

**INSTITUTE WORKS DEPARTMENT
INDIAN INSTITUTE OF TECHNOLOGY ROORKEE**

TENDER DOCUMENT

For

**“Maintenance of Horticulture and New Landscaping works at IIT Roorkee
Campus.”**



**Indian Institute of Technology Roorkee
Roorkee-247667, Tel. No. 01332-285197/4586**

**INSTITUTE WORKS DEPARTMENT
INDIAN INSTITUTE OF TECHNOLOGY
ROORKEE**

No. IWD/I.A./Tender/97

Dated: 05.05.2025

NOTICE INVITING TENDER (NIT)

1. General

(e-Tender)

Name of Work: On behalf of BOG, IIT Roorkee invites open **Percentage Rate E-Tenders** in **Two Bid system** (1. Technical 2. financial) from contractors of appropriate class & category registered with CPWD, State PWD (Buildings), MES, having experience of working in Central/State Government, Public Sector undertaking/Autonomous Organization of the Central/State Government and working Contractors of IITR for Renovation/Maintenance/Landscaping of Horticulture etc. for the work detailed below:

Name of the Work	Estimated Cost
Maintenance of Horticulture and Landscaping works at IIT Roorkee Campus	14.85 Lacs

2. Critical Data sheet :

Completion period of the Work	365 Days (01 Year)
Tender Type (Open/Limited/EOI/Auction/Single)	Open
Tender Category (Services/Goods/Works)	Works
Type/Form of Contract (Work/Supply/ Auction/ Service/ Buy/ Empanelment/ Sell)	Work Contract
Product Category (Civil Works/Electrical Works / Fleet Management / Computer Systems)	Horticulture Works
Tender document publish date	08.05.2025 (18:00 Hrs)
Tender Document available for sale on website	08.05.2025 (18:00 Hrs) Tender document can only be of tender on website https://eprocure.gov.in/eprocure/app .
Start Date of Seeking Clarification	Nil
Last Date of Seeking Clarification	Nil
Pre Bid Meeting Date	Nil
Bid Submission Start Date	20.05.2025 (15:00 Hrs)
Bid Submission End Date	29.05.2025(15:00 Hrs)
Date & Time of opening of Tender (Technical Bid)	30.05.2025 (15:30 Hrs)
Date & Time of opening of Financial Bid (online)	Will be informed later on after the evaluation of Technical Bids (Only to the bidders who will successfully qualify the Technical Evaluation)
Validity of tender	90 days from the date of opening of financial bids.
Price Bid	To be uploaded only on CPP Portal (http://eprocure.gov.in/eprocure/app) in excel sheet
Tender Fee	Tender fee of Rs.1180.00 (18% GST included) Non-refundable to be submitted in shape of DD in favour of Registrar, IIT Roorkee payable at Roorkee. Scanned copy of DD to be uploaded in Cover-1 and original Copy of the same should reach the following address in a proper sealed envelope on and before the last date and time of bid submission. Contract Cell Institute Works Department James Thomsan Building (Main Building) IIT Roorkee, Roorkee Haridwar Uttarakhand:-247667 (for further information refer to point no. 13 of page no. 08 of Tender doc).

Earnest Money Deposit (EMD)	<p>Earnest Money Deposit of Rs. 30000.00 (Thirty Thousand only) EMD can be submitted in the form of Bankers Cheque / DD / FDR in the name of Institute Architect, IIT Roorkee. Scanned copy of Bankers Cheque / DD / FDR to be uploaded in Cover-1 and original Copy of the same should reach the following address in a proper sealed envelope on and before the last date and time of bid submission. :-</p> <p>Contract Cell Institute Works Department James Thomason Building (Main Building) IIT Roorkee, Roorkee Haridwar Uttarakhand-247667. (for further information refer to point no. 13 of page no. 08 of Tender doc).</p>
Performance Guarantee (5%)	5% of awarded value in form of Bankers Cheque / DD / FDR / in the name of Institute Architect, IIT Roorkee after issue of Letter of Intent (LOA).
Security Deposit (5%)	5% of awarded value shall be submitted in the form of Bankers Cheque / DD / FDR / Bank Guarantee in the name of Institute Architect, IIT Roorkee after issue of Letter of Acceptance (LOA).
Authority and place for submission of tender fee & Earnest Money Deposit (EMD), required documents (if any) and seeking clarifications on tender documents	Institute Architect, Institute Works Department, James Thomason Building, IIT Roorkee, Roorkee-247667 (India), Tel. No. 01332-285197
Email Address	ia@iitr.ac.in

3. Eligibility Criteria for submission of bid documents:

- a. Intending bidder should not be a joint venture (Copy of relevant documents clearly establishing the status of bidder to be submit in Technical Bid).

4. Experience of working in Central/State Government, Public Sector undertaking/Autonomous Organization of the Central/State Government and working Contractors of IITR shall only be accepted.

- a. **Experience of having successfully completed similar work individually costing not less than as stated below during the last 7 years ending previous day of last date of submission of bids.**

(i) Three similar works, each of value not less than 40% of the estimated cost,
OR

(ii) Two similar works, each of value not less than 60% of the estimated cost,
OR

(iii) One similar works of value not less than 80% of the estimated cost,

Completion certificate issued by Competent Authority will only be considered. Competent Authority means officer of not below the Rank of Executive Engineer/ Equivalent would be acceptable.

The value of executed works shall be brought to current costing level by enhancing the actual value of work at simple rate of 7% per annum, calculated from the date of completion to last date of receipt of applications for this tender. (Copy of work completion certificate to be uploaded as proof of eligibility criteria in Cover-1)

b. Similar works mean:- Maintenance of Horticulture and Landscaping works.

1. **Turnover:** The Average Annual Turnover CA Certificate preferably with UDIN should be at least **50%** of estimated cost during the immediate last 3 consecutive Financial Years (2021-22, 2022-23, 2023-24) –balance sheet duly audited by Chartered Accountant. (Scanned copy of Certificate from CA preferably with UDIN Number to be uploaded). The year in which no turnover is shown would also be considered for working out the average.
2. Institute reserves the right to cancel any or all tenders without assigning any reason.

3. No exemption in tender fee and EMD shall be applicable for firms registered under MSE/NSIC/Udyog Aadhaar for works other than services. Therefore, all the bidders are required to submit the EMD and Tender fee as mentioned in Tender documents.

List of Documents to be scanned and uploaded under Cover-1 on e-tendering website to the last date and time mentioned in Critical data sheet:

Note: Physical submission of their documents is not required at the time of uploading of tender by bidders, However these documents should be submitted by bidder if asked by the institute subsequently for verification of documents

- 1) E.M.D. as stated above. (Submitted with Technical Bid)
- 2) Tender Form Fee (Submitted with Technical Bid)
- 3) Copy of Registration/ Enlistment letter of the firm/company/agency (if any).
- 4) Copy of valid PAN Card.
- 5) Copy of valid GST No.
- 6) The Average Annual Turnover CA Certificate preferably with UDIN should be at least 50% of estimated cost during the immediate last 3 consecutive Financial Years (2021-22, 2022-23, 2023-24).
- 7) Notarized Undertaking as per the tender document.
- 8) Experience Certificate of similar work of Govt. Offices/ Semi-Govt./ State Govt./ IITs/ PSUs / Autonomous Organizations of the Central/State Government.
- 9) Any other document as may be necessary in connection with the job tendered for, including certificate.
- 10) Bank Solvency certificate: Bidder should have to submit a solvency certificate of the amount equal to 40% of the tender cost of the work issued by a scheduled bank, clearly mentioning the validity or should not be more than One year old from last date of submission of bid.

List of Documents to be uploaded up to the last date and time mentioned above in Cover-2 (Financial Bid):

- a. Duly filled in priced BOQ.

Kindly note that no physical submission of duly filled in BOQ is required and it is to be uploaded only on e-tendering website.

-Sd/-

**Institute Architect,
IWD, IIT Roorkee.**

Technical Bid Format

QUALIFYING INFORMATION

Please furnish the following information along with documentary evidence possible only in this format (as eligibility criteria).

The information to be filled in by the Bidder in the following pages will be used for purposes of Pre-qualification and to be submit the supporting document's copy.

1.	Name of Bidder	:	
2.	Constitution of legal status of Bidder (In case of firm) Attach copy.	:	
3.	Place of Registration and Registration No.	:	
4.	(a) Year for Establishment of Firm with complete	:	
	(b) Complete Address	:	
	(c) Email I.D.	:	
	(d) Contact Numbers	:	
5.	Principal place of business	:	
6.	Permanent Account Number (PAN) (copy enclosed)	:	
7.	GST Registration No. (Copyenclosed)	:	
9.	Details of EMD	:	
10.	Details of Tender fee (Demand draft)	:	
11.	Work performed as a firm (in the same name) on works of similar natures. Scope of work executed should be as follows:	:	
a.	Working experience of similar nature of works with Govt. Offices/ Semi-Govt./ State Govt./ IITs/ PSUs / Autonomous Organization of the Central/State Government / PSUs & Reputed Private Organization. (proof of work executed to be enclosed)	:	

12. Bidders should submit copy of experience certificate/ proof of work executed as per the scope mentioned at Point no.11 (a) supported by work orders/bills etc.

S.No.	Description of work	Date of Start	Date of Completion	Address/ Location/Name of the Client	Value of work completed done

If required separate sheet may be enclosed.

13. Detail of Works in hand :

S.No.	Description of work	Date of Start	Date of Completion	Address/ Location/Name of the Client	Cost of the work allotted	Cost of the work executed till date

If required separate sheet may be enclosed.

14. Any other information highlighting the qualifying criteria, competency, credential and capability should be enclosed with bid.

Signature of Bidder
with Seal

Information and instructions for bidders

1. Agreement shall be drawn with the successful bidder on prescribed format.
2. The time allowed for carrying out the work will be as per the NIT from the date of start as defined in Award of Work or from the first date of handing over of the site, whichever is later, in accordance with the phasing, if any, indicated in tender documents.
3. The site for the work is available / shall be made available for start of the work.
4. The Tender 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 / downloaded from IIT Roorkee website: <http://eprocure.gov.in/eprocure/app>.
5. 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 Tender. A bidder shall be deemed to have full knowledge of the site whether he inspects it or not and no extra charge consequent upon 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 tender 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 Institute and local conditions and other factors having a bearing on the execution of the work. Cost of site visit shall be borne by the bidder.
6. All tenders 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.
7. Canvassing whether directly or indirectly, in connection with bidders is strictly prohibited and the Tenders submitted by the bidders who resort to canvassing will be liable to rejection.
8. The contractor shall not be permitted to bid for works in the Institute Works Department responsible for award and execution of contracts, in which his near relative is posted in Administrative Institute Supervision Staff or as an officer in any capacity between the grades of Dean, Infrastructure and Assistant 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 officer/employee in the Institute. Any breach of this condition by the contractor would render his bid liable to be rejected and EMD will be forfeited.
9. 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 act as a bidder within a period of one year after his retirement from Government service, without the previous permission of the Government of India in writing. This contract is liable to be cancelled if either the bidder 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 tender or engagement in the bidder's service.
10. The bid for the works shall remain open for acceptance for a period of 90 days from the date of opening of financial bids. If any bidder withdraws his bid before the said period or issue of letter of acceptance, whichever is earlier, or makes any modifications in the terms and conditions of the bid which are not acceptable to the Indian Institute of Technology Roorkee, then Indian Institute of Technology Roorkee, without prejudice to any other right or remedy, be at liberty to forfeit of the said earnest money as aforesaid. Further the bidders shall not be allowed to participate in the re-bidding process of the work.
11. The notice inviting bid shall form part of the contract document. The successful bidder, on acceptance of his bid by the Accepting Authority, have to sign the contract consisting of "The Notice Inviting bid, all the documents including Special Conditions, General Specifications/ Particular Specifications and drawings, if any, forming part of the bid as submitted 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 within 15 days from the stipulated date of start of the work.
12. **Composite Tender(if applicable)**
 - 12.1 The competent authority is calling this bid for the composite work. The Earnest money is fixed with respect to the combined estimated cost put to tender for the composite tender.
 - 12.2 The eligible bidders have to quote rates for all items given in the schedule of quantity.

- 12.3 After acceptance of the bid by competent authority, **Institute Architect, IWD, IIT Roorkee** shall issue letter of acceptance (LOA) on behalf of the Institute. After issue of LOA, the bidder will have to enter into one agreement with **Institute Architect**. Entire work under the scope of composite tender including major and all minor components shall be executed under one agreement.
- 12.4 Security Deposit will be worked out separately for each component corresponding to the quoted/accepted cost of the respective component of works. The Earnest Money will become part of the security deposit of the respective projects under the head Mega projects in ratio of the corresponding estimated value of these projects.
- 12.5 The bidder may associate agency(s) for minor component(s) conforming to eligibility criteria as defined in the tender document and has to submit detail of such agency(s) to Dean Infrastructure. Name of the agency(s) to be associated shall be approved by Dean Infrastructure. Before engaging such associate agencies bidder has to inform to Dean Infrastructure along with his past experience and all credential's and got the approval of the same from him.
- 12.6 In case the bidder intends to change any of the above agency/ agencies during the operation of the contract, he shall obtain prior approval of respective Dean Infrastructure. The new agency/ agencies shall also have to satisfy the laid down eligibility criteria. In case Dean Infrastructure is not satisfied with the performance of any agency, he can direct the bidder to change the agency and this shall be binding on the bidder.
- 12.7 The main bidder has to enter into agreement with bidder(s) associated by him for execution of minor component(s). Copy of such agreement shall be submitted to Engineer-in-charge. In case of change of associate bidder, the main bidder has to enter into agreement with the new bidder associated by him.
- 12.8 The composite work shall be treated as complete when all the components of the work are complete. The completion certificate of the composite work shall be recorded by Engineer-in charge of major component after record of completion certificate of all other components. Final bill of whole work shall be finalized by IWD, IIT Roorkee.
- 12.9 It will be obligatory on the part of the bidder to sign the tender documents for all components before the first payment is released.
- 13. Submission of Tender Fee & EMD.**
1. Original Copy of Tender fee and EMD should reach the address mentioned in critical data sheet in a proper sealed envelope on and before the last date and time of bid submission.
 2. NIT number & Name of the work should be clearly mentioned on the top of the envelope. Also firm's bidder's name with address should be clearly mentioned on the left bottom of the envelope. Bids shall be rejected if NIT number is not mentioned on the Envelope.
 3. Bids shall be considered as **UNRESPONSIVE** and shall be summarily rejected in the case of non-submission of original EMD and Tender fee as per stipulated date & time OR if any discrepancy is found.

**Institute Architect,
IWD, IIT Roorkee.**

A: GENERAL INSTRUCTIONS

1. Scope of Tender.

- 1.1 Indian Institute of Technology Roorkee (referred to as Owner in these documents) invites Tender as defined in these documents and referred to as “the works” detailed in the table given in the Notice Inviting Tenders (NIT).
- 1.2 The successful Bidder shall complete the works within the completion date specified in the Notice Inviting Tenders (NIT).

2. Non-Association / Relation

- 2.1 All bidders shall provide in the bid tender and Qualification Information, a statement that the Bidder is not associated, nor has been associated in the past, directly or indirectly, with the Indian Institute of Technology Roorkee or any other entity that has prepared the design, specifications, and other documents for the Project.

3. Qualification of the Bidder

- 3.1 All Bidders shall provide tender qualification information.
- 3.2 All Bidders shall include the following information by submitting relevant documents and certificate with their tenders: The Bidder must be registered with the GST Department and should submit the registration certificate of GST.

4. Cost of tendering

- 4.1 The Bidder shall bear all costs associated with the preparation and submission of his tender, and the Owner will in no case be responsible and liable for those costs.
- 4.2 The Bidder, at its own responsibility and risk is encouraged to visit and examine the Site of Work and its surroundings and obtain all information that may be necessary for preparing the tender. The costs of visiting the Site shall be at the Bidder's own expense.

B: DOCUMENTS INVITING TENDERS

5. Invitation: Tenders are hereby invited on behalf of BOG Indian Institute of Technology Roorkee.

6. Contents of documents as mentioned in the relevant clauses mentioned:

The Bidder shall be deemed to have examined all instructions, forms, terms, and specifications in the Documents. Failure to furnish the information required in the Tender Document or submission of a Bid not substantially responsive to the Tender Documents in every respect will be at the Bidder's risk and may result in the rejection of the bid.

The several documents forming the contract are to be taken as mutually explanatory of one another, detailed drawings being followed in preference to small scale drawing and figured dimensions in preference to scale and Special Conditions in preference to General Conditions.

In case of any discrepancy between the Schedule of Quantities, the specifications and / or the drawings, given in the tender document the following order of preference shall be observed:

1. Description of Schedule of Quantities.
2. Particular Specification and Special condition, if any.
3. Drawings.
4. C. P. W. D. specifications/ IWD, IIT ROORKEE specification.
5. Latest edition Indian Standard Specifications of B. I. S.

7. Amendment of Tendering Documents

- 7.1 Before the deadline for submission of bids, the Indian Institute of Technology Roorkee may modify the Tender documents by issuing addenda/corrigendum.
- 7.2 Any addendum thus issued shall be part of the Tendering documents and shall be uploaded on e-Tendering website www.eprocure.gov.in and Institute website www.iitr.ac.in.
- 7.3 To give prospective Bidders reasonable time in which to take an addendum / corrigendum into account in preparing their bid, the IIT Roorkee may extend if necessary the deadline for submission of tenders.

C: PREPARATION OF DOCUMENT

- 8. Tender fee :** Tender fee as per critical data sheet in the form of Demand Draft in favour of Registrar, Indian Institute of Technology Roorkee payable at Roorkee must be submitted as mentioned in critical data sheet. Bids not accompanying with Tender fee will be summarily rejected. Tender fee is nonrefundable.
- 9. Earnest Money Deposit (EMD):** EMD as per critical data sheet in the form of a Bankers Cheque /Demand Draft/F.D.R in favour of Institute Architect, Indian Institute of Technology Roorkee payable at Roorkee must be submitted as mentioned in critical data sheet. Bids not accompanying with EMD will be summarily rejected. The EMD of the unsuccessful Bidders will be discharged / returned within Thirty (30) days from the date of opening of the financial bids. The EMD of the successful Bidder shall not be converted as Security deposit. The EMD may be forfeited, if the Bidder withdraws his bid during the validity period of the bid or in case of a successful Bidder, if the Bidder fails to sign the contract.
- 10. Period of validity of bids:** The bids shall remain valid for a period of 90 days from the date of opening of financial bids. A bid valid for a shorter period shall be rejected by the Indian Institute of Technology Roorkee as non-responsive and the EMD paid along with it will be forfeited.
- 11. Language of Bid:** The document shall be written in English/Hindi language. The total amount should be written in the same language.
- 12. Document comprising the E-Tender:** No page of this tenders document shall be removed and the set must be submitted as it is. Each page of the tenders document form is to be signed by the Bidder and must bear the Seal of the Company/Firm.

The tender submitted by the Bidder shall comprise as mentioned above in relevant sections.

13. Tender Prices

- 13.1 The contract shall be for the whole works as described in priced Schedule of Quantities submitted by the Bidder.
- 13.2 The tender submitted on behalf of firm shall be signed by a person who has the proper legal authority on behalf of the firm to enter into the contract; otherwise, the bid is liable to be rejected. Each page of the tender document and each drawing accompanying is required to be signed by the authorized person submitting the bid, with the company seal as the token of their having examined and acquainted themselves with the General conditions of contract, drawings, specifications, special conditions of contract etc. The forms of tender are to be filled in completely. Any bid with any of the documents not signed is liable to be rejected.
- 13.3 The Bidder shall fill in the percentage rate/in rates for items of the Works described in the Schedule of Quantities along with total bidding price. In case if the rates are not filled for any of the Items of Schedule of Quantities, in such cases the tender shall be summarily rejected. Failure to comply with either of these conditions will make the bid liable for rejection.
- 13.4 The work shall be carried out by the Bidder in a manner complying in all respect with the requirement of relevant bye-laws/orders of the Local/Municipal bodies and pay all fees and charges which may be liable at his own cost. The completion/ occupancy certificates including clearance from fire committee or any other statutory obligation shall be arranged by the bidder. Any official fees shall be paid by the Owner. All other cost of liasoning shall be borne by the bidder.
- 13.5 **Taxes** - All duties, taxes, and other levies payable by the Bidder under the contract, or for any other cause, shall be included in the rates, prices and total Bidding Price submitted by the Bidder. Bidders must include in their rates, the cost of transportation of materials to site, GST, Cess as per Building & other construction workers cess act, excise duty, octroi, and any other tax and duty levied by the Central / State Government. None of the above taxes & levies will be entertained by the Owner and no tax exemption forms will be issued by the Owner.
- 13.6 The rates quoted in the tender shall include cost of electrical power supply, water supply, cost of all materials, labour, telephone, rent and call charges, water and meter rent charges, temporary electric wiring / lighting for execution of work at site, hire for any tools and plants, shed for materials, marking out and clearing of site, transportation complete in all respects. The rates quoted in the tender shall be treated as rate for finally completing the item of work.
- 13.7 The quantities furnished in the schedule of quantities are only probable quantities and are liable to alterations, by omission, deductions or additions to any extent at the discretion of Indian Institute of Technology Roorkee. Payments will be regulated on the actual quantities of work done at accepted rates.
- 13.8 Errors in the Schedule of Quantities shall be dealt with in the following manner:
 - i. In the event of a discrepancy between the rates quoted in words and the rates in figures, rate quoted in words shall be considered to be correct.

- ii. In the event of an error occurring on account of arithmetical calculations the same shall be corrected according to rates written in words and quantities in B.O.Q.
 - iii. All the errors in totaling in the amount column and in carrying forward the totals shall be corrected. The tender total shall be accordingly amended. If the bidder doesn't accept the corrected amount the tender will be rejected and EMD will be forfeited.
- 13.9 The calculations made by the bidder should be based upon quantities of the items of work which are furnished in the Schedule of Quantities, but it must be clearly understood that the contract is not a lump sum contract. The Owners do not in any way assure, represent or guarantee that the said probable quantities are correct or that the work would correspond thereto. The items of work irrespective of the quantities which may vary shall be carried out at the same accepted bidding e-tender rates and no escalation in the rates will be entertained whatsoever. Any item of work may be omitted from the schedule of quantities and may be awarded to another agency at any time / stage of the work.
- 13.10 The bidders must obtain for themselves on their own responsibility and their own expenses all the information which may be necessary, including risks, contingencies and other circumstances to enable them in making a proper bid and for entering into a contract, and must examine the drawings, specifications and conditions and inspect the site of the work, nature of the work, availability of power, water, shelter for workmen and all the matters pertaining thereto before submitting the bid. They can also get any clarifications required from the Owner, before tendering, by contacting them at their office during working hours.

14. Format and signing of Tender document

- 14.1 The bid shall be typed or written in indelible ink and shall be signed by a person or persons duly authorized to sign on behalf of the Bidder. All pages of the tender where entries or amendments have been made shall be initialed by the person or persons signing the tender.
- 14.2 The tender shall contain no alterations or additions, except those to comply with instructions issued by the Owner, or as necessary to correct errors made by the Bidder, in which case such corrections shall be initialed by the person or persons signing the bid. ANY CONDITIONAL BID WILL BE SUMMARILY REJECTED.

D: AWARD OF TENDER

15. Award criteria:

- 15.1 The acceptance of bid will rest with the Owner, which does not bind itself to accept the lowest bid and reserves to itself the authority to reject completely / partially, any or all of the bid/s received without the assignment of a reason.
- 15.2 The owner reserves to itself 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.
- 15.3 The Owner reserves to itself the right of omission of any item of work from the awarded tender at any time / stage during the execution of work and awards the same to another agency / bidder.

16. Notification of award: The successful Bidder will be issued a Letter of Acceptance (LOA) by the Owner. The issuance of LOA shall not constitute an award of work.

17. Security Deposit: Within ten (10) days of LOA the successful Bidder shall furnish the security deposit @ 5% of value of work in the form of DD/FDR in the favour of Institute Engineer, IIT Roorkee payable at Roorkee from Scheduled bank. The security deposit shall be returned / refunded to the bidder on completion of the defect liability period of contract. In case the bidder fails to deposit the said security deposit within the period as indicated, the Earnest Money deposited by the bidder shall be forfeited automatically without any notice to the bidder.

18. Signing of contract form: On the acceptance of LOA and submission of security deposit & Performance Guarantee (PG) of the successful Bidder whose tender has been accepted in writing, the Indian Institute of Technology Roorkee will sign an agreement. Article of agreement shall be as per IIT Roorkee.

E: DURING EXECUTION

- 19. During Execution:** The Bidder shall carry out all the works strictly in accordance with the drawing, details and instructions of the Owner. If in the opinion of the Owner, changes have to be made in the design, and they desire the bidder to carry out the same, the Bidder shall be bound to comply. The Owner decisions in such cases shall be final.

The Bidder is bound to carry out any items of work necessary for the completion of the job even though such items are not included in the schedule of quantities and rates. Schedule of instructions in respect of such additional items and their quantities with the prior consent from the Owner. Rates for such items of work will be approved by the Owner on the basis of Analysis of Rates which will be derived from actual prevailing market rates of similar item along with 15% as bidder's profit & overhead (or service charge as quoted by the bidder). The rates approved by the Owner in such cases will be final.

The Bidder shall get the quality of work done inspected for material and workmanship at different stages of execution as per instructions given by the Owner or their representative time to time. Any item of work done which is found not conforming to the Contract shall be rejected by the Owner. The decision of the Owner in such cases shall be final.

The Owner may instruct at any stage of execution for testing of samples of any material taken at random. The Owner will decide the testing laboratory / agency and the cost of testing including the expenses for sending the samples to the laboratory / agency and receipt of test reports shall be borne by the Bidder. The material shall be rejected in case the test reports are not within the permissible limits.

The Bidder shall have to present the invoice for purchased material from the manufacturer or from the dealer along with the certificate from the manufacturer. In case material is found to be of substandard quality, the same shall be rejected by the Owner. The decision of the Owner in such cases shall be final.

The Bidder shall not be entitled to any compensation for the Loss suffered by him on account of delays in commencing or executing the work whatever the cause of delay may be, including delays arising out of modifications to the work entrusted to him or in any subcontracts connected therewith or delays in awarding contracts for other trades of the project or in commencement or completion of such other works or in procuring Government controlled or other building materials for any other reasons whatsoever. The Owner shall not be liable for any sum besides the e-tender amount, subject to such variations as are provided for herein and as instructed by Owner. However, necessary time extension will be given if the delays are not attributed to the Bidder.

Undertaking

(On Non-Judicial stamp paper of Rs. 100/-)

Name of the address of the bidder:.....

NIT No.....

Name of the work:.....

Due Date:.....

I/We have read and examined the Tender document for the work. I/We hereby submit bid for the execution of the work specified for the Institute within the time specified in NIT of quantities and in accordance with the specifications, designs, drawing and instructions in writing referred to 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.

I/We agree to keep the Bid open for ninety (90) days from the due date of its opening and not to make any modification in its terms and conditions.

Earnest Money as mentioned in the critical data sheet is hereby forwarded in Bankers' Cheque / Demand Draft / Fixed Deposit Receipt issued by scheduled bank. If I/We, fail to furnish the prescribed performance guarantee within prescribed period. I/We agree that the Institute has to right to forfeit the said earnest money absolutely. Further, if I/We fail to commence work as specified, I/We agree that the Institute has to right 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 NIT. 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 bidder on back to back basis. Further that, if such a violation comes to the notice of owner, then I/we shall be debarred for tendering in E&W, IIT Roorkee in future forever. Also, if such a violation comes to the notice of owner 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 of the State.

I/We hereby declare that I/We have no near relative connection by marriage to any staff of the Institute.
The information given in the tender form is correct and best of my knowledge.

Dated:

Signature of Bidder

Witness:

Postal Address
Occupation:

GENERAL CONDITIONS OF CONTRACT(GCC)

A: GENERAL

1.0 Definitions :

1.1 In this contract, the following terms shall be interpreted as indicated:

- a. "The Contract" means the agreement entered into between the Owner and the Bidder, as recorded in the contract form signed by the parties, including all the attachments and appendices thereto and all documents incorporated by reference therein.
- b. "The Contract Value" means the amount payable to the Bidder under the contract for the full and proper performance of its contractual obligations.
- c. "Contract Bond" means any information provided in the tender document and agreed to by the Bidder.
- d. "The Work" means all labour, materials, tools and plant, equipment including government taxes and transport that may be required in preparation of and for and in the full and entire execution and completion of "the Work".
- e. "Services" means services ancillary to the execution of the work such as transportation and insurance, and any other incidental services, such as installation, commissioning, provision of technical assistance, training and other obligations of the Bidder covered under the contract.
- f. "GCC" mean the General Conditions of Contract contained in this section.
- g. "SCC" means the Special Conditions of Contract.
- h. "The Owner" means the Indian Institute of Technology Roorkee or its representative.
- i. "The Owner" means the Owner/Project Management Consultant appointed by the Owner for preparing all the drawings, details and specifications of items required for the execution of the work and supervise and monitor the execution at site along with checking and verifying Bidder's bill. The Bidder shall offer the Engineer or any representative of Owner every facility and assistance for examining the works and materials. The Engineer or any representative of the Owner shall have power to give notice to the Bidder or to his staff, of non-approval of any work or materials and such work shall be suspended or the use of such materials shall be discontinued until the decision of the Owner. Such examinations shall not in any way exonerate the bidder from the obligations to remedy any defects which may be found to exist at any stage of the work or after the same is completed.
- j. "The Bidder" means the individual or the firm executing the work.
- k. "The Project Site" where applicable, means the place or places named in SCC.
- l. "Day" means calendar day.
- m. "Engineer-in-charge (EIC)" means Assistant Engineer.

2.0 Interpretation and Application

- 2.1 These general conditions shall apply to the extent that provisions in other parts of the contract do not supercede them.
- 2.2 In interpreting these Conditions of Contract, singular also means plural, male also means female or neuter, and the other way around. Headings have no significance. Words have their normal meaning under the language of the Contract unless specifically defined. The Owner will provide instructions clarifying queries about the Conditions of Contract.
- 2.3 If sectional completion is specified in the Contract Bond, references in the Conditions of Contract to the Works, the Completion Date, and the Intended completion date are for the whole of the Works.

3.0 Standards

- 3.1 The works executed by the Bidder should be carried out in most professional manner, both as regards material and otherwise, in every respect, in strict accordance with the Technical Specifications. All materials and workmanship shall so far as procurable be of the respective kinds described in the priced schedule of quantities and/ or specifications and in accordance with the Owner' instructions, and the Bidder shall upon the request of the Owner, furnish them with all invoices, accounts; receipts and other vouchers to prove that the material procured complies therewith. When no applicable standard is mentioned, the work shall be carried out as per the directions of the Owner. The Bidder shall at his own cost arrange for and/or carry out any test of materials which the Owner may require. In case of discrepancies in tender wording as regards the specifications of materials, workmanship etc., written instructions will supersede the tender wording unless otherwise mentioned.
- 3.2 The Owner in their absolute discretion from time to time shall issue further drawings and/ or written instructions, details, directions and explanations which are hereafter collectively referred to as "the Owner's instructions" in regard to: -
- The variation or modification of the design quality or quantity of works or the addition or omission or submission on any work.
 - Any discrepancy in the drawings or between the schedule of quantities and / or drawings and /or specifications/ dimensions etc.
 - The removal and / or re-execution of any works executed by the Bidder.
 - The removal from the site of any materials brought thereon by the Bidder and the substitution of any other materials therefore / or rejection of the material brought on site.

4.0 Use of Contract Documents and Information

- 4.1 The Bidder shall not, without the Owners' prior written consent, disclose the contract or any provision thereof, or any specifications, plan, drawing, pattern, sample or information furnished by or on behalf of the Owner in connection therewith, to any person other than a person employed by the Bidder in performance of the contract. Disclosure to any such employed person shall be made in confidence and shall extend only so far, as may be necessary for purposes of such performance.
- 4.2 The Bidder shall not, without the Owner's prior written consent make use of any document or information enumerated in Para 4.1 except for the purposes of performing the contract.
- 4.3 All documents included but not limited to contract agreement shall remain the property of the Owner and shall be returned (in all copies) to the Owner on completion of the Bidder's performance under the contract, if so required by the Owner.

5.0 Owner's Decisions: Except where otherwise specifically stated, the Owner will decide contractual matters between the Owner and the Bidder, in the role of representing the Owner.

6.0 Performance Guarantee: The proceeds of the performance guarantee shall be payable to the Owner as compensation for any loss or dues resulting from the Bidder's failure to complete its obligations under the contract.

7.0 Program and Reporting

- 7.1 The bidder shall furnish to the Indian Institute of Technology Roorkee a bar chart laying down weekly financial and physical targets to complete the project within stipulated time for approval within fifteen days from the date of receipt of notification of award. Weekly progress report shall be furnished to the owner showing the progress.
- 7.2 The bidder must submit every week the following information to the Owner in writing:
- Number of men employed, trade wise;
 - Progress achieved;
 - Expected dates for completion of work;
 - Any actual or potential delay in completion schedule.

8.0 Assignment and Sub-contracting

- 8.1 The whole of the works included in the Contract shall be executed by the bidder and the bidder shall not directly or indirectly transfer, assign or underlet the contract or any part, share or interest therein without the written consent of the Owner.
- 8.2 No sub-contracting shall relieve the Bidder from the full and entire responsibility of the Contract or from the active superintendence of the work during their progress.

9.0 Bidder to provide everything necessary for proper execution of work

- 9.1 The Bidder shall provide everything necessary for the proper execution of the works according to the intent and meaning of the drawings, priced schedule of quantities and specifications taken together whether the same may or may not be particularly shown or described therein provided that the same can reasonably be inferred there from. If the Bidder finds any discrepancy therein he shall immediately and in writing refer the same to the Owner whose decision shall be final and binding. Further, if any sample(s) of material(s), fittings, fixtures or finished item(s), to be used in the construction work, has/have been called for from the bidder, no work related to it/these shall be executed unless the same has/ have been approved by the Owner failing which no payment shall be made to the bidder on this account. Any sample, duly approved by the Owner shall become part of the supply to be used in "the works".
- 9.2 The Bidder shall arrange for water & power supply at site at his cost for the entire work. The water to be used for construction shall be free from excessive salts and minerals that are harmful to the construction work. Making arrangement of water good for construction either through external supply or through treatment at site shall be entirely the responsibility of the Bidder. The Bidder shall on demand of the Owner / PMC get any random water samples tested at the approved testing laboratories. No extra payment shall be made for arranging water good for construction under any circumstances. No excuse for / of Municipal water / electric supply shall be entertained. The bidder shall ensure provision of electricity by generator and water by tanker transport if necessary. No claim shall be entertained on this account. In case the same will be provided by the Owner at any stage, then water/electricity charges shall be deducted from the Bidders running bills as per actual metered consumption.
- 9.3 The Bidder shall supply fix and maintain at his cost, during the execution of any works, all the necessary power supply, water supply, centering, scaffolding, watching and lighting by night as well as by day, required not only for the proper execution but also for protection of the public and the safety of any adjacent roads, streets, pavements, walls houses, building and other erections, matters or things. The Bidder shall take down and remove any or all such centering, scaffolding, staging, planking, timbering, strutting, shoring pumping, fencing, hoarding, watching and lighting by night as well as by day, required not only for the proper execution but also for protection of the public and the safety of any adjacent roads, streets, pavements, walls houses, building and other erections matters or things. The bidder shall take down and remove any or all such centering, scaffolding, staging, planking, timbering, strutting, shoring etc. as occasion shall require or when ordered so to do so and shall fully reinstate and make good all matters and things disturbed during the execution of the works, to the satisfaction of the Owner.
- 9.4 Throughout the execution of the work, the Bidder or his representative duly authorized and fully responsible and technically conversant with the work under this agreement, acting on his behalf shall be available at the site for supervising the work. The Bidder shall make adequate arrangements for watchmen to guard the materials brought by them to the site and shall ensure the safety, breakage and any theft of materials fixed or unfixed by him. Any material, T & P brought to the site for bonafide use of the Project shall not be removed/ shifted from the site without the prior written permission of the Engineer/Owner.
- 9.5 The bidder has to provide at his cost leveling pipe, steel/ metallic tapes etc. required by the supervising staff of the Owner's/Owner' representative during execution of the work.
- 9.6 Whenever required by the Owner, the Bidder shall provide shop drawings / details before execution of work and get them approved by the Owner.
- 9.7 Wherever the specification of any item indicates the usage of approved equivalent of any material, the Bidder shall get the sample of the equivalent material approved from the Owner before execution. The approval of the equivalent material is entirely at the discretion of the Owner.

10.0 Infrastructure: For storage of materials, bidder has to provide at his own cost sufficient fenced and covered appropriate area on site for storage of above materials with lock and key arrangement. For arranging meetings suitable sized table and chairs shall be provided by Bidder. Temporary space shall be provided to the Bidder for construction of stores for storage of materials /site office/ labour hutments for the project period.

11.0 Site Establishment: The bidder shall provide all stores, workmen and materials. All materials likely to deteriorate in the open shall be stored under suitable cover. The security of the bidder's equipment and materials is his own responsibility. The Owner accepts no liability for loss or damage to the bidder's plant tools or materials. The materials issued to the bidder by the Owner will remain under the custody of bidder as a trustee. However, title on the same will remain with the Owner. The bidder will be responsible for loss or damage to such materials and shall preserve them in good working conditions as required for the contract

and good construction practices till such time that they are incorporated in the works and erected, aligned and fully installed in position and handed over to the Owner. In case the Owner feels that arrangements made by the bidder are not adequate he shall so advise the bidder and the bidder shall promptly take corrective action. In case the bidder fails to take corrective action, Owner shall take such corrective actions and recover the cost thereof from the bidder's bills. Accounts of such material on completion of work shall be rendered and surplus material returned to the Owner as per instructions of Owner. The bidder shall clear away periodically or as instructed by Owner any rubbish, scrap materials, etc. and dump the same in the authorized dump sites notified by local authority/area indicated by the Owner. All construction materials shall be neatly stacked in an orderly manner as directed by the Owner and care shall be taken to allow proper access to workmen and easy movement of men, vehicles, cranes and materials. The bidder shall maintain all the drawings carefully mounted on the board of appropriate size and well protected from the ravages of weather, termites and other insects. The bidder shall not permit the entry to the site of any person not directly connected/concerned with the work without first having obtained the written permission of Owner. The bidder shall submit a list of plants, equipments, tools, tackles, etc. which he will use, to perform the work. These tools, etc. shall not be removed from the site till the completion of job. A gate pass must be obtained from the Indian Institute of Technology Roorkee, chief proctor office, in order to remove from site any plant equipment, tools and materials. All items such as instructions and other pertinent data regarding erection/commissioning and maintenance should be typed and classified for transmittal in a manner approved by the Owner. For all employees of Owner, the bidder shall conform for no misconduct from any of his workforce; failure of this will be sufficient cause for removal of such person from the site.

12.0 Messing & Accommodation: The bidder will make his own arrangements for messing and accommodation. No accommodation and messing shall be provided by the Owner.

13.0 Procurement, Consumption and Storage of Materials

- 13.1 The bidder shall at his own expenses, provide all materials including cement & steel required for the works. Adequate stocks of all materials required for the work are to be maintained at site. No material (unless as provided elsewhere in this document) shall be supplied by the Owner.
- 13.2 All materials to be provided by the bidder shall be in conformity with the detailed specifications laid down in the contract and the bidder have to prove that the materials conform to the laid down specifications, if requested by the Indian Institute of Technology Roorkee.
- 13.3 All materials required for execution of work must be got approved by the site representative of the Owner before they are actually put to use. All facilities for prior inspection of materials and subsequent inspection of work by the Site Engineer must be made available.
- 13.4 The bidder shall, at his own expenses and without delay, supply to the Owner samples of materials proposed to be used in the work. The Owner shall within seven days of supply of samples, or within such further period as Owner may require and intimate the bidder in writing, whether samples are approved by Owner, or not. If samples are not approved, the bidder shall forthwith arrange to supply, for their approval, fresh samples complying with the specification laid down in the contract.
- 13.5 The Owner shall have full powers to require removal of any or all the materials brought to site by the bidder which are not in accordance with the contract specifications or do not conform in character or quality to the samples approved Owner. In case of default on the part of the bidder in removing rejected materials, the Owner shall be at liberty to have them removed by other means. The Owner shall have full powers to direct other proper materials to be substituted for rejected materials and in the event of the bidder refusing to comply. Owner may cause the same to be supplied by other means. All risks and costs which may attend upon such removal and/or substitution shall be borne by the bidder.
- 13.6 Bidder shall be responsible for procurement of all materials/equipments etc. No delay due to non-availability of any material equipment will be entertained by Owner.

14.0 Method of storing the materials

- 14.1 The bidder shall at his own cost, provide for all necessary storage on the site in specified areas for all materials such as steel, cement and such other materials which are likely to deteriorate by the action of sun, wind, rain, dampness or other natural causes due to exposure in the compounds or in stores in such a manner that all materials, tool etc. shall be duly protected from damage by weather or any other cause.
- 14.2 Materials required for the works, by the bidder be stored by the bidder only at places approved by the Owner. Storage and safe custody of materials shall be the responsibility of the bidder. All the materials including bidder's Tools & Plants brought by the bidder to the site shall become and remain the property of the Owner and shall not be removed off the site without prior written approval of the Owner/Owner. But whenever the works are finally completed and advances, if any, in respect of

such materials are fully recovered, the bidder shall at own expenses forthwith remove from the site all surplus materials supplied by him and upon such removal, the same shall revert in and become the property of the bidder.

15.0 Shuttering and Scaffolding Materials: It shall be desirable to have adequate amount of shuttering and scaffolding materials to complete the work speedily and Owner decision so as to the quantum of these desirable/ resources of the site shall be final and binding.

16.0 Completion of Work: Before finally leaving site, all the Bidders stores, plant, tools and rubbish shall be removed and the site left clean and tidy. The space allocated by Owner shall be vacated and handed over to the Owner.

17.0 Water and Electricity for Construction work : Water & Electricity as per relevant section's mentioned above

18.0 Employment of Labour

- 18.1 The bidder shall comply with the requirement of statutory provisions and shall be solely responsible for fulfillment of all legal obligations under Contract Labour (R&A) Act, Inter State Migrant Workmen (Registration of Employment and condition of Service Act, Payment of Wages Act., Minimum Wages Act, Workmen's Compensation Act, Factories Act, Employee's Provident Fund & Miscellaneous Provisions Act, Payment of Bonus Act, Payment of Gratuity Act, Industrial Disputes Act and all other Industrial/Labour enactments and Rules made there under as applicable from time to time. In case Owner incurs any liability towards payment of any dues, compensation, cost of any other liability of any kind whatsoever, due to non-fulfillment of statutory provisions under any industrial/labour laws by the bidder, the same shall be made good by the bidder and Owner shall have full right to recover and claim the same against the bidder from his outstanding bills or otherwise. No Labour to stay at site.
- 18.2 The bidder will be expected to employ on the work only his regular skilled employees with experience of this particular work. The permission of the Owner must be obtained before tradesman are recruited locally for the work. This rule does not apply to unskilled labour. No female labour shall be employed in dark hours/ i.e. hours prohibited under the applicable law. No person below the age of eighteen years shall be employed at any point of time. The bidder shall pay, to each person, the wages as per minimum Wages Act of the State Government.
- 18.3 All traveling expenses including provision of all necessary transport to and from site, lodging allowances and other payments to the bidder's employees are his own responsibility. The hours of work on the site shall be decided by the Owner and bidder shall adhere to the same. All bidders employees shall wear safety helmet and such identifications marks as may be provided by bidder on work site and duly approved by Owner. All notices displayed on the site and any instructions issued by the Owner shall be strictly adhered to by the Bidder's and/or his sub-bidders employees. The bidder shall be required to maintain employment records as covered in relevant Acts and produce documentary evidence to the effect that he has discharged his obligations under the Employees Provident Fund Act 1952, and ESI Act, 1948 Group Insurance and other Acts for the workmen working at site.
- 18.4 The bidder shall comply with the provisions of the Apprentices Act 1961, and the rules and orders issued there under from time to time. If he fails to do so, his failure will be a breach of the contract and the Dean Infrastructure/Executive Engineer may in his discretion, without prejudice to any other right or remedy available in law, cancel the contract. The bidder shall also be liable for any pecuniary liability arising on account of any violation by him of the provisions of the said Act.

19.0 Working and Safety Regulations: The bidder shall observe all statutory safety and legal requirements regulations issued by Central and State Governments applicable to the work as well as any local regulations applicable to the site issued by the Owner or any other authority.

20.0 Particular attention is drawn to the following: In case of accident, the Owner shall be informed in writing forthwith and First-Aid, Hospitalization shall be provided by the Bidder. The bidder shall strictly follow regulations laid down by Govt. and State authorities in this regard and all cases are to be defended by the bidder. The Owner shall not refund any insurance claims. Bidder shall fence his plant, platforms, excavations etc. Compliance with all electricity regulations. Compliance with statutory requirements for inspection and test of all lifting appliances and auxiliary lifting gear. Staircase, doors or gangways shall not be obstructed in any way that will interfere with means of access of escape. Where it is necessary to provide and/or store petroleum products or petroleum mixtures and explosive, the bidder shall be responsible for carrying out such provision and/or storage in accordance with the rules and regulation laid down in Petroleum Act 1934. Explosive Act 1948 and Petroleum and Carbide of Calcium Manual Published by the Chief Inspector of Explosive of India. All such storage shall have prior approvals of the

Owner. In case any approval or clearance from Chief Inspector of Explosive or any statutory authorities is required, the bidder shall be responsible for obtaining the same.

The bidder shall have his own Fire Fighting Extinguishers and Equipment. The bidder shall be responsible for the provision of all safety notices safety equipments including the safety gadgets for his workmen required by both the relevant legislation and such as the Owner may deem necessary. While working at heights, safety belts and safety helmets shall necessarily be used.

21.0 Owner's and Bidder's Risks: The Owner carries the risks, which this Contract states are The Owner risks, and the Bidder carries the risk, which this Contract states are The Bidder's risks.

21.1 Owner's Risks: The Owner is responsible for the accepted risks which are :

- a. In so far as they directly affect the execution of the Works. These include war, hostilities, invasion, act of foreign enemies, rebellion, revolution, insurrection of military or usurped power, civil war, riot commotion or disorder (unless restricted to the Bidder's Employees), and contamination from any nuclear fuel or nuclear waste or radioactive toxic explosive, or
- b. A cause due solely to the design of the Works, other than the Bidder's design.

21.2 Bidder's Risks: All risks of loss or damage to physical property and of personal injury and death which arise during and in consequence of the performance of the Contract other than the accepted risks of the owner.

21.3 The Bidder shall be responsible for all injury to persons, animals or things, and for all damages to the structural and/or decorative part of property which may arise from the operations or neglect of himself or of any sub-bidder or of any of his or sub-bidder's employees whether such injury or damage arises from carelessness accident or any other causes whatsoever in any way connected with the carrying out to the Contract. This clause shall be held to include inter alia any damage to buildings, whether immediately adjacent or otherwise and any damage to roads, footpaths, or ways as well as all damage caused to the buildings and the work forming the subject to this Contract by frost, rain or other inclemency of the weather. The Bidder shall indemnify the Owner and hold him harmless in respect of all and any expenses arising from any such injury or damage to persons or property as aforesaid and also in respect of any claim made in respect of injury or damage under any acts of Government or otherwise and also in respect of an award of compensation or damages consequent upon such claim. The bidder shall make good all damages of every sort mentioned in the Clause, as to deliver up the whole of the Contract works complete and perfect in every respect and so as to make good or otherwise satisfy all claims for damage to the property of third parties.

22.0 Setting out Works: The bidder shall set out the works and responsible for the true and perfect setting out of the same and for the correctness of the positions, levels, dimensions and alignment of all parts thereof, if at any time any error shall appear during the progress of any part of works the bidder shall at his own expenses rectify such error, if called upon to the satisfaction of the Owner.

23.0 Bidder to remove all offensive matter, non-suitable material etc immediately.

- 23.1 All debris, excavated soil, filth or other matter or an offensive nature taken out of any trench, sewer, drain cesspool or other place shall not be deposited on the surface but shall be at once carted away by the bidder out of the premises/ site under intimation to concerned authorities.
- 23.2 Any material brought on site if found unsuitable shall be removed from site at once by the Bidder under intimation to the concerned authorities.

24.0 Inspections by Owner

- 24.1 The representative of the Owner at all times have free access to the works and /or to the workshops, factories or other places where materials are being prepared or constructed for the Contract and also to any place where materials are lying or from which they are being obtained. No person except the representatives of Public authorities shall be allowed on the work at any time without the written permission of the Owner. If any work is to be done at a place other than the site of the works, the Bidder shall obtain written permission of the Owner for doing so.
- 24.2 The Owner and their representatives shall have the right to test and/ or inspect the works to confirm their conformity to the contract, at all times, whenever in progress either on the site on the Bidder's premises wherever situated or any firm or

company where work in connection with this contract may be in hand. All records, registers or documents relating to the works including materials used on works shall be kept open to the inspection of the Owner or his Authorized representative when so called for in writing.

- 24.3 The Bidder shall get the quality of work done inspected for material and workmanship at different stages of execution as per instructions given by the Owner or their representative time to time. Any item of work done which is found not conforming to the Contract shall be rejected by the Owner. The decision of the Owner in such cases shall be final.
- 24.4 The inspections and tests may be conducted on the premises of the Bidder or at the Project site. When carried out on the premises of the Bidder or its sub-Bidder(s), all reasonable facilities and assistance including access to drawings and production data shall be furnished to the inspectors at no charge to the Owner.
- 24.5 Should any inspected items of work fail to conform to the specifications, the Owner shall communicate them and the Bidder shall either replace them or make all alterations necessary to meet specification requirements free of cost to the Owner.
- 24.6 The Bidder shall permit the Owner/Architect to inspect the Bidder's accounts and records relating to the performance of the Bidder and to have them audited by auditors appointed by the Owner, if so required.

25.0 Covering Up/Uncovering of Works

- 25.1 No part of the works shall be covered up without the approval of Owner and the Bidder shall afford full opportunity for examination and inspection by the Owner. The bidder shall give due notice to the EIC about the work to be covered up for its measurements and examination. The EIC shall within a reasonable time attend for the purpose of examining such work, unless the EIC specifically advises the Bidder in writing of his unwillingness not to attend for such examination in which case the Bidder may proceed further with the Contract work.
- 25.2 Should the Owner consider it necessary in order to satisfy himself as to the quality of the work, the Bidder shall at any time during the continuance of the contract pull down or cut into any part of the work and make such opening into and to such an extent through the same, as the Engineer may direct and the Bidder shall make good the whole to the satisfaction of the Engineer, should the work prove to be faulty or in any respect not in accordance with the terms of the contract documents, the Engineer shall be at liberty to order such further removal as he may consider necessary and the whole of the expenses incurred shall be borne by the bidder. If however, the work proves to be sound and in accordance with the contract document, the actual expenses incurred in such examination will be borne by the Owner.
- 25.3 Rates charged by the Bidder for works performed under the contract shall not vary from the rates quoted by the Bidder in its bid, with the exception of any price adjustments authorized in SCC or in the Owner's request for bid validity extension, as the case may be.
- 25.4 If requested by the Owner, the Bidder shall provide the Owner with a detailed cost breakdown of any rate in the Schedule of Quantities.
- 25.5 The Owner may at any time / stage of execution demand for the Analysis of Rates for any item / items of work which in their opinion is / are abnormally high / low rates or required for the Analysis of Rates of other Publish / extra item / items. The Bidder is bound to present the same and if the Bidder is unable to present a justified Analysis of Rates for any item / items, the rate / rates for such item may be adjusted accordingly and the decision of the Owner in such cases shall be final.

26.0 Change in the order/ Extra items of work

- 26.1 The Owner may at any time, by written order given to the Bidder, make alterations in, omissions from, additions to, or substitutions for, in drawings, designs or specifications or quantities of the items of work
- 26.2 Owner reserves to itself the right of omission of any item of work from the awarded, Publish at any time / stage during the execution of work and award the same to another agency / bidder.
- 26.3 The Owner may at any time, by written order given to the Bidder, increase the scope of work or include any new item of work. The Bidder shall be bound to carry out such works, the rates for which shall be arrived at on the basis of the CPWD Schedule of Rates or if the Schedule is silent by standard methods of rate analysis as derived by the Owner/Architect.

27.0 Payment

- 27.1 The method and conditions of payment to be made to the Bidder under the contract shall be specified in SCC.
- 27.2 Payment shall be made promptly by the Owner after certification of the bill by the Owner.
- 27.3 All intermediate running payments to the bidder shall be regarded as payments by way of advance against the final payment and shall not preclude the requiring of bad, unsound and imperfect or unskillful work to be removed, taken away and reconstructed or re-erected.

28.0 Variations and Provisional Cost (If applicable):

- 28.1 Where work cannot be measured and valued properly, the Bidder shall be allowed day work rates on the prices prevailing when such work is carried out (unless otherwise provided in the contract): a. At the rates if any inserted by the Bidder in the priced Schedule of Quantities or b. If no such rates have been inserted then at the rates prevailing in the market for material and labour and at the control rates for the controlled materials including in all cases the rate for delivery of the material at the work.
- 28.2 Provided that in any case voucher specifying the time daily spent upon the work (and if required by the Owner the workman's names) and the materials used shall be delivered for verification to the Owner, or his authorised representative not later than the end of the week following that in which the work has been executed. Effect shall be given to the measurement and valuation of variations in interim Certificates and by adjustment of the total Contract Value.

29.0 Claims for Extra or for Deductions

- 29.1 The Owner shall not be responsible for the payment of any claim for extra work not included in the contract nor the Bidder shall be entitled to claim any addition to the contract sum in respect of any changes or alterations in the materials used unless the same shall have been ordered or sanctioned, as the case may be, in writing by the Owner.
- 29.2 The Bidder has to submit a monthly return by 10th of the ensuing month for any extra work which in his opinion is not covered by the contract agreement through the Owner's/ Owner's representatives and obtain a receipt from the authorized signatory of the Owner. Failing this, he shall have no right to any such claim, whatsoever may be the circumstances, later on.
- 29.3 In the event of any dispute arising either as to validity of the claim or as to the account to be paid or allowed in respect thereof, the decision of the Owner shall be final and binding on the bidder. In the meantime, the Bidder may either proceed with the work in question or suspend the same as may be determined by the Owner.
- 29.4 All extra works (those permitted by Owner) of every description shall be executed by bidder on site of work in pursuance of any of the provision of the contract, shall be measured up, and shall be paid according to actual quantities ascertained by such measurements and the prices as finalized by the Owner based on the priced schedule of quantities so that such priced schedule of quantities shall include all such operations and accessories as appear in the said schedule of prices or specification to be or shall in the opinion of the Owner the contingencies upon the works mentioned in such schedule of prices or required to make such works perfect and fit for use.
- 29.5 Provided also that if any work shall be ordered by the Owner and executed by the Bidder for the payment of which no provision in the opinion of the Owner have been made in the priced schedule of quantities or the specifications, the Owner shall fix and determine such prices for the same based on the prices appearing in the priced schedule of quantities, such allowance being made as may seem to the Owner sufficient for any difference in the character of conditions of the work. However, rates for extra items shall be fixed on the basis of actual rate analysis.
- 29.6 If, it shall appear that the work has been executed with unsound, imperfect or unskilled workmanship, or with material of any imperfect or any inferior quantity or otherwise not in accordance with the contract documents the Bidder shall at his own cost rectify, reform, remove, or reconstruct the same, wither in the whole or in part, as may be directed by the EIC, whether or not the value of any such work or materials shall have been included in any payment made to the Bidder.
- 29.7 The Bidder shall remove all malba etc., wash and clean the floors and hand over the site quite clean on the completion of the work.

30.0 Delay in the Bidder's performance

- 30.1 Execution of the work and performance of the services shall be done by the Bidder in accordance with the time schedule specified by the Owner in the Notice inviting tender.
- 30.2 If, at any time during performance of the contract, the Bidder should encounter conditions impeding timely execution of the works and performance of services, the Bidder shall promptly notify the Owner in writing of the fact of the delay, it's likely duration and its cause(s). As soon as possible, after receipt of the Bidder's notice, the Owner shall evaluate the situation and may, entirely at its discretion, extend the Bidder's time for performance with or without liquidated damages.

31.0 Liquidated Damages: If the Bidder fails to execute any or all of the works or to perform the services within the period(s) specified in the contract, the Owner shall deduct from the contract value, as liquidated damages, a sum specified in the SCC for each week or part thereof delay until actual completion or performance, up to a maximum deduction of the percentage specified in SCC. Once the maximum is reached, the Owner may consider termination of the contract.

32.0 Termination by Default

- 32.1 The Owner may without prejudice to any other right or remedy, by written notice (of fifteen days) of default sent to the Bidder, terminate the contract in whole or part: a) if the Bidder fails to complete any or all of the works within the period(s) specified in the NIT or any amendment thereof, or within any extension thereof granted by the Owner, or b) if the Bidder fails to perform any other obligation(s) under the contract,
- 32.2 In the event, the Owner terminates the contract in whole or in part, the Owner may procure, upon such terms and in such manner as it deems appropriate, works or services similar to those unexecuted and the Bidder shall be liable to the Owner for any excess costs for such similar work or services. However, the Bidder shall continue the performance of the contract to the extent not terminated.

33.0 Force Majeure

- 33.1 The Bidder shall not be liable for forfeiture of its Security Deposit, liquidated damages or termination by default, if and to the extent that, its delay in performance or other failure to perform its obligations under the contract is the result of an event of Force Majeure.
- 33.2 For purposes of this clause, "Force Majeure" means an unforeseeable event beyond the control of the Bidder and is not because of the Bidder's fault or negligence. Such events may include acts of the Owner either in its sovereign or contractual capacity, wars or revolutions, fires, floods, epidemics.
- 33.3 If a Force Majeure situation arises, the Bidder shall promptly notify the Owner in writing of such conditions and the cause thereof. Unless otherwise directed by the Owner in writing, the Bidder shall continue to perform its obligations under the contract as far as is reasonably practical, and shall seek all reasonable alternative means for performance not prevented by the Force Majeure event.

34.0 Termination for Insolvency: The Owner may at any time terminate the contract by giving written notice to the Bidder, if the Bidder becomes bankrupt or otherwise insolvent. In this event, termination will be without compensation to the Bidder, provided such termination will not prejudice or affect any right of action or remedy which has accrued or will accrue thereafter to the Owner.

35.0 Termination for Convenience: The Owner, by written 30 days prior notice sent to the Bidder may terminate the contract, in whole or in part, at any time for its convenience. The notice shall specify that the termination is for Owner's convenience, the extent to which performance of the Bidder under the contract is terminated, and the date upon which such termination becomes effective. The items of work that are complete and ready within (1) month after the Bidder's receipt of notice of termination shall be accepted by the Owner at the contract terms and values. For the remaining works, the Owner may elect;

a) to have any portion completed at the contract terms and value and/or

b) to cancel the remainder and pay to the Bidder an amount, finalized by the Owner, for partially completed works and for materials and parts previously procured by the Bidder.

36.0 Resolution of Disputes

- 36.1 The Owner and the Bidder shall make every effort to resolve amicably by direct informal negotiations any disagreement or dispute arising between them under or in connection with the contract. If, after thirty (30) days from the commencement of such informal negotiations, the Owner and the Bidder have been unable to resolve amicably a contract dispute, either party may require that the dispute be referred for resolutions to the formal mechanisms specified in the SCC. These mechanisms may include but are not limited to, Arbitration in accordance with rules of Arbitration Act and award made in pursuance thereof shall be binding on both the parties.
- 36.2 All disputes should be under the Jurisdiction of civil court Roorkee.

37.0 Governing language: The contract shall be written in Hindi or English language. All correspondence and other documents pertaining to the contract that are exchanged by the parties shall be written in the same language.

38.0 Governing law: The contract shall be governed by the laws of The Union of India for the time being in force. All disputes are subject to jurisdiction of courts at Roorkee or Honourable High Court Uttarakhand at Nainital.

39.0 Notices: Any notice given by one party to the other pursuant to this contract shall be sent to other party in writing or by cable, telex, or facsimile and confirmed in writing to the other party's address specified in SCC. A notice shall be effective on the date on when it is delivered, or on the notice's effective date, whichever is later.

40.0 Discoveries: Anything of historical or other interest or of significant value unexpectedly discovered on the Site is the property of the Owner. The Bidder is to notify the Owner of such discoveries and carry out the Owner's instructions for dealing with them.

41.0 Dismissals of workmen: The bidder on request from the Owner, immediately dismiss from the works any person employed by him who may be found in the opinion of the client to be unsuitable or incompetent or who has shown misconduct.

42.0 Working Hours: Normal working hours shall be from 08:45 a.m. to 05:30 p.m. No construction work of important structural nature shall be carried out on Sundays, Holidays and during nights. However, permission to work beyond normal working hours can be granted by the Owner in exceptional circumstances to achieve the target schedule of completion.

B. TIME CONTROL

43.0 Program

43.1 Within the time stated in the Contract Bond the Bidder shall submit to the Owner for approval a Program showing the general methods, arrangements, order, and timing for all the activities in the works, along with weekly cash flow forecast.

An update of the Program shall be a program showing the actual progress achieved on each activity and the effect of the progress achieved on the timing of the remaining work including any changes to the sequence of the activities.

43.2 The Bidder shall submit to the Owner, for approval, an updated Program at intervals no longer than the period as stated in the clause no. 7.1. If the Bidder does not submit an updated Program within this period, the Owner may withhold the amount stated in the Contract Bond from the next payment certificate and continue to withhold this amount until the next payment after the date on which the overdue program has been submitted.

43.3 The Owner's/Owner's approval of the Program shall not alter the Bidder's obligations. The Bidder may revise the Program and submit it to the Owner again at any time. A revised Program is to show the effect of Variations at any stage of work, Owner award any item/part of item of work to bidder's workman/ external agency, if in their opinion, the progress of work is suffering because of that. The work done will be added to the Bidder's bill and the amount paid for the job will be deducted from the Bidder's account.

44.0 Delay and Extension of time

If in the opinion of the Owner the work be delayed

- a) by force majeure or
- b) by reason of any exceptionally inclement weather or
- c) by reason of proceedings taken or threatened by or disputes with adjoining or neighboring owners or public authorities or
- d) by delays of other bidder or Tradesmen engaged by the Owner or the Owner and the works not referred to in the Schedule of Quantities and/or specification or
- e) by reasons of Owner's instruction or
- f) by reason of civil commotion, local combination of workmen or strike or lockout affecting any of the building trades or
- g) in consequence of the bidder not having received in due time necessary instructions from the Owner for which he shall have specially applied in writing or
- h) from other cause which the Owner may certify as beyond the control of the bidder or
- i) by reason of nonpayment of interim certificate at specified time, the Owner shall grant for approval by the Owner a fair and reasonable extension of time for completion of the Contract. In case of strike or lockout the bidder shall as soon as may be given written notice thereof to the Owner, but the bidder shall nevertheless constantly use his endeavors to prevent delay and shall do all that may reasonably be required to the satisfaction of Owner to proceed with the work.

C. QUALITY CONTROL

45.0 Identifying Defects: The Owner shall check the Bidder's work and notify the Bidder of any Defects that are found. Such checking shall not affect the Bidder's responsibilities. The Owner may instruct the Bidder to search for a Defect and to uncover and test any work that the Owner considers may have a Defect.

46.0 Correction of Defects

- 46.1 The Owner shall give notice to the Bidder of any Defects before the end of Defects Liability Period, which begins at Completion and is defined in the Contract Bond. The Defects Liability period shall be extended for as long as Defects remain to be corrected.
- 46.2 Every time notice of Defect is given, the Bidder shall correct the notified Defect within the length of time specified by the Owner' notice.

47.0 Uncorrected Defects: If the Bidder has not corrected a Defect within the time specified in the Owner' notice, the Owner will assess the cost of having the Defect corrected, and the Bidder will pay this amount.

D. COST CONTROL

48.0 Schedule of Quantities

- 48.1 The Schedule of Quantities shall contain items for the construction work, installation, testing, and commissioning work to be done by the Bidder.
- 48.2 The Schedule of Quantities is used to calculate the Contract Price. The Bidder is paid for the quantity of the work done at the rate in the priced Schedule of Quantities for each item.

49.0 Variations: All variations in the program pursuant to clause no. 7.0 of GCC shall be included in the updated program produced by the Bidder.

50.0 Payments for Variations

- 50.1 The Bidder shall provide the Owner with a quotation (with breakdown of unit rates) for carrying out the Variation when requested to do so by the Owner. The Owner shall assess and finalise the quotation, which shall be given within seven days of the request or within any longer period stated by the Owner and before the Variation is ordered.
- 50.2 If the Bidder's quotation is unreasonable, the Owner may order the Variation and make a change to the Contract Price which shall be based on Owner' own forecast of the effects of the Variation on the Bidder's costs.
- 50.3 If the Owner decides that the urgency of varying the work would prevent a quotation being given and considered without delaying the work, no quotation shall be given and shall be treated as a Variation.
- 50.4 The Bidder shall not be entitled to additional payment for costs, which could have been avoided by giving early warning.

E: FINISHING THE CONTRACT

51.0 Completion Certificate: The Bidder shall request the Owner to issue a Certificate of Completion of the Works will do so upon deciding that the Work is completed.

52.0 Taking Over: The Owner shall take over the Site and the Works within Ten days of the Owner issuing a certificate of Completion. Before handing over the site, the bidder must obtain a site clearance certificate from the Owner.

53.0 Final Account: The Bidder shall supply to the Owner a detailed account of the total amount that the Bidder considers payable under the Contract before the end of the Defects Liability Period. The owner shall issue a Defect Liability Certificate and certify any final payment that is due to the Bidder after receiving the Bidder's account if it is correct and complete. If it is not, the Owner shall issue schedule that states the scope of the corrections or additions that are necessary. If the Final Account is still unsatisfactory after it has been resubmitted, the Owner shall decide on the amount payable to the Bidder and issue a payment certificate after receiving the Bidder's revised account.

SPECIAL CONDITIONS OF CONTRACT (SCC)

The following Special Conditions of Contract are supplementary, to the General Conditions of Contract. Whenever there is a conflict, the provisions herein shall prevail over those in the General Conditions of Contract. The corresponding clause number of the General Conditions of Contract is indicated in parentheses.

1. Definition (GCC clause 1.0)

- a) Owner means :IIT Roorkee.
- b) Site means the project site situated in IIT Roorkee Main Campus.

2. Release of Security Deposit :

- (i) Security Deposit will be refunded by the Owner after completion of Defect Liability Period i.e. **2 months** from date of virtual completion.

3. Performance Security Within Ten days (10) after the Bidder's receipt of Notification of Award, the Bidder shall furnish Performance Security to the Owner for an amount of 5% of the accepted bid Value in the form of Cash or Bank Guarantee from Nationalised/Scheduled Bank to the Owner. The Performance security shall be refunded/returned to the bidder on completion of work and recording of the completion certificate.

4. Payment against Running Bills:

The Bidder shall be paid for the work done against running bills to be raised not more than monthly. The Final bill will be certified within 60 days from the date of submission. The following payment will be recovered from the bills: Statutory deductions like income Tax, Cess under Building and Other Construction Workers Welfare Cess Act, 1996 etc. as applicable. Any other recovery if becomes due.

Payment shall not be released against 1st R/A bill until submission of following documents by bidder to the Owner:

- a) GST Invoice with revenue stamp.

4.1.1 Basis of Payment in RA bills

Payment in RA bills shall be based on quantity of work executed at site (as per the item of work) & verified by Owner as per the item rate in work orders. Owner is authorized to allow part rate/reduced rate for any item of work.

4.1.2 Disallowance of payment

If payment has been made in RA bill for any item of work but later on some defect is noticed, Owner/Architect is authorized to disallow the payment in the subsequent bills till rectification of the work.

4.2 Final bill

The final bill complete in all respect shall be submitted by the bidder within 60 days from the date of completion of work. The total quantity may vary as per actual work execution/site requirement/and user suggested changes during execution. The bill should be accompanied with the following documents.

- a) Job completion certificate.
- b) Development of lawn and maintenance for two months.

Settlement of final bill shall be made subject to deduction of all dues payable by bidder, settlement of all disputes and furnishing of all required documents/clarifications and grant of extension of time, if any, by Owner's competent authority.

5. Liquidated Damages

0.5% per week of balance / unattended work subject to a maximum of 5% (Five percent) of the Contract value from the stipulated date of completion.

6. Resolution of Disputes

In case the parties don't agree to the advice of owner, then the Director, IIT Roorkee shall appoint a sole arbitrator within 30 days of receipt of request forthwith. The arbitration shall be governed by Arbitration and Reconciliation Act 1956.

7. Notices

For the purpose of all notices, the following shall be the address of the Owner and the Bidder.

Owner: Dean Infrastructure,
Institute Works Department,
Indian Institute of Technology
Roorkee

Bidder: _____

(To be filled in at the time of Signing of the Contract)

8. Resolution of Disputes & Arbitration

Except where otherwise provided in the contract all questions and disputes relating to the meaning of the specifications, design, drawings and instructions here in before mentioned and as to the quality of workmanship or materials used on the work or as to any other question, claim, right, matter or thing whatsoever in any way arising out of or relating to the contract, designs, drawings, specifications, estimates, instructions, orders or these conditions or otherwise concerning the works or the execution or failure to execute the same whether arising during the progress of the work or after the cancellation, terminations, completion or abandonment thereof shall be dealt with as mentioned hereinafter.

If the bidder considers any work demanded of him to be outside the requirements of the contract or disputes any drawings, record or decision given in writing in connection with or arising out of the contract or carrying out of the work, he shall promptly within 15 days request the Owner in writing for written instruction or decision.

If the Bidder is dissatisfied with this decision, the Bidder shall within a period of 30 days from receipt of the decision, give written notice to the IIT Roorkee for appointment of Arbitrator failing which the said decision shall be final binding and conclusive and not referable to adjudication by the Arbitrator.

Except where the decision has become final, binding and conclusive in terms of Sub Para (i) above disputes or difference shall be referred for adjudication through arbitration by a sole arbitrator appointed by The Director, IIT Roorkee. If reason whatsoever another sole arbitrator shall be appointed in the manner aforesaid. Such person shall be entitled to proceed with the reference from the stage at which it was left by his predecessor. It is a terms of this contract that the party invoking arbitration shall give a list of disputes with amounts claimed in respect of each dispute along with the notice for appointment of arbitrator. It is also a term of this contract that no person other than a person appointed by such IIT Roorkee as aforesaid should act as arbitrator and if for any reason that is not possible, the matter shall not be referred to arbitration at all.

It is also a term of this contract that if the contractor does not make any demand for appointment of arbitrator in respect of any claims in writing as aforesaid within 30 days of receiving the intimation from the Owner that the final bill is ready for payment, the claim of the bidder shall be deemed to have been waived and absolutely barred and IIT Roorkee shall be discharged and released of all liabilities under the contract in respect of these claims. The arbitration shall be conducted in accordance with the provisions of the Arbitration and Conciliation Act, 1996 (26 of 1996) or any statutory modifications or reenactment thereof and the rules made there under and for the time being in force shall apply to the arbitration proceedings under this clause.

9. Protection of environment

9.1 The Bidder shall take all reasonable steps to protect the environment on and off the Site and to avoid damage or nuisance to persons or to property of the public or others resulting from pollution, noise or other causes arising as a consequence of his methods of operation.

9.2 During continuance of the contract, the Bidder and his sub-bidders shall at all times abide by all existing enactment on environmental protection and rules made there under, regulations, notifications and bye-law of the State or Central Government, or local authorities and any other law, by-law, regulations that may be passed or notification that may be issued in this respect in future by the State or Central Government or the local authority.

9.3 Salient features of some of the major laws that are applicable are given below:

The Water (Prevention and Control of Pollution) Act, 1974 This provides for the prevention and control of water pollution and the maintaining and restoring of wholesomeness of water. 'Pollution' means such contamination of water or alteration of the physical, chemical or biological properties of water or such discharge of any sewage or trade effluent or of any other liquid, gaseous or solid substance into water (whether directly or indirectly) as may, or is likely to create a nuisance or render such water harmful or injurious to public health or safety, or to domestic, commercial, industrial agricultural or other legitimate uses, or to the life and health of animals or plants or of aquatic organisms.

The Air (Prevention and Control of Pollution) Act, 1981, This provides for prevention, control and abatement of air pollution, 'Air Pollution' means the presence in the atmosphere of any air pollutant', which means any solid, liquid or gaseous substance (including noise) present in the atmosphere in such concentration as may be or tend to be injurious to human beings or other living creatures or plants or property or environment.

The Environment (Prevention and Control of Pollution) Act, 1986 This provides for the protection and improvement of environment and for matters connected to herewith, and the prevention of hazards to human beings. Other living creatures, plants and property, 'Environment' includes water, air and land and the interrelationship which exists among and between water, air and land, and human beings, other living creatures, plants, micro-organism and property.

The Public Liability Insurance Act 1991. This provides for public liability insurance for the purpose of providing immediate relief to the persons affected by accident occurring while handling hazardous substance means any substance or preparation which is defined as hazardous substance under the Environment (Protection) Act 1986, and exceeding such quantity as may be specified by notification by the Central Government.

**Institute Architect,
IWD, IIT Roorkee**



Bill of Quantity

Name of work: Maintenance of Horticulture and Landscaping works at IIT Roorkee Campus.

Sl No.	CPWD DSR 2020 Horticulture		Description of Items	Approx Qty	Unit Per	Rate (Rs)	Amount (Rs)
	Code	P.No.					
1	2.21	87	Excavation in dumped stones or malba including stacking of serviceable and unserviceable material separately and disposal of unserviceable material, lead up to 50 m and lift up to 1.5 m, disposed material to beneathly dressed.	720.00	cum	511.40	368208.00
2	1.1.4 (DSR Civil 2023)	83	Carriage of materials & mechanical transport including loading, unloading and stacking. Lead up to 5 km	720.00	cum	522.70	376344.00
3	1.1.2 (DSR Civil 2023)	83	Carriage of materials & mechanical transport including loading, unloading and stacking. Lead up to 2 km	720.00	cum	245.82	176990.40
4	2.5	227	Rough dressing the trenched ground including breaking clods.	1600.00	sqm	1.50	2400.00
5	2.6	103	Earth work in excavation by mechanical means (Hydraulic excavator) / manual means over areas (exceeding 30 cm in depth, 1.5 m in width as well as 10 sqm on plan), including disposal of excavated earth, lead up to 50 m and lift up to 1.5 m, as per directions of Engineer in Incharge. 2.6.1 All kinds of soil	1600.00	cum	169.25	270800.00
7	2.7	83	Fine dressing of the ground.	1600.00	sqm	3.70	5920.00
8	2.34	91	Providing & laying Selection no. 1 doob grass turf with earth 50mm to 60mm thickness of existing ground prepared with proper level and ramming with required tools wooden and than rolling the surface with light roller make the surface smoothen and light watering the same maintenance for 30 days or more till the grass establish properly, as per direction of officer in charge	1600.00	Per sqm	87.50	140000.00
9	2.29 2.29.1	103	Ploughing the existing ground to a depth of 15 cm to 25 cm and watering the same. 2.29.1 All kinds of Soil.	1600.00	sqm	24.15	38640.00
10	2.60	101	Removal of garden waste by Tata 407 or equivalent including loading/unloading and carriage up to 1 km lead. Complete disposal up to designed place as per direction of officer -in-charge.	120.00	Per Trip	397.55	47706.00
11	2.24	87	Flooding the ground with water including making kiaries and dismantling the same.	1600.00	sqm	2.10	3360.00
12	2.6	83	Uprooting weeds from the trenched area after 10 to 15 days of its flooding with water including disposal of up-rooted vegetation.	1600.00	sqm	4.90	7840.00

13	2.9	83	Mixing earth and sludge or manure in the required proportion specified or directed by the Officer-in-charge	240.00	cum	36.55	8772.00
14	2.28	103	Surface dressing of the ground including removing vegetation and inequalities not exceeding 15 cm deep and disposal of rubbish, lead up to 50 m and lift up to 1.5 m. 2.28.1 All kinds of soil	1600.00	Sqm	23.80	38080.00
			Total				1485060.40
			Say				1485060.00

**Institute Architect
IWD, IIT Roorkee.**