accessories including safety pin, nut bolts, washers, temperature rise=75 degree C (max.), insulation resistance more than 2 mega ohm, suitable for 230 V, 50 Hz, single phase AC Ceiling Fan compliant to IS 374:2019 fan Supply, earthing etc. complete as req.				
a)	1200mm, service value $\geq 6.0$ CM/Min/Watt, air delivery 210 CM/Min (Minimum)	3.00	Each	2882.00	8646.00
25	<b>LED Panel light 2x2 ft. (System lumen efficacy <math>\geq 105</math> &lt;120 lm/Watt)</b> Supplying, installation, Testing & Commissioning of Panel light 2x2 ft., of following body material and construction as per IS : 10322 with driver as per the requirement with Driver efficiency >85%, Operating voltage AC 140-270 Volt, freq 50/60 hz, Operating temp range -5 deg to 40 deg centigrade, internal surge protection of 2.5 KV with Short & Open circuit protection, THD < 10% , P. F. $\geq 0.95$ , IP20, CRI >80, UGR (Unified Glare Rating) < 19, Flicker free, (flicker should be below 5 %), life time (LED,Driver & electrical circuitary), of minimum 50000 Burning Hours with, 70% of initial Lumen maintained till life ends as per LM80 extrapolation IES TM-21-11 report, CCT 3000°K/ 4000°K/ 5700°K /6500°K (As per ANSI Bin), SDCM(Standard Deviation Color Matching) <3, Maximum power consumption should not more than the specified rating and Fixture shall be of relevant BIS standard and trade mark certificate ( T.C.). Manufactures Word Mark/ Name Engraved/ Embossing/ Screen printing on housing. complete in all respect i/c external connections with 1.5 sq mm FRLS/HFFR, PVC insulated copper conductor single core cable and earthing etc. as required with Minimum 5 year OEM warranty. System lumen efficacy $\geq 105$ <120 lm/Watt output . LM79 & LM80 Test report and all testing required for LED fixtures as per BIS shall be submitted. Shape size and CCT shall be as approved by Engineer-in-Charge as per requirement. (Thermal management: heat sink of aluminium housing such that LED junction temperature shall not rise above 90°C). Powder coated die cast /Extruded aluminium Body (Thickness > 1.20 mm)				

(a)	36 watt	24	Each	2508.00	60192.00
26	<p><b>LED Down lighter (COB Type) (System lumen efficacy <math>\geq 105 &lt; 120</math> lm/Watt)</b></p> <p>Supplying, installation, Testing &amp; Commissioning of LED Recessed/ surface Down lighter (Round/ square/ Rectangular) COB Type of following body material and construction as per IS : 10322 with driver as per the requirement with Driver efficiency <math>&gt; 85\%</math>, Operating voltage AC 140-270 Volt, frequency 50/60 hz, Operating temp range -5 deg to 40 deg centigrade, internal surge protection of 2.5 KV with Short &amp; Open circuit protection ,THD <math>&lt; 10\%</math> , P. F.<math>\geq 0.95</math>, IP20, CRI <math>&gt; 80</math> , UGR (Unified Glare Rating) <math>&lt; 19</math>, Flicker free (flicker should be below 5%), life time (LED,Driver &amp; electrical circuitary), of minimum 50000 Burning Hours with 70% of initial Lumen maintained till life ends , CCT 3000°K / 4000°K / 5700°K / 6500°K (As per ANSI Bin), SDCM (Standard Deviation Color Matching) <math>&lt; 3</math>, Maximum power consumption should not more than the specified rating and Fixture shall be confirming to relevant BIS standards and trade mark certificate (T.C.). Manufactures Word Mark/ Name Engraved/ Embossing/ Screen printing on housing Complete in all respect i/c external connections with 1.5 sq mm FRLS/HFFR, PVC insulated copper conductor single core cable and earthing etc. as required with Minimum 5 year OEM warranty. System lumen efficacy <math>\geq 105</math> and <math>&lt; 120</math> lm/Watt output . LM79 &amp; LM80 Test report and all testing required for LED fixtures as per BIS shall be submitted. Shape size and CCT shall be as approved by Engineer-in-Charge as per requirement. (Thermal management: heat sink of aluminium housing such that LED junction temperature shall not rise above 90°C) Powder coated die cast /Extruded aluminium Body including trim with Aluminium Reflector</p>				
a)	8 - 10 watt	5	Each	878.00	4390.00
27	<p><b>LED Down lighter (SMD Type) (System lumen efficacy <math>\geq 105 &lt; 120</math> lm/Watt )</b>Supplying, installation, Testing &amp; Commissioning of LED Recessed/ surface Down lighter (Round/ square/ Rectangular) SMD type of following body material with PMMA and prismatic diffuser and construction as per IS : 10322 with driver as per the requirement with Driver efficiency <math>&gt; 85\%</math>, Operating voltage AC 140-270 Volt, frequency 50/60 hz, Operating temp range -15 deg to 40 deg centigrade, internal surge protection of 2.5 KV with Short &amp; Open circuit protection ,THD <math>&lt; 10\%</math> , P. F.<math>\geq 0.95</math>, IP20, CRI <math>&gt; 80</math> , UGR (Unified Glare Rating) <math>&lt; 19</math>, Flicker free (flicker should be below 5%), life time (LED,Driver &amp; electrical circuitary), of minimum 50000 Burning</p>	4	Each	715.00	2860.00



	Hours with 70% of initial Lumen maintained till life ends , CCT 3000°K / 4000°K / 5700°K / 6000°K / 6500°K (As per ANSI Bin), SDCM (Standard Deviation Color Matching) <3, Maximum power consumption should not more than the specified rating and Fixture shall be confirming to relevant BIS standards and trade mark certificate (T.C.). Manufactures Word Mark/ Name Engraved/ Embossing/ Screen printing on housing Complete in all respect i/c connections with 1.5 sq mm FRLS, PVC insulated copper conductor single core cable and earthing etc. as required with Minimum 5 year OEM warranty. System lumen efficacy $\geq 105$ and <120 lm/Watt output . LM79 & LM80 Test report from NABL lab for all testing required for LED fixtures as per BIS shall be submitted. Shape size and CCT shall be as approved by Engineer-in-Charge as per requirement.(Thermal management: heat sink of aluminum housing such that LED junction temperature shall not rise above 90°C)(a) 12 -15 watt				
28	Supply, Installation, Testing and Commissioning of Pressure die cast housing LED bulkhead with IP65/66 protection suitable for surface and wall maunting application. with min. 1000 lumens output, Efficacy not less than 100 lm/watt, PF>0.90 , CRI>=80, 5700/6500K CCT and Min. service life of 50000 Hrs @ L70B50 including connections with 1.5 Sqm FRLS PVC insulated copper conductor single core cable, earthing etc. as required, with 5 years on site warranty	14	Each	1968.00	27552.00
29	Supply and fixing of following size Wall Mount Rack having Fixed Structure with 0.8mm CRCA Sheet, completely knocked-down condition (CKD) Shape, Vertical Mounting Rail 1.6 mm with 'U'Marking, Minimum 2 cable entry/exit provision at Top and bottom with rubber protection, Front 5mm Toughened Glass with lock, wall mounting kit, Powder coated Color- RAL- 7035, complied with UL & RoHS, 2 x 6 sockets 16A power distribution units, 3 numbers closed cable organizer, Hardware mounting screws packet of 20 x 1 number, etc. complete as required.				
a	6U Rack	1.00	nos.	6870.00	6870.00

30	Supplying & Fixing of UTP Jack Panel, fully loaded with 24 nos UTP ports IO Jacks (RJ45, TIA-568C Category-6, Shall have integrated bonding bar or other mechanism for grounding, Shall be loaded with individually replaceable 24 nos. Category-6 certification by Jacks complying with TIA-568.C.2 , Shall be having a 6 port module construction for better cable dressing at the rear, the jacks shall have RJ-45 type connector with bend limiting and strain relief boot for securing IDC contacts from external forces and for maintaining the bend radius of the cable complete in all respect. (D-Link or equivalent in Commscope, Molex)	1.00	nos.	6169.00	6169.00
31	SITC of outdoor type double door feeder pillar of appropriate size 415V 3 Phase 50 Hz AC supply duly compartmentalised, front & back openable type door with locking arrangement having canopy and depth not less than 350 mm depth, IP 66 protection, made out of 2 mm thick CRCA sheet duly powder coated paint with approved colour suitable to accomodate the following switch gears and accessories, provided with suitable capacity of 4 strip aluminium bus bar duly electrolytic grade sleeved, and providing apron plate of 16SWG MS sheet on all sides, earthing stud, detachable gland plate, connection, inter-connection including supplying and mounting of following switch gears and accessories etc as required. (Note:- the drawing of the feeder pillar approved by the department and 2 nos 25mm X 5mm aluminium strip to be provided at rear end of panel)				
	<b>INCOMER:</b>				
a)	200A, FP 25KA MCCB with Thermal magnetic release				
b)	Digital flush pattern type voltmeter (0-500 Volt) with built in selector switch - 1 Set.				
c)	Digital flush pattern type ammeter (0-200 Amp), with built in selector switch and one set of 3 Nos. CTs of ratio 200/5A Class I accuracy and 15VA burden - 1 Set.				
d)	3 Nos. phase indication LED lamps with 2 Amp SP MCB protection etc - 1 Set.				
e)	Angle iron frame with 4 no. legs of 60 cm length made out of 50mm X 50mm X 5mm MS angle 30 cm legs shall be grouted in CC foundation 1:3:6 (1: Cement : Concrete: Core Sand) and providing apron plate of 16SWG MS sheet on all sides				
	<b>BUS BAR</b>				
a)	TPN Aluminium bus bar with heat Shrink Sleeve rated for 250A.				
	<b>OUTGOING</b>				
a)	100A, FP 25KA MCCB with Thermal magnetic releases - 2 nos				

b)	63A, FP 25KA MCCB with Thermal magnetic releases - 3 nos				
c)	40A SPN MCBs- 2 nos.				
	(All MCCB's must be Ics = Icu = 100%)	1.00	set	118560.00	118560.00
32	Supplying of one number XLPE insulated stranded aluminum conductor, armoured, power cable of 1.1 KV grade conforming to IS:7098, Part-1, of following size as required.				
a)	3.5 x 95 sqmm	50.00	mtr	1000.00	50000.00
b)	3.5 x 70 sqmm	40.00	mtr	797.00	31880.00
c)	3.5 x 50 sqmm	40.00	mtr	592.00	23680.00
33	Supplying, Installation, Testing and Commissioning metallic body exhaust Fan of 300mm, 1400 rpm suitable for operation at single phase 230 V 50Hz supply complete etc. as required at site.	4	Each	2893.00	11572.00
34	Supplying, installation, testing and commissioning of 400 mm sweep wall fan with silent operation and 1350 rpm , complete with all respect, including wiring with 1.5 sq. mm FRLS PVC insulated, copper conductor, single core cable i/c providing suitable clamp for hanging on wall as per site required etc. complete as required. (Havells : Platina White, Bajaj : Esteem, Orient)	4.00	Nos.	3012.00	12048.00
35	Supplying and laying of following size DWC HDPE pipe ISI marked along with all accessories like socket, bend, couplers etc. conforming to IS 14930, Part II complete with fitting and cutting, jointing etc.direct in ground (75 cm below ground level) including excavation and refilling the trench but excluding sand cushioning and protective covering etc., complete as required.				
a)	63 mm dia (OD-63 mm & ID-51 mm nominal)	40.00	mtr	289.00	11560.00
b)	90 mm dia (OD-90 mm & ID-76 mm nominal)	60.00	mtr	334.00	20040.00
36	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing RCC/ HUME/ METAL pipe as required.				
a)	Above 35 sq. mm and upto 95 sq. mm	40.00	mtr	72.00	2880.00
b)	Above 95 sq. mm and upto 185 sq. mm	60.00	mtr	97.00	5820.00
37	Laying of one number PVC insulated and PVC sheathed / XLPE power cable of 1.1 KV grade of following size in the existing masonry open duct as required.				
a)	Above 35 sq. mm and upto 95 sq. mm	20.00	mtr	58.00	1160.00
b)	Above 95 sq. mm and upto 185 sq. mm	10.00	mtr	80.00	800.00
38	Providing and fixing 6 SWG dia G.I. wire on surface or in recess for loop earthing along with existing surface/ recessed conduit/ submain wiring/ cable as required.	260.00	mtr	50.00	13000.00

39	Supplying and making end termination with brass compression gland and aluminium lugs for following size of PVC insulated and PVC sheathed / XLPE aluminium conductor cable of 1.1 KV grade as required.				
a)	3½ X 95 sq. mm (45mm)	2.00	set	684.00	1368.00
b)	3.5 x 70 sqmm	2.00	set	542.00	1084.00
c)	3.5 x 50 sqmm	2.00	set	484.00	968.00
<b>Total</b>					<b>844506.00</b>

CIVIL CONSTRUCTION UNIT					
N.I.T. No: 10/e-NIT/EE/CED-I/CCU/2025-26					
<b>Name of work:</b> (A) Renovation of the G.I. profile sheets of roof and false ceiling of the 6 Nos. office rooms and 2 Nos. meeting halls of BGIR (U.P.). (B) Renovation of Office Toilets and supply of potable water from old office to admin block in BGIR campus, Noida, Uttar Pradesh. (SH: - Civil & Electrical Works)					
SCHEDULE OF QUANTITY					
Name of the Contractor					
Sl. No.	Name of component	Estimated cost (Rs.)	Percentage above or below the estimated cost	% in Figures	Total Cost (Rs.)
1	2	3	4	5	6
1	Civil + Electrical Works	25,99,272/-	*	*	*
	<b>Total</b>	<b>25,99,272/-</b>			

\*- To be filled online in bid document.

- 1) The Column Nos. 4 & 5 are mandatory to be filled by the bidders / tenderers. If these columns are left blank, the tender become invalid.
- 2) The amount in figures in column No.6 shall appear automatically corresponding to the percentage quoted in column No.4 & 5.
- 3) The tenderer is required to quote the percentage only above or below or at par with the estimated cost to cover all the rates of item covered under the respective packages.
- 4) The percentage shall be written in 2 (two) places of decimal.
- 5) If the percentage selection in column No 4 is "At Par", by default the percentage will be considered as "Zero" only. In other words, if "At par" is selected in column No.4, then no need to fill column No.5