

INDIAN BANK, ZONAL OFFICE, TIRUPPUR,

No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

"TENDER NOTICE FOR INTERIOR FURNISHING, ELECTRICAL, ELECTRICAL FITTING, DATA CABLING, AIRCONDITIONING WORKS AND SUPPLY OF READYMADE CHAIRS AT ZONAL OFFICE, KRBS TOWERS, SECOND FLOOR, No: 208/650(1-10), P.N. ROAD, METUPALAYAM BUS STOP, TIRUPPUR – 641602."

PART - I TECHNICAL BID

ARCHITECTS

S. VIJAY ANAND., B.Arch., Mem COA., AIIA,
DESIGN CONSULTANTS
#1281, Trichy Road, Coimbatore – 641 018, Tamil Nadu, India.
Voice: 91 422 2301246 Fax: 91 422 2301191

Date	: 12.10.2022
	of the contractor:
• • • • • • • •	• • • • • • • • • • • • • • • • • • • •

Ref.No: TZO/FUR/02

Last date of submission oftenders	04.11.2022 upto 16.00Hrs. at Indian Bank, Zonal Office, No:1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.
Date of opening Tender	04.11.2022 upto 16.30Hrs. at Indian Bank, Zonal Office, No:1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.
Cost Of Tender	Free Of Cost.



INDIAN BANK, ZONAL OFFICE, TIRUPPUR, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

INDEX

DESCRIPTION	PAGE NOS.
FORM OF TENDER	3
NOTICE INVITING TENDER	4 - 6
PREQUALIFICATION DOCUMENTS	7 - 15
GENERAL RULES AND INSTRUCTIONS TO TENDERERS	16 - 26
ARTICLES OF AGREEMENT	27 - 30
ARTICLES OF AGREEMENT – ANNEXURE -1	31 - 32
CONDITIONS OF CONTRACT	33 - 55
SAFETY CODE	56 - 69
BANK GUARANTEE FORMAT	70 - 70
SPECIFICATIONS FOR ELECTRICAL WORKS	71 – 78
SPECIFICATIONS FOR PAINTING WORKS	79 - 80
BILL OF QUANTITIES PREAMBLE	81 - 82
APPROVED LIST OF MATERIALS	83 - 85
DETAILED DRAWINGS	86 - 90



INDIAN BANK, ZONAL OFFICE, TIRUPPUR,

No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

FORM OF TENDER

INDIAN BANK Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

Dear Sirs,

SUB: Invitation of Tender for Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers, Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602.

Having examined the drawings, specifications, conditions and schedule of quantities prepared by you, and satisfying ourselves as to the location of the site and working conditions, I/We hereby offer to execute the above works at the respective rates which I/We have quoted for the items in the Schedule of Quantities.

I/We herewith deposit Rs. 1,39,600/- (Rupees One Lakh Thirty Nine Thousand Six Hundred Only) by crossed demand draft payable at Tiruppur and drawn in favour of Indian Bank as Earnest Money Deposit for the due execution of the works at my/our tendered rates, together with any variations should the work be awarded to me/us.

In the event of this tender being accepted, I/We agree to enter into and execute the necessary contract required by you. I/We do hereby bind myself/ourselves to forfeit the aforesaid Earnest Money Deposit of Rs. 1,39,600/- (Rupees One Lakh Thirty Nine Thousand Six Hundred Only) in the event of our refusal or delay in signing the Contract Agreement. I/We further agree to complete the work within the stipulated time specified in the Appendix to General Conditions of Contract.

I/We agree to keep our tender open for **90** (Ninety) days from the date of opening of Envelope No.1.

I/We en	close the comple		documents duly signed			•	Ioney Deposi Bank Dra	
Bank	Guarantee	No.			dated	omy) by	Issued	b
Thankin	g you,			Yours	s faithfully,			
				Repre		he Authorized Tenderer who has the		
Place Date			Witness	N	ature: Vame: dress:			

Seal:



INDIAN BANK NOTICE INVITING TENDER

Indian Bank, Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601 invites sealed Quotes under Two Bid System containing Part-I (Technical Bid) & Part –II (Financial Bid) from Established Interior contractors complying minimum qualification criteria for Civil & Interior Furnishing Work as per Bill Of Quantities and specification and having full time local office at Tamilnadu or Pondicherry_for "Tender for Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works & Supply Of Readymade Chairs At Zonal Office, KRBS Towers, Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602".

1.	Name of work	Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers, Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602. Rs.69.80 Lakhs
2.	Estimated cost of work	Rs.69.80 Lakhs
3.	Period of completion	45 days reckoned from the date of issue of the Work Order or handing over of site whichever is later.
4.	Validity of Tender	60 Days from the date of opening
5.	Defects Liability Period	12 Months from the date of virtual completion of work.
6.	Earnest Money Deposit(EMD)	Rs.1,39,600/- (Rupees One Lakh Thirty Nine Thousand Six Hundred Only) by way of DD in favour of "Indian Bank" payable at Tiruppur.
7.	Initial Security Deposit (ISD)	2% of the Bid Amount (Including EMD amount)
8.	Retention Money (RM)	8% against each RA bill excluding taxes
9.	Total Security Deposit(TSD) ISD+RM	10% of the project cost. (Initial Security Deposit 2% and Retention Money 8%) 50% will be released after 15days of payment of the final bill and the balance 50% will be released after the Defect liability Period of One year).
10.	Value of work for Interim/adhoc Payment	Minimum Rs.20,00,000/- (Rupees twenty Lakhs Only) at a time maximum three times during the execution and it shall be 75% of the works executed / Bill value at site.
	Period of honoring certificate for interim payment/Adhoc payment	10 days from the date of receipt of Bill payment if it is in order
12	Period of honoring FinalCertificate	four weeks from the date of receipt of Bill payment and if it is in order
13.	Liquidated Damages	1% per week of the Contract Value subject to maximum total of 10% of finalContract value
14.	Tender Documents	The Tender Documents can be downloaded from the Bank's website www.indianbank.in
15.	Cost of Tender Documents	Free of Cost.
16.	Last date & time of submission of tenders	04.11.2022 upto16.00 Hrs. At Indian Bank, Zonal Office, Tiruppur, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.
17.	Date & Time of opening of Technical Bid	04.11.2022 at 16.30 Hrs. At Indian Bank, Zonal Office, Tiruppur, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.
18.	Date & Time of opening of Financial Bid	To be intimated only to the tendered qualifying in Technical Bids



19.	Minimum Eligibility Criteria	1) The Average Turnover of last three consecutive financial years should not be less than Rs. 24.4 Lakhs.
		2) Registered office/Branch (Full time office) should be in Tamilnadu / Pondichery agglomeration area.
		They should not have incurred loss in the last 5 years (please attach 5 years (2017-2018, 2018-19, 2019-20, 2020-2021, 2021-22) Profit & Loss statement duly authorized by Chartered Accountant).
		4) Should have carried out similar work of value (ending 30.06.2022) last 5 years
		• One similar works of value not less than Rs. 55.80 Lakhs each. (OR)
		• Two similar works of value not less than Rs. 34.90 Lakhs each. (OR)
		• Three similar works of value not less than Rs. 27.90 Lakhs each.
		5) Should have valid GST NO.
		6) Similar works means: Partition/ false ceiling, Interior Furnishing work, Modular work for any of Central/State Govt Dept, Central Autonomous body, PSU, Corporate, reputed IT companies.
		Sufficient proof has to be attached duly sealed and signed by the applicant. Attested copies of performance certificate issued by the clients of the Tenderer should be enclosed, in support of their experience.
20.	Recovery towards Taxes	As per rules applicable time to time

Note:

- 1. Tenderers are required to submit the bid in 2 parts namely Technical bid and Financial bid. The Technical bid is to be submitted in sealed cover along with necessary documents prescribed in the Bids, Forms and EMD. The Financial bid shall be submitted in a separate sealed cover. The Technical and Financial bids are to be put in a Master envelope (3rd Cover) and sealed and super-scribed 'Tender for Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers, II'nd Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur 641602.' and addressed to the Zonal Manager, Indian Bank, Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur 641601.
- 2. Conditional tenders, late tenders, tenders without EMD or EMD not enclosed with Technical Bids, will be summarily rejected. Any tender received open, late or not meeting all the tender conditions/ Bids not filled up in Pen are liable to be rejected.
- 3. Earnest money will not carry any interest.
- 4. Applications for issuance of tender without complete information and certified photocopies of documents in support of fulfilling the Pre-qualification criteria will not be entertained.
- 5. If any information furnished by the applicant is found incorrect at a later stage, he shall be liable tobe debarred from tendering/taking up the work in Indian Bank.



- 6. The Bank reserves the right to verify the particulars furnished by the applicant independently.
- 7. Short-listing of contractors will be finalized after inspection of works and obtaining confidential reports (if required) from previous employers for only those firms who fulfill the aforesaid Pre- qualification criteria and that specified in Technical bid.
- 8. The bank reserves the right to reject any tender/bid without assigning any reason and to restrict the list of qualified contractors for opening of the financial bid to any number deemed suitable by it, from out of the bids received.
- 9. Bank is not bound to accept the Lowest (L1) tender and reserves the right to accept or reject any or all the tenders without assigning any reason whatsoever.
- 10. Submission of a tender by a tenderer implies that he/she has read this notice and other contract / tender documents and has made himself aware of the scope, specifications, conditions, liabilities and duties bearing on the execution of the contract.
- 11. Return of EMD of remaining tenderers who were unsuccessful in the tender process will be done within a reasonable time say not exceeding 21 days from the date of acceptance of tender/tenders by the L1 bidder.
- 12. Each and every page of the tender documents and correspondences accompanying the tender shall have to be duly signed and stamped by the Bidder / Authorized Signatory before submission.
- 13. The rates quoted by the tenderer shall be based only on the specifications and conditions of the tender documents.
- 14. Bank is not liable to make any payment to tenderers for preparation to submit the tender/bid.
- 15. Pre proposal conference: Pre proposal (Pre-bid meeting) will be held on a pre determined date, which will be intimated to all tenderers in advance. All queries should be intimated to bank in writing two days prior to the meeting (date and time deadlines to be informed) so that Bank/Architect can give suitable replies at the time of pre-bid meeting. Only queries received in advance within the prescribed time shall be entertained. All replies shall be given in the pre-bid meeting only.
- 16. Clarifications, if any, pertaining to these bids may be referred to
- a. **Indian Bank:** Zonal Manager, Indian Bank, Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur 641601. (Contact No: **9640136555)** Between office hours 10 am to 7 pm on all working days.
- b. **Architects:** M/s Design Consultants, S. Vijay Anand, Chief Architect, #1280, Trichy Road, Coimbatore 641018. (0422 2301246, 9842230124) Between office hours 10 am to 7 pm on all working days.

ZONAL MANAGER

Signature & Seal of the Tenderer



PRE-QUALIFICATION DOCUMENTS

1.0 Criteria for Eligibility and documents to be submitted along with Technical Bid(PART - I)

- 1) List of Clients for similar nature of work along with documentary evidences about award / completion of works with value, completion period, type of Buildings, name and address / contact No.
- 2) List of Banker along with address, contact number of Branch.
- 3) Turn-over of the company for the last 5 financial years, supported by documents.
- 4) Organizational chart of the company.
- 5) Organizational chart for the personnel proposed to be deployed at Indian Bank project (Engineer, Supervisor, skilled & non-skilled workers and administrative staff)
- 6) List of plant and machinery available with the firm & to be deployed on the project.

2.0 Documents – details to be enclosed with the Technical Bid (PART-I):

- > Copy of TDS Certificate issued by the employer in support of eligibility criteria.
- ➤ Form A Financial Information
- > Form B- Details of all works of similar class/ nature completed during the last fiveyears ending 30.06.2022.
- Form B-1- Additional Information for completed works
- Form C- Project under execution or awarded as on 30.06.2022 (optional)
- Form D- Performance report for works referred to in Forms B & C
- ➤ Form E Structure and Organization
- ➤ Form E-1- Details of Key Technical and Administrative Personnel employed by the firm/company
- > Form F Proforma on ISO certification (Optional)



FORM 'A'

FINANCIAL INFORMATION

Financial Analysis – Details to be furnished duly supported by figures in Balance Sheet/Profit and Loss Account for the last FIVE years duly certified by the Chartered Accountant, as submitted by the applicant to the Income-Tax Department (Copies tobe attached).

	YEA	.KS		
2017-2018	2018-19	2019-20	2020-21	2021-22
				_

- (i) Gross Annual turn-over inInterior Works:
- (ii) Profit/Loss
- (iii) Financial position:
 - (a) Cash
 - (b) Current Assets
 - (c) Current Liabilities
 - (d) Working capital (b-c)
 - (e) Current Ratio: Current Assets/Current Liabilities (b/c)
 - (f) Acid Test Ratio: Quick Assets/Current Liabilities (a/c)
- II. Income Tax Clearance Certificate
- III. Solvency certificate from Bankers (Schedule Bank) of Applicant.
- IV. Financial arrangements for carrying out the proposed work

SIGNATURE OF APPLICANT's

Signature of Charted Accountant with seal

Name of work/project & location		Agreement No	Scope of work	Cost of work in Crores	Date of commenc ement as per contract	Stipulated Date of completion	Actual date of completi on	Litigation/ Arbitration pending / In progress with details **	Name and address/ Tel No of Officer to whom reference	Remarks
2	3	4	5	6	7	8	9	10	11	12





FORM - 'B1'

ADDITIONAL INFORMATION FOR COMPLETED WORKS

1.	Name of work:
2.	Location:
3.	Client's name and address:
4.	Consultants name and address:
5.	Scope of work:
a.	Total Number of Units:
b.	Number of floors:
c.	Height of the building:
6.	Specialized equipment deployed for the project :
7.	Project Management organization structure:
8.	Number of shifts and its duration adopted inexecution :
9.	Systems adopted for timely completion of the project :
	Signature of Applicant's

PROJECTS UNDER EXECUTION OR AWARDED (Optional)

SL	Name of work/projectO & location	Owner or sponsoring organizations	Agree ment Cost of wor No	Date of comme. k cement as per contract	Stipulated Date of completion	Upto date percentage progress of work	Slow progress, if any, and reasons thereof	Name and address/ Tel No of Officerto whom reference may be made	Remarks(Indicate whether any show cause notice issued or Arbitration initiated during the progress of
1	2 3	4	5	6	7	8	9	10	11



FORM 'D'

PERFORMANCE REPORT FOR WORKS REFERRED TO IN FORM 'B'&'C'

- 1. Name of the work/ Project & Location.
- 2. Scope of work.
 - a. Total Number of Units.
 - b. Number of floors.
- 3. Agreement No.
- 4. Estimated Cost
- 5. Tendered Cost
- 6. Value of work done
- 7. Date of Start
- 8. Date of completion
 - a. Stipulated date of completion.
 - b. Actual date of completion.
- 9. Amount of compensation levied for delayedCompletion, if any.
- 10. Performance report based on Quality of Work, Time Management, and Resourcefulness satisfactory

: Very Good/Good/Fair/Not

DATE

SUPERINTENDING ENGINEER/ CHIEF PROJECT MANAGER OR EQUIVALENT.



FORM 'E'

STRUCTURE AND ORGANISATION

- (i) Name and address of the applicant
- (ii) Telephone No./Fax No/E-Mail address.
- (iii) Legal Status (attach copies of original document defining the legal status)
 - (a) An Individual
 - (b) A proprietary Firm
 - (c) A Firm in partnership
 - (d) A Limited Company or Corporation.
- (iv) Particulars of registration with various Government bodies (Attach attested photo-copy)
 - a) Registration Number.
 - b) Organization / Place of registration
- (v) Names and Titles of Directors and officers with designation to be concerned with this work with Designation of individuals authorized to act for the organization.
- (vi) Was the applicant ever required to suspend work for a period of more than six months continuously after you commenced the construction? If so, give the name of the project and give reasons thereof.
- (vii) Has the applicant or any constituent partner in case of partnership firm/company, ever abandoned the awarded work before its completion? If so, give the name of the project and give reasons thereof.
- (viii) Has the applicant or any constituent partner in case of partnership firm/Company, ever been debarred/black listed for tendering in any organization at any time? If so, give details:
- (ix) Has the applicant or any constituent partner in case of partnership firm, or any directors in case of a Company ever been convicted by a court of law? Or any criminal proceedings presently pending? If so, give details.
- (x) Any other information considered necessary but not included above.

FORM E-1

DETAILS OF KEY TECHNICAL AND ADMINISTRATIVE PERSONNEL EMPLOYED BY THE FIRM / COMPANY

SL. No	Designation	Total Number	Names Qualific		Professional Experience	Length of continuous service with employer
1	2	3	4	5	6	7

Note: additional information about Technical personnel, if any, may be submitted on separate sheet



FORM 'F'

PROFORMA ON 'ISO' CERTIFICATION (Optional)

1.	Year of Certification
2.	Name and Address of Certifying Agency
3.	Name of Management Representative
4.	Validity of Certificate
Note:	Attested copy of certificate (attested by Government Officer or Notary Public) to been closed.
	Signature of Applicant's



GENERAL RULES AND INSTRUCTION FOR THE GUIDANCE OF TENDERERS

- 1 Definition of Terms / Interpretation:
 - i. Employer/Owner/Bank /Indian Bank/ Accepting Authority shall mean Indian Bank with their Zonal Office at Indian Bank, Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur 641601. and any of its employees representative authorized on their behalf.
 - ii. Throughout these bidding documents, the terms "bid" and "tender" and their derivatives ("bidder" / "tenderer"), "biddered / tendered", "bidding" / "tendering", etc.are Synonymous.
 - iii. Day means calendar day. Singular also means plural
 - iv. The terms "The Architects" shall mean M/s. Design Consultants, #1281,Trichy Road, Coimbatore 641018, and his/their legal representatives, permitted assigns, or successors, or in the event of their ceasing to be Architects for the purposes of this contract such other person or persons as shall be nominated for that purpose by the Employer subject to such qualifying provisions as may be agreed upon.
 - v. "Contractor" means the person whose Tender has been accepted by the Employer and the legal successors in title to such person, but not (except with the consent of the Employer) any assignee of such person
 - vi. Tenderer: The term 'Tenderer' shall mean the individual or firm or company whether incorporated or not, undertaking the work and shall include legal representative(s) of such individuals or persons composing such firm or company or successors of such firm or company as the case may be and permitted assigns of such individual or firm or company.
- 2 Earnest money amounting to Rs. 1,39,600/- (Rupees One Lakh Thirty Nine Thousand Six Hundred Only) in the form of Demand Draft drawn in favour of "Indian Bank", payable at Tiruppur must accompany each tender. EMD amount will not carry interest. Tender without earnest money will be summarily rejected.

3 **SUBMISSION OF TENDER:**

- I. The Tender must be submitted in original and as per details given hereunder. The rates shall be filled in the Schedule given in **Part II**, of the tender document.
- II. Tender shall be submitted in two parts in separately sealed envelopes as described below:
 - a. Part I: Technical bid, PQ Documents, EMD
 - b. Part II: Priced Schedule of Quantities in Original
- III. The envelopes containing Volume I and Volume II of offers shall be duly super scribed with the titles "Tender for Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Airconditioning Works And Supply Of Readymade Chairs At Zonal Office, Second Floor, KRBS Towers, II'nd Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur 641602."
- IV. Part II of offer shall contain only the "Schedule of Quantities" and no conditions whatsoever. Any conditions/stipulated by the tenderer in Part II will not be taken into consideration for evaluation of the tenders.
- V. Tenderers are requested to quote strictly as per the terms and conditions, specifications, drawings and tender document and not to stipulate any deviations.



- VI. Addendum/ Corrigendum to this tender document, if issued, must be signed and submitted along with the tender document.
- VII. All pages to be initialed:

All pages of tender documents including any corrections, additions or deletions shall be initialed wherever required in the tender papers by the Tenderer or by a person holding power of attorney authorizing him to sign on behalf of the Tenderer before submission of tender.

VIII. Rates to be in figures and words:

The Tenderer should quote in English both in figures as well as in words the rates and amounts tendered by him in the Schedule of Rates for each item and in such a way that interpolation is not possible. The amount for each item should be worked out and entered and requisite totals given of all items, both in figures and in words. The tendered amount for the work shall be entered in the tender and duly signed & seal by the Tenderer.

Special care should be taken to write the rates in figures as well as in words and the amounts in figures only, in such a way that interpolation is not possible. The total amount should be written both in figures and in words. In case of figures, the words 'Rs.' should be written before the figure of rupees and words 'P' after the decimal figures, e.g. Rs.2.15 "P". and in case of words, the word 'Rupees' should precede and the word 'Paise' should be written at the end, unless the rate is in whole rupees and followed by the words 'only', it should invariably be up to two decimal places. While quoting the rate in schedule of quantities, the word 'only' should be written closely following the amount and it should not be written in the next line.

In case of discrepancy between the rates given by the contractor in words and figures or in the amount worked out the following procedure shall be followed.

When there is a difference between the rates in figures and in words, the rates which correspond to the amounts worked out by the contractor, shall be taken as correct.

When the amount of an item is not worked out by the contractor or it does not correspond with the rates quoted by the contractor in figures as well as in words, the rate quoted in words shall be taken as correct.

- IX. When the rate quoted by the contractor in figures and in words tallies but the amount is not worked out correctly, the rate quoted by the contractor shall be taken as correct and not the amount.
- X. All the errors in totaling in the amount column and in carrying forward the totals shall be corrected.
- XI. The tender total shall be accordingly amended except that there shall be no rectification of any errors, omissions or wrong estimate, in the prices inserted by the tenderer in the bills of quantities.
- XII. In case there is a difference in rate indicated in the original and duplicate copies of the tender submitted by the tenderer, the rate indicated in the original copy will be applicable.

XIII. Corrections and Erasures

Corrections and alterations in the entries of tender papers shall be signed in full bythe Tenderer. Corrections with white fluid and overwriting are not permitted.

XIV. The tender shall contain the names, residence and place of business of person or persons making the tender and shall be signed by the Tenderer with his usual signature. Partnership firms shall furnish the full names of all Partners in the tender. It should be signed in the partnership name by all the partners or by duly authorized representative followed by the name and designation of the person signing. Tender by Corporation shall be signed by an authorized representative, and a Power of Attorney on their behalf shall accompany the tender. A copy of thepartnership deed of the firm with names of all partners shall be furnished.



- XV. When a Tenderer signs a tender in a language other than English, the total amount tendered should, in addition, be written in the same language. The signatures should be attested by at least one witness.
- XVI. Where alternative items are given only the rates in figures and words are to be entered and not thea mounts thereof. A tender which does not show the rates in figures and words for the alternative items may be rejected. The employer reserves to himself the right to take into account any or all of the alternative items for the purposes of accepting a tender or to operate upon any or all of the said alternative items during the execution of the work, partly or fully as required.
- XVII. The quantities furnished in the bills of quantities are only probable quantities liable to alteration by omission, deduction or addition, and it should be clearly understood that the contract is not a lump sum contract and the Architect/Employer, do not, in any way, assure the tenderer or guarantee that the said probable quantities are correct or that the work would correspond thereto. Payments will be regulated on the actual quantities of work done at the accepted rates.

The drawings, specifications and the bills of quantities, forming parts of the contract, are explanatory of and are complementary to one another, representing together the works/installations to be carried out.

If neither the drawings nor the specifications nor the accepted bills of quantities include any part/parts the intention to include which is nevertheless clearly to be inferred and which are obviously necessary for the proper completion of the works/ installations, all such parts shall be supplied and executed by the contractor at no extra charge.

Anything contained in one or another of (a) the drawings, (b) the specifications and (c) the accepted bills of quantities and not found in the others will be equally binding as if contained in each of them.

- XVIII. No alterations which are made by the tenderer in the drawings, specifications or probable quantities accompanying this notice will be recognized, and if any such alterations are made, the tender will be invalid. Remarks, explanations, the tenderer's own terms and conditions, if any should be set out in a covering letter (to be in duplicate) which will become binding only if accepted by the employer in writing at the time of acceptance of the tender.
- XIX. The tenderer must obtain for himself on his own responsibility and at his own expense all the information necessary including risks, contingencies and other circumstances to enable him to make a proper tender and to enter into a contract with the Employer; he must examine the drawings, specifications, conditions and so on and must inspect the site of work, examine the nature of the ground and the subsoil (so far as is practicable), and acquaint himself with local conditions, means of access to the work, the nature of work, in fact all matters pertaining thereto before he submits his tender.

Omission, neglect or failure on the part of the tenderer to so obtain requisite and reliable information on any matter affecting his tender, the contract and the construction, completion and maintenance (during defects liability period) of the work shall not relieve the tenderer whose tender is accepted from any liability in respect of the contract.

The tenderer whose tender is accepted shall not be entitled to make any claim for increase in the rates quoted and accepted. It may please be noted that there shall not be any PVA (Price Variation Adjustment) whatsoever (towards labour and material components including Cement & Steel) as the period of contract is only 12 months.

4 The Indian Bank does not bind itself to accept the lowest or any tender and reserves to itself the right of accepting the whole or any part of the tender and the tenderer shall be bound to perform the same at the rate quoted.



The rate quoted by the Tenderer shall be net (excluding GST), up to the stage of incorporation and handing over site. All taxes including (excluding GST) or any other tax on material or on finished works like Turn-over Tax, including taxes that may be newly introduced subsequent to the tender etc. in respect of this contract shall be payable by the Tenderer and the Indian Bank will not entertain any claim whatsoever in this respect.

The rate quoted should be excluding GST.

The tenderer who wishes to quote for the tender should have GST registration and should mention the registration number.

- 6 Special care should be taken to write the rates in figures as well as in words and the amounts in figures only, in such a way that interpolation is not possible. The total amount should be written both in words and in figures.
- 7 The Tenderer shall give a list of his relatives working with the Indian Bank along with their designations and addresses.
- 8 No employee of the Indian Bank is allowed to work as a contractor for a period of two years of his retirement from Indian Bank service, without the previous permission of the Indian Bank. The contract is liable to be cancelled if either the contractor or any of his employees is found at any time to be such a person who had not obtained the permission of the Indian Bank as aforesaid before submission of the tender or engagement in the Tenderers service.
- 9 The tender for works shall remain open for acceptance for a period of 90 days from the date of opening of Tender. If any tenderer who withdraws his tender before the said period, then the Indian Bank shall be at liberty to forfeit Earnest Money paid along with the tender.
- 10 The tender for the work shall not be witnessed by a Tenderer or Tenderers who himself/themselves has/have tendered or who may and had/have tendered for the same work. Failure to observe this condition would render tenders of the Tenderers tendering as well as witnessing the tender liable to be summarily rejected.
- 11 It will be obligatory on the part of the tenderer to tender and sign the tender documents for all the component parts. All Pages of Tender documents and documents accompanying the Tender shall be initialed at the lower right hand corner or signed there so required in the Tender document by the Tenderer or his authorized representative.
- 12 There is a possibility of considerable quantity variation/deletion in the present scope of work but the Contractor shall not have any extra claims for such variation. The Tender rate will hold good throughout the period of Contract and will be paid for actual quantity executed.
- 13 Transfer of tender documents purchased by one intending Tenderer to another is not permitted.
- 14 The tenderer shall furnish the following details while submitting his tender:
 - i) the makes and types of fittings, materials, subject to the makes and types as specified by the architect in the specifications & BOQ only, which he proposes to use in the work;
 - ii) the details of licenses granted to him and/or to professionally qualified and/or licensed technical personnel on his staff who will be engaged on the work (and submit, if called for, the licenses for inspection by the Architects/Employer).
- 15 The rates quoted in the bills of quantities shall, unless specified otherwise, be deemed to be for finished work in-situ, item by item as provided for, and shall include cost for all necessary material and labour, all necessary incidental charges for "water, electricity," tools and plant and machinery, sheds, marking out, clearing site, etc. and for all taxes, royalties, octroi, excise and any other tax or duty levied



by Government, Central or Local, or Local Authority, if and as applicable including sales tax on works contract, if any.

The rates shall be firm and not be subject to any variations/s in exchange rates, in taxes, duties, works contract tax,etc. in railway freight and the like, labour conditions, etc,.

- 16 The Tenderer must pay the amount of Earnest Money as mentioned in the Notice of Tender Invitation by Bank Guarantee / Bank Demand Draft payable to Indian Bank. No interest on Earnest Money deposited by the Tenderer shall be allowed. The Tenderer should attach the Bank Guarantee / Bank Draft along with the tender failing which the tender will not be considered. No other mode of payment shall be accepted.
- 17 The Earnest Money Deposit of unsuccessful tenderers shall be refunded within three weeks of award of contract to the successful tenderer or within one week of actual commencement of work whichever is earlier and in any case not later than four months.
- 18 The Earnest Money Deposit of the successful tenderer shall be refunded on the acceptance by the Employer of the Contractor's Bank Guarantee/ Demand Draft towards Security Deposit.
- 19 The EMD of the Tenderer, whose tender is accepted, shall be forfeited in full in case he does not start the work by stipulated date mentioned in the award letter.
- 20 The retention amount at 8% on the value of the bill paid will be held by the Indian Bank apart from ISD. 50% of the retention amount & 50% ISD (i.e 50% of TSD) will be paid after 15 days of completion of the project and payment of final Bill and balance 50% will be released at the end of Defects liability period (12 Months), subject to satisfactory rectification of defects noticed, if any. EMD & retention amount held in our Indian Bank's books will not carry any interest.
- 21 The acceptance of a tender will rest with the Indian Bank and the Indian Bank reserves to itself the authority to reject any or all of the tenders received without the assignment of a reason. Tenders in which any of the prescribed conditions are not fulfilled (or) are incomplete in any respect are liable to be rejected. The Indian Bank reserves the right to accept the tender in full or in part and the tenderer shall have no claim for revision of rates or other conditions if his tender is accepted in parts.
- 22 Canvassing in connection with tenders is strictly prohibited and the tenders submitted by the Tenderers who resort to canvassing will be liable to rejection.
- 23 All rates shall be quoted on the proper form of the tender alone. **All the entries to be made legibly in ink only.** Rates written in pencil or any other mode shall not be considered for evaluation and will be rejected.
- 24 An item rate tender containing percentage below / above will be summarily rejected. However, where a tenderer voluntarily offers a rebate for payment along with sealed tender, the same may be considered.
- 25 On acceptance of the tender the name of the accredited representative(s) of the Tenderer who would be responsible for taking instructions from Indian Bank appointed Architect shall be communicated to ZM Indian Bank and the Architect.
- 26 Any tender which purports to alter, vary or omit any of these conditions is likely to be rejected.

approval of the Employer keeping in view the agreed date of completion.

27 The successful tenderer, within two weeks of award of the work to him, shall submit to the Architects an illustrative and suitably coloured work-time chart, in the form of bars or other effective means, showing the item wise / location wise / floor wise progress which he (the contractor) intends to make to enable him to conveniently and practicably complete the work in all respects within the agreed time as per contract. The chart will be scrutinized by the Architects and approved by the Employers with suitable modifications, as and if necessary, and the approved chart will then form part of the agreement, being the basis for assessment of progress under the relevant conditions of contract. The chart may from time to time during the progress of the work be reviewed and modified with the

Page **20** of **90**



- 28 The Contractor shall within 7 days of receiving the WORK ORDER submit **initial** security **deposit of 2%** of the contract value in the form of a **Demand Draft or Bank Guarantee** in an approved format. On acceptance of the Demand Draft or Bank Guarantee by the Employer, the Earnest Money Deposit shall be refunded to the Contractor.
- 29 In the case of any class of work for which there is no specifications, in the said M.D.S.S., C.P.W.D. or Local P.W.D. Specifications, in the said Highways Manuals/Specifications, the said Regulations and Rules and the I.S.S. or in the said Architect's Specifications forming part of the tender documents or in case there is variations, such work shall be carried out in all respects in accordance with the instructions and requirements of the Architects/Employer.
- 30 The Contractor shall comply with and give all notices required under any law, rules, regulations, or bye-law of Parliament, State Legislature or Local Authority relating to works. If needed, the Contractor has to obtain required permission/ approval from the building secretary/ association. The Contractor shall before commencing the execution of work issue a certificate to the Employer that he has obtained all the permissions Registrations and give all the notices as are required to be obtained or given under law particularly blasting permission, Police permission etc.
- 31 The contractor, upon the award of contract, shall furnish all the particulars required and make the necessary application if any to the Local/Municipal Authorities for obtaining water supply and underground sewage connection. Any fee or charges paid by him on behalf of the Employer will be reimbursed to him on the production of relevant vouchers. The materials to be used in sanitary and water supply installations shall be of approved make as listed in the schedule of quantities and shall conform strictly to the relevant Indian Standard Specification.
- 32 The work shall be carried out under the directions and supervision of and subject to the approval in all respects by the Architects/Employer. The contractor shall be required to co-operate and work in co-ordination with and afford reasonable facilities for such other agencies/specialists as may be employed by the Employers on other works/sub-works in connection with the projects/scheme of which this work forms part.
- 33 The contractor will be required to supply, at his own expense, to the Architects, copies of photographs each in triplicate (not less than 25cmX20cm in size) of the works, taken from approved locations of each building at intervals of not more than 1 month during the progress of the work and also at every important stage of the construction, as directed by the Architects/Employers.
- 34 The Contractor shall be required to maintain the site and the building areas in a neat and clean condition at all times to the satisfaction of the Employer. The Contractor shall especially take care to keep areas free from getting water logged, from concrete/mortar dippings, bricks, steel, shuttering materials or any other material / rubbish.
- 35 Debris and items removed from the building have to be neatly stacked at site and then periodically removed (maximum of one week), carried away by the Contractor and disposed off as per the rules and regulations of the Local Authorities concerned. No debris shall be thrown loose from upper floors. No floor, roof or other part of the building shall be over-loaded with debris or materials as to render it unsafe.
- 36 Employer / Architect reserves the right to insist on selection of material, workmanship, detailing and finishes, which they consider, is appropriate, and suitable for the intended use. The contractor is not eligible to claim extra on this account.
- 37 Employer / Architect will require the contractor to produce, samples of all the materials, accessories/ finishes prior to procurement/ manufacture. The material samples for the work shall be got approved from Employer. Failure to comply with these instructions can result in rejection of the work/ materials.



- 38 For painting & Lamination, sample area shall be prepared and the shade got approved. It is also advised to give computer presentation of various color schemes to the Employer/Architect before going for sample painting/Lamination.
- 39 Income Tax will be deducted at source as applicable.
- 40 The Central Excise/ GST gate pass shall be made available for claiming the Modvat for all the Excisable commodities. If proper excisable forms were not submitted by the Contractor the equivalant amount will be debited to their A/c. Any relevant data required for filling the excise forms shall be collected by the Tenderer from the bank, well before supplying the material. (Incase Applicable)
- 41 DESPATCH:

All the materials / Equipments / devices shall be dispatched after inspection and clearance given by the Incharge Engineer. (Wherever Applicable)

Signature of the Contractor	
Name	
Designation	
Address	
Date	

(Signature of the Competent Authority)

INDIAN BANK



- 42 The Tenderer should note that he should execute his part of work without causing any damage to any component of the building and also without disturbing the occupants. Any damage so caused shall be made good at the cost & risk of the tenderer.
- 43 The successful tenderers shall include, in the quoted price, all allied civil works such as chasing in wall, drilling holes etc to support the frames, partitions, make the surface good after grouting, scaffolding required if any to load/ unload the materials etc.
- 44 The successful contractor shall also be responsible for the safety and security of all their materials and also for ensuring fire prevention steps at all times in the working premises including their part of the work. The successful contractor has to place full time representative at site, the representative should have thorough subjectknowledge.
- 45 The work shall be carried out without disturbing the existing occupants of other offices. Necessary barricading of the area, if required from the rest of the area shall have to be arranged by the successful contractor at no extra cost. The work is to be organized and executed so as to have least disturbance to the occupants of other offices.
- 46 No advance payment will be made. However, Interim payment / adhoc payment is permitted minimum Rs. 20,00,000/- (Rupees Twenty Lakhs Only) per occasion maximum of three times as decided by the Bank. The adhoc payment shall be 75% of the works executed /Bill value at site. The bills in proper forms must be duly accompanied by detailed measurements in support of the quantities of work done and must show deductions for all previous payments, retention money etc. The Architect/Employer after detailed scrutiny of the interim bill shall certify within 10 days of the date of receipt of interim bill from the Contractor subject to submission of documentation as required.
- 47 The contractor should ensure payment of minimum wages + VDA to all labourers / workmen staff employed by him in line with central/ state labour wage act whichever higher.
 - The Contractor shall at all times indemnify and keep indemnified the Architect/Employer against all losses, claims, damages or compensation including under the provisions of the payment of the Wages Act 1936, Minimum Wages Act 1948, Employer's Liability Act 1938, Workman's Compensation Act 1923, the Maternity Benefit Act 1961, the Bombay Shops and Establishments Act 1947, Industrial Disputes Act 1947, and Contract Labour (Regulation and Abolition) Act 1970 and Employees State Insurance Act 1948, Motor Vehicles Act 1988 or any modifications thereof or under any other law relating thereto and rules made thereunder from time to time or as a consequence of any accident or injury to any workman or other person in or about the work whether in the employment of the Employer or Contractor or not, and also against all costs, charges and expenses of any suit, action or proceedings whatsoever out of such accident or injury or combination of any such claims.
- 48 From commencement to completion of works, the Contractor shall take full responsibility for the care of the work and for taking precautions to prevent loss or damage to the work to the maximum extent possible and shall be liable for any damage or loss that may arise to the works or any part thereof from any cause whatsoever including causes of fire, lightning, explosion, earthquake, storm, hurricane, floods, inundation, subsidence, landslides, rock slides, riots (excluding civil war, rebellion, revolution and insurrection) or any latent defect or damage and shall at his own cost repair and make good the same so that at all times the work shall be in good order and condition and in conformity in every respect with the requirements of the Contract.

For the purpose of this condition this expression "from commencement to completion of works" shall mean the period starting with the date of issue of Work Order or date of handing over of site whichever is later and ending with issue of Virtual Completion Certificate by the designated Architect / Employer.



Without limiting the obligations and responsibilities under this condition, the Contractor's hall insure and keep insured the works from commencement to completion, asaforesaid, for the full contract value including Price Variation Adjustment if any against the risk of loss or damage from any cause whatsoever including the causes enumerated in the foregoing paragraphs. In the event of there being a variation in the nature and extent of the works, the Contractor shall from time to time increase or decrease the value of the insurance correspondingly. All the premia for the insurance shall be borne and paid by the Contractor.

Before commencing the work, the Contractor shall without limiting his obligations and responsibilities under this condition, insure against any loss of life or injury to any personnel in the employment of Contractor / Sub-Contractor/nominated Sub-Contractor. For this purpose, an insurance shall be taken by the Contractor /Sub- Contractor. Such an insurance shall be taken to include both employees/workmen covered by the Workman's Compensation Act 1923, as well those employees/workmen not covered by the said Act. Separate insurance policies may be taken for employees/ workmen covered by Workman's Compensation Act 1923, and employees / workmen not covered by the said Act. All the premia shall be paid by the Contractor. Policy/Policies taken under this para for the personnel in employment with the Contractor / Sub-Contractor may be in their Employer's names of the Contractor / Sub-Contractor / nominated Sub-Contractors. In the event of any loss or injury to personnel in employment with the Contractor / Sub-Contractor / nominated Sub-Contractors, the Employer and Contractor shall recover directly from the Insurance Company and ensure that payment of the same is made to the affected parties including the Employer. The policy in original shall be deposited with the Employer.

The Contractor shall at all times indemnify and keep indemnified the Employer/Architect against all losses and claims for injuries or damage to any person or any property whatsoever which may arise out of or in consequence of the construction and maintenance of the work and against all claims, demands, proceedings, damages, costs, charges and expenses whatsoever in respect of or in relation thereto. Before commencing the execution of the works, the Contractor shall without in any way limiting his obligations and liabilities under this condition, insure at his cost and expense against any damage or loss or injury which may be caused to any person or property including the employees and directors of the Employer and their property by or in the course of the execution of the works. Such insurance to be known as the Third Party Insurance shall be in a sum of **Rs. 2.0 Lakh**. The Insurance policy to be so obtained by the Contractor shall be deposited by the Contractor with the Employer within Seven days of its issue by the Insurer.

- 49 The Contractor shall take all precautionary measures to ensure the safety of the workmen employed by it. The contractor shall be fully responsible for the any injury or damage caused to the workmen deployed by him at site for carrying out the work and Bank has nothing to do with such happenings and in no way shall be held responsible for the same.
- 50 The contractor shall maintain all registers as required by the Regional Labour Commissioner and should furnish the same to the Bank or its representative as and when required.
- 51 If the work is not started within **4 days** from the date of issue of work order then Employer may terminate the work order without assigning any reason. If during the execution of the work, the progress of work is not considered to be satisfactory and is not consistence to be in contingent with the period of the completion of the work then the Bank may terminate the work order by giving a **5 day's** notice to the contractor. In such case the contractor shall be liable to pay the employer any extra cost involved for the completion of the said work and will not obstruct any way in completing the work through other agency. After completion of entire work, the contractor shall be paid for the actual work executed by him at the quoted rates after deducting any claims, damages.



- 52 The time allowed for completing the works is **45 days** to be reckoned from **4 Days** from the date of Work Order / date of handing over site whichever is later. Tenderers shall submit a programme (time schedule) for executing the entire project and shall furnish the details of their scheme indicating the proposed deployment of their machinery and resources.
- 53 If the Contractor fails to complete any or all the works by the date/s named in **Clause 40** (Date of Completion) or within any extended time (permitted by Bank) then the Contractor shall pay or allow the Employer the sum to be worked out at **1.0%** of contract value per week to be recovered as Liquidated Damages (and not by way of penalty) for the delay, beyond the said date or extended time, as the case may be, during which the works shall remain unfinished and such damages may be deducted from any moneys due or which may become due to the Contractor. The maximum amount of Liquidated damages shall be **10%** of contract value. The contractor shall be bound to extend validity of Insurance Cover till such period of completion as may be considered necessary at their cost.
- 54 The successful tenderer shall be required to execute an Agreement in the proforma attached with this tender document within **4 days** from the date of receipt of the notice of acceptance of tender. In the event of failure on the part of the successful tenderer to sign the agreement within the above stipulated period, the earnest money will be forfeited and the acceptance of the tender shall be considered as cancelled.
- 55 The final bill will be released on satisfactory completion of the entire work and on completion of all the terms and conditions / obligations spelt out and on proper submission of the bill together with the measurements. Final Bill settlement is within 45 days from the date of proper submission of bill & measurements.
- 56 At any stage i.e. during the execution of work, any kind of change required, whether it is in design or specification, the same has to be incorporated by the contractor and It shall be treated as a variation.
- 57 The contractor shall not directly or indirectly sublet the work to other party without written permission of the bank.
- 58 The Bank reserves the right to distribute the work for which quotations have been called, among more than one parties, if found necessary. No claim in this respect shall be considered and the contractor agrees to cooperate with other agencies appointed by the Bank.
- 59 Bank shall not be responsible for any lose or damage to the contractor/labour due to any natural calamity during the course of construction. Contractor is liable to make good all the damages if any, till the work is completed and handed over to the Bank authorities
- 60 No advance payment shall be made to the contractor on supply of any material supplied at site for execution; payment shall only be made on execution and completion of any concerned/particulars item.
- 61 Contractor agencies are advised (before quoting the rates) to inspect the site of the proposed work. They must go through specifications and documents. Any clarification, if required, may be taken from the bank before submitting the quote.
- 62 The quantities mentioned in schedule are provisional and likely to increase /decrease to any extent or may be omitted thus altering the aggregate value of the contract. No claim for loss of profit/business shall be entertained on this account.



- 63 The contractor /vendor failed to carry out the works as per schedule/Quality, the same shall be carryout with different agencies and the actual amount will be deducted from the contractor bills.
- 64 Payment to the contractor shall be made as per actual work done at site.
- 65 The contractor agency shall keep particular vigil on his workers to maintain very good workmanship of all items, failing which no payment shall be made and no claimof material/ labour used shall be made to him in any case, and the same work shall be executed by him again without charging any extra cost.
- 66 The Bank reserves the right to accept/reject any quotes without assigning any reasons.
- 67 Any work got executed in poor workmanship as pointed out by the Bank' Official or as indicated by Architect will have to be dismantled and redone by the Contractor on his own cost
- 68 Any addition, alteration or correction in the quote shall be signed and stamped properlyby the contractor.
- 69 In case of any ambiguity, conflict of interpretation shall prevail; the Bank/Architects decisions in this regard shall be final and binding
- 70 The Contractor shall be bound to carry out any extra items of works, whenever possible the rate for extra item shall be derived from the rate already quoted, otherwise the rate shall be worked out at cost of material + labour + 15% overhead wastage and profit.
- 71 The Contractor shall submit his running bills for payment concerning work executed or materials delivered on the site, or work executed at his workshop which will be certified by the Architect for payment within 10 days from the date of submission of bill.
- 72 The Architect will not certify any application for payment if there are:
 - a) Defective items of work still uncorrected.
 - b) Any claims or liens filed against the contractor for failure to pay for materials, labour or sub-contractors amounts due; or reasonable evidence that indicates probable filing of such claims.
 - c) Damage to another contractor.
 - d) A reasonable doubt that the contract can be completed for the balance then unpaid.
- 73 When the works are completed in all respects, the Contractor shall intimate in writing to the Architects and the Bank to enable to take possession of the same. The works shall not be considered virtually complete until the Bank/Architect have jointly inspected the works and certified in writing that this has been completed.

ZONAL MANAGER,

Indian Bank, Zonal Office, No. 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

Signature & Seal of the Tenderer



ARTICLES OF AGREEMENT

THIS AGREEMENT is made on this day ofmonth of between Indian Bank
having its Zonal Office at No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur - 641601. (hereinafter
referred to as the "Employer") which expression shall include its successor, legal heirs and assignees of the one
part.
AND M/s having its office at
(hereinafter referred to as the "Contractor") which expression shall include its successor, legalheirs and assignees
of the second part.
WHEREAS the Employer has appointed architect S. Vijay Anand of M/s. Design Consultants of Coimbatore as Architectural consultants for the furnishing works described below to produce drawings, tender documents for 'Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602' and supervise the works for successful completion within the stipulated time interval.
AND whereas the Employer has called for tender vide ref. no.
dated
AND whereas the contractor has submitted the tender ref. no.
Dated to the Employer on
AN D whereas the Employer has issued the work order ref
Datedto the contractor to do the work.
AND whereas the Contractor has agreed to execute the work as per drawings, specifications, conditions of
contract and Work Order.
AND whereas the Employer has accepted the Contractor's tender as aforesaid and whereas the tender submitted
by the contractor has been accepted for such sum as may be ascertained to be payable in terms of the Bill of
Quantities and which sum is estimated to be Rs (Rupees
hereinefter referred to as the said "Contract Agreement"

NOW THIS AGREEMENT WITNESSETH AS FOLLOWS:

In consideration of the said Contract Sum to be paid at the times and in the manner set forth in the said Conditions the Contractor shall carry out and complete **Interior works** in terms and conditions herein contained and according to the general conditions of the contract, notice inviting tender, special conditions of contract, general scope of work, technical specifications, schedule of rates and instructions to be given by and the supervision of and to the entire satisfaction of the Employer.



2) Contract Price, Taxes and Payment Terms:

Total contract price is Rs. which is inclusive of cost of materials, equipment, installation charges and tools and tackles required for execution of the job. Above price is inclusive of all taxes & duties including excise duty, sales tax, works contract tax, income tax, octroi etc. in respect of this contract. No claim in this respect will be entertained. Sales tax on works contract & Income tax on payments will be deducted and deposited by Employer in accordance with the sales tax law of the state and the provisions of tax deductions at source under income tax act 1961.

However, interim payment will be made as per the site measurements on Item Rate basis.

3) **Completion Period**:

Time is the essence of the Contract. The work is to be completed in all respects within **45 days** reckoned from **4**th **day** from the date of issue of the Work Order or handing over of site whichever is later. If the Contractor fails to complete the job within the agreed time period the Contractor will have to bear liquidated damages as per the relevant clause mentioned in the Tender Documents.

4) Earnest Money Deposit

The Contractor has deposited an amount of Rs.1,39,600/- (Rupees One Lakh Thirty Nine Thousand Six Hundred Only) as earnest money by way of DD in favour of "Indian Bank" payable at Tiruppur.

5) **Inspection of Site**:

The Contractor has inspected the site before submitting his tender and has satisfied himself as to the nature of the work to be executed on the site. The site located at Second Floor, KRBS Towers, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602."

Any difficulties which the Contractor may come across in the course of the work shall in no way relieve the contractor to claim or receive extra payment unless the Employer is of the opinion that such difficulties could not have been foreseen and the Employer consents in writing.

6) Supply of Material and Labour:

The Contractor shall arrange all labour, materials, equipments, tools, tackles and everything necessary for the completion of the work. The Contractor will assume all responsibility for the safety, protection and accounting of all material and equipment and the work during construction. All materials used by the Contractor shall be of the best quality conforming to the required specification mentioned in the tender documentand will be subject to the approval of the project Architect. All such materials not approved by the Employer/Architect shall be removed at once by the Contractor at his own expense. The Contractor shall also at his own expense arrange for carrying out any test of materials which the Employer may from time to time require or if so desired by the employer/architect.

7) **Defective Work / Materials:**

If any part of the work done by the Contractor is found defective in workmanship or if bad or inferior materials have been used the Contractor shall at his own risk and cost demolish all such defective work and rebuild the same and / or replace the bad or inferior materials used within a time frame mentioned to the satisfaction of the Employer/Architect. The decision of the Architect/Employer in this regard shall be final and binding on the Contractor. In case of default of the contractor to remove the defective work and rebuild the same or replace bad or inferior materials as directed by the Employer, the Employer shall be entitled to employ anyone else to carry out the same at risk and cost of the Contractor and recover all expenses incurred in this regard from the contractor.



8) **Inspection of Work**:

During progress of the work the Employer /Architect shall be entitled at all times to have access to and inspect the work.

9) **Supervision**:

The Contractor shall provide one or more competent and technical qualified engineers duly and fully authorized to act on his behalf in all matters relating to the works to be carried out under or any other matter concerning this agreement and who shall at all times be present at the works while any work is in progress as per directions, explanations & instructions of Employer / Architect.

10) Compliance with Statutory Regulations & Work Rules:

The Contractor shall be responsible for complying with the applicable laws / bye laws / Regulations in force from time to time and shall have to bear all statuary liabilities to the workers / personnel engaged for the job. Nothing will be paid extra in this regard. If any amount is paid by the Employer with this regard the same amount shall be deducted from the Contractor's dues. The Contractor shall have to arrange insurance cover for the workers / personnel engaged by him for the job and materials & works supplied/carried out at site/work place. Also to be adhered as per Tender Clause No.:34,35,36 & 37 of General Rules and Instruction for The Guidance of Tenderers.

11) **Termination of Contract**:

In the event of Contractor failing to keep / adhere to agreed schedule of work, or in the event of the Contractor failing to comply with the provisions of this contract by default and / or negligence and / or suspension of work or in the event of Contractor failing to complete the work within the stipulated period, the Employer may terminate this Agreement forthwith and employ, at the Contractor's risk and cost, another contractor or sufficient number of workmen to complete the work.

12) Force Majeure:

This clause will be operative only if the work is delayed by

- a) Acts of God
- b) Earthquake or floods or similar natural calamities.
- c) Serious loss or damage by fire or lightning.

In case any Force Majeure condition herein mentioned occurs and continues for a period exceeding 15 days the parties here to undertake to sit together and devise ways for expeditious and proper performance of the obligations of the parties under this order.

13) **Arbitration**:

"In the event of any dispute or difference relating to interpretation and application of provisions of the contract and all disputes/ claims whatsoever which shall either during the continuance of the contract or afterwards either between the parties to the contract or the respective representatives touching the construction/ application of any provision/ clause mentioned in the contract or any account or liability between the parties to the contract or as to any act or deed or omission of any party to the contract, in any way relating to these presents, shall be first at the discretion of the Bank attempted to be resolved in good faith by mutual discussion within 30 days of the dispute or question being raised failing



which the same shall be settled by arbitration in accordance with provisions of Indian arbitration and Conciliation act 1996.

The Parties concerned shall designate an arbitrator on mutual consent/ consensus. The venue of the arbitration shall be exclusively at **Tiruppur** and any award passed by arbitrator shall be final, conclusive and binding upon the parties and shall be deemed to have been made between parties themselves. The parties to the dispute shall share equally the cost of arbitration as intimated by the arbitrator".

Submitting to arbitration may be considered as an additional remedy and it does not preclude the right of the bank to seek other redressal/ Other Recourse.

14) The bank and the contractor agree that this agreement is entered in to on Principal to Principal basis. Nothing contained in this agreement shall be construed to create any association, Joint venture or Partnership or Relationship of Principal and Agent or Master and Servant or Employer and Employee between the Bank and the contractor. The parties to the agreement shall be deemed to be independent entity and employees of wither of the parties shall not deemed to the employees of the other. Neither party shall have authority to bind other except to the extant authorized herein.

IN WITNESS whereof the said contracting parties have set their hands and seals on the dayand year first hereinabove witness.

Witness Address	Contractor

Witness Address

Employer



ARTICLES OF AGREEMENT – ANNEXURE - 1

Articles of Agreement made at Tiruppur this day of, Two Thousand between The Zonal Manager, Indian Bank, Zonal Office, No: 1, Harvey Road, Mehal Towers, Third Floor, Tiruppur – 641601. (hereinafter referred to as "The Employer" which expression shall unless excluded or repugnant to the context be deemed to include its successors and assigns) of the one part, and M/s carrying on business at excluded or repugnant to the context be deemed to include their heirs, executors, administrator representatives and assigns) of the other part.
WHEREAS 1. The Employer is desirous of carrying out works including Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers, Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602. and has drawings and specifications, schedule of quantities describing the work to be done, have been prepared by Architects M/s. Design Consultants, # 1281 Trichy Road, Coimbatore - 641 018, under the direction of the Employer. AND WHEREAS the said drawings referred in the Schedule and the bill of quantities along with technical specifications also referred in Volume-II were prepared as per M.D.S.S/ C.P.W.D./ Local P.W.D specifications / Highways Manuals/ The Indian Standard specifications / Architect's specifications and have been signed by on behalf of the parties hereto. The Employer is desirous of completing the said work strictly and according to the said drawings and specifications.
2. The contractors in their tender dated
3. The contractor has deposited Rs
NOW IT IS HEREBY MUTUALLY AGREED AND DECLARED BETWEEN THE PARTIES HERETO AS FOLLOWS:
1. The contractor hereby agrees and undertakes to execute and complete the said works shown the said drawings and such further detailed drawings as may be furnished to it by the Employer and described in the said specifications and the said schedule of quantities upon and subject to the said conditions.
2. In consideration of the sum of Rupees

and specifications.



- 3. The terms "The Architects" in the said conditions shall mean M/s. DESIGN CONSULTANTS, or in the event of their ceasing to be Architects or the purposes of this contract, such other person as shall be nominated for that purpose by the Employer, provided always that no person subsequently appointed to be Architect under the contract shall be disregard or overrule any decision or approval or direction given or expressed by the erstwhile Architects for the time being except with the approval of the employer.
- 4. The said conditions, specifications and priced bills of quantities shall be read and construed as forming part of this agreement, and the parties hereto shall respectively abide by and submit themselves to the conditions and stipulations and perform the agreement on their parts respectively in such conditions, specifications and priced bills of quantities contained.
- 5. The Employer shall for such civil and electrical works, pay to the contractor such sums as shall become payable at time, in the manner specified in the said conditions.
- 6. The said tender and allied documents, drawings, specification, priced schedule of quantities, agreement and documents above mentioned, shall form the basis of this contract and the decision of the Employer as mentioned in the condition of contract with reference to all matters of disputes as to materials, workmanship of account and as to the interpretation of the clauses of this agreement or the said conditions shall be final and binding on both the parties.
- 7. The contract herein contained, comprises of the said work above mentioned and all subsidiary works connected therewith in the same site as may be ordered to be done from time to time by the Employer even though such works may not be shown in the said drawings or described in the said specifications or the schedule of quantities. The contractor hereby agrees and undertakes to do and perform all such works in a though and work manlike manner, with best materials and within the time limit herein mentioned.
- 8. The Employer reserves to himself the right to alter the drawings and nature of the work and of adding or omitting any item of work or of having portions of the same carried out departmentally or otherwise and such alterations or variations shall be carried out without prejudice to this contract.
- 9. The said conditions shall be read and construed as forming part of this agreement and the parties hereto will respectively abide by and submit themselves to the conditions and stipulations and perform the agreements on their parts respectively as such conditions contained.
- 10. It will be the entire responsibility of the contractor to procure all materials required for the said works.
- 11. The contractor shall complete the said work within Twelve months from the date of commencement of work as per work order for the work and will remove from the site all plants, scaffoldings, materials in use, rubbish and leave the work site clean within the said period.
- 12. All disputes arising out of or in any way connected with this agreement shall be deemed to have arisen in Coimbatore and only courts in Coimbatore shall have jurisdiction to determine the same.
- 13. The several parts of this contract have been read and fully understood by us.
- 14. The work-order issued to the contractor shall be treated as part of this agreement.



CONDITIONS OF CONTRACT

1. Interpretation Clauses:

- i) In construing these conditions, the specifications, schedule of quantities, and contract agreement, the following words shall have the meanings herein assigned to them except where the subject or context otherwise requires.
- ii) Headings and marginal notes to the conditions of contract shall not be deemed to form part thereof or be taken into consideration in the interpretation or construction thereof or of the contract.
- iii) Where the context so requires (i) words importing persons include firms and corporations and
- (ii) words importing the singular only also include the plural and vice versa.
- a) Employer shall mean **M/s. INDIAN BANK** their officers and executives and include his/their legal representatives, permitted assigns, or successors.
- a-i)<u>Architects</u> (Architect)shall mean **M/s. DESIGN CONSULTANTS**, #1281,Trichy Road, Coimbatore 641018, and his/their legal representatives, permitted assigns, or successors, or in the event of their ceasing to be Architects for the purposes of this contract such other person or persons as shall be nominated for that purpose by the Employer subject to such qualifying provisions as may be agreed upon.
- c) <u>Site</u> shall mean the land and/or other places on, into or through which work is to be executed under the contract or any adjacent land, path or street through which work is to be executed under the contract or any adjacent land, path or street which may be allotted for use for the purpose of carrying out the contract.
- d) The Contract or this Contract shall mean the tender documents comprising the notice inviting tender, form of tender, the tender conditions, the drawings, and priced bills of quantities, the acceptance thereof, and the articles of agreement, together with the conditions of contract with its appendix and special conditions, if any, the specifications designs, drawings and instructions, issued from time to time by the Architect/Employer and all these documents taken together are deemed to form one contract and shall be complementary to one another.
- e) <u>Bill of Quantities</u> variously also termed 'Priced Bill of Quantities', 'Schedule of Quantities', Schedule of Rates', 'BOQ's' shall mean the schedule of quantities originally furnished with the notice inviting tender, duly priced in by the tenderer and accepted by the Employer for inclusion as a part of the contract for determining the consideration payable to the contractor, for executing the work and as part of the contract agreement, it is also referred to as the contract schedule.
- f) Notice in writing or written notice shall mean a notice in written, typed or printed characters sent (unless delivered personally or otherwise proved to have been received) by registered post to the last known private or business address or to the registered office of the addressee and shall be deemed to have been received when in the ordinary course of post it would have been delivered.



- g) Act of Insolvency shall mean any Act of Insolvence as defined by the Presidency Towns Insolvency Act, or the provincial Insolvency Act or any Act amending such original.
- h) Net Prices If in arriving at the contract amount, the contractor shall have added to or deducted from the total of the items in the Tender any sum, either as a percentage or otherwise, then the net price of any item in the tender shall be the sum arrived at by adding to or deducting from the actual figure appearing in the tender as the price of that item, a similar percentage or proportionate sum, provided always that in determining the percentage or proportion of the sum so added or deducted by the contractor, the total amount of any provisional sums of money shall be deducted from the total amount of the tender. The expression "net rates" or "net prices" when used with reference to the contract or accounts shall be held to mean rates or prices so arrived at.
- i) The works (or the work) shall unless there be something either in the subject or context repugnant to such construction, be considered and taken to mean the works by or by virtue of the contract, contracted to be executed whether temporary or permanent, and whether original, altered, substituted or additional. Wherever the word "works" is used it shall cover "installations" also under the same definition.
- j) Excepted risks are risks due to riots (otherwise than among contractor's Employees) and civil commotion (in so far as both these are uninsurable), war (whether declared or not); invasion, act of foreign enemies, hostilities, civil war, rebellion, revolution, insurrection, military or usurped power, any act of Government, damage from aircraft, acts of God such as earthquake, lightning and unprecedented floods and other causes over which the works / installations were not designed by employer of the said works/installations in respect of which a certificate of completion has been issued or a cause solely due to faulty design of works.
- k) <u>Provisional Items</u> shall mean items for which very approximate quantities have been included in the tender document.
- l) <u>Virtual completion</u> of works/installations shall mean the substantial completion of the work/installations in accordance with the contract enabling the Employer to take over the same.
- 2. Architect's/Employer's Instructions: The contractor shall execute the whole and every part of the work in the most substantial and workmanlike manner and both as regards materials and otherwise in every respect in strict accordance with the specifications, conforming exactly, fully and faithfully to the designs, drawings and instructions in respect of the work given by the Employer/Architects and under the directions of and under the supervision of and subject to the approval in all respects, by the Architects/Employer who may in their discretion and from time to time issue further drawings, and/or written instructions, directions and/or written instructions details and explanations which are hereafter collectively referred to as "Architects/Employers instruction" in regard to:
- a) Variation or modification of the design including structural design, quality or quantity of works or the addition or omission or substitution of any work.
- b) Any discrepancy in the drawings or between the schedule of quantities and/or drawings and/or specifications.



- c) The removal from the site of any materials brought thereon by the contractor and the substitution of any other materials therefor.
- d) The removal and/or re-execution of any works executed by the contractors.
- e) The dismissal from the works of any persons employed thereupon.
- f) The opening up for inspection of any work covered up.
- g) The amending and making good of any defects under Clause 19.

The contractor shall forthwith comply with and duly execute any work comprised in such Architect's/Employers instructions provided always that verbal instructions, directions and explanations given to the contractor or his representative upon the works by the Employer/Architects shall if involving a variation, be confirmed in writing by the contractor within seven days and if not dissented from in writing within a further seven days by the Architects/Employer such shall be deemed to be Architect's/Employer's instructions within the scope of the contract.

The Architects/Employer shall be entitled to direct at what point or points and in what manner the works are to be commenced, and from time to time carried on.

Notwithstanding anything herein contained, the Architect or his representative shall not, without the prior concurrence in writing of the Employer issue any instructions verbal or in writing which will result in the Employer having to pay the contractor an additional sum greater than Rs:3,000/- in all, and all instructions issued to the contractor should forthwith be brought to the notice of the Employer. The contractor shall submit a statement of variations giving quantity and rates duly supported by analysis of rates, vouchers, etc. The rates on scrutiny and final, acceptance of the Employer under the terms of Clause 17 hereof shall form a supplementary schedule of quantities. The Employer shall not be liable for payment for such variations until the supplementary schedules are sanctioned by it.

3. Agreement copies to be supplied

The contract shall remain in the custody of the Employer and shall be produced by him at his office as and when required by the Architects or the Contractor. The contractor on the signing hereof shall be furnished by the Architects/Employer free of cost with a certified copy of the agreement and one copy of each of the said drawings issued during the progress of the works. Any further copies of such drawings required by the contractor shall be paid for by him. The contractor shall keep one copy each of all drawings on the works and the Architects/Employer or his representative shall at all reasonable times have access to the same. Before the issue of the final certificate to the contractor he shall, if so required, forthwith return to the Architect all drawings and specifications.

4. The contractor to provide everything necessary:

The contractor shall be deemed to have satisfied himself before tendering as to the correctness and sufficiency of his tender for the works and of the rates and amounts stated in the schedule of quantities and/or the schedule of rates and which rates and amounts shall except as otherwise provided cover all the obligations under the contract, and all matters and things necessary for the proper completion of the works.



Drawings to be kept on site : One copy of the approved drawings furnished to the Contractor shall be kept by the Contractor on the site and the same at all reasonable times be available for inspection and use by the Employer.

The contractor shall provide at his own cost all materials (except such materials if any, as may in accordance with the contract be supplied by the Employer), machinery, plant, tools, appliances, implements, ladders, cordage, tackle, scaffolding, temporary works, etc. together with carriage therefor to and from the site, in fact everything necessary for the proper execution of the work, whether original, altered or substituted according to the true intent and meaning of the drawings, schedule of quantities and specifications, original or substituted taken together, whether the same may or may not be particularly shown or described therein provided that the same may be reasonably inferred there from, and if the contractor finds any discrepancy in the drawings, or between the drawings, schedule of quantities and specifications, he shall immediately and in writing refer to the Architects who shall decide which is to be followed, subject to.

- i) Anything shown or contained in any one or other of (a) the drawings, (b) specifications and (c) the contract schedules, and not shown in the others shall be equally binding as if it were contained in each of them.
- ii) Figured dimensions are to be followed in preference to the scale, and large scale details in preference to small scale drawings.
- iii) The following order or preference shall apply:
 - (a) Specifications, covered by bills of quantities,
 - (b) Architect's specifications,
 - (c) The drawings
 - (d) The CPWD/MOST IRC/Highways Manuals specifications/I.S.Specifications.

5. Contractor to conform to local regulations:

The contractor shall conform to the provisions of any Act of the Legislature relating to the works and to the regulations and By-laws of any Authority and of any water, lighting and other Companies and/or Authorities with whose systems the structure is proposed to be connected, and shall, before making any variations from the drawings or specification that may be necessitated by so conforming, give to the Architect/Employer written notice, specifying the variation proposed to be made and the reason for it, and apply for instructions thereon. In case the contractor shall not within ten days receive such instructions he shall proceed with the work, conforming to the provisions, Regulations, or by-laws in question, and any variation so necessitated shall be dealt with under Clause Nos.13 and 17.

The contractor shall bring to the attention of the Architect/ Employer all notice required by the said Acts, regulations or by- laws to be given to any Authority and pay to such Authority, or to any Public Office all fees that may be properly chargeable in respect of the works and lodge the receipts with the Architect/Employer. The contractor shall indemnify the Employer against all claims in respect of patent rights and shall defend all actions arising from such claims and shall himself pay all royalties, license fees, damages, cost and charges of all and every sort that may legitimately be incurred in respect thereof.



<u>6. Contractor responsible for setting out work:</u>

The contractor shall on the basis of dimensioned drawings and information necessary for the purpose, furnished by the Architects, set out the works on site at his own expense and be responsible for the correctness of the positions, levels, dimensions and alignment of all parts thereof. The checking of any setting out by the representative of the Architect or of the Employer shall not in any way relieve the contractor of the responsibility for the correctness thereof and he shall amend at his own cost and to the satisfaction of the Architect/Employer any error in the setting out or consequential to wrong setting out, found at any stage during the progress of the work or during the defects liability period after completion of the work.

7. Materials to conform to specifications:

All materials and workmanship shall so far as procurable conform strictly to requirements in accordance with the drawings and as described in the schedule of quantities and/or specifications and in accordance with the Architect's instructions, and the contractor shall upon the request of the Architect/Employer furnish proof to his satisfaction that they so conform and if required shall also furnish all invoices, accounts, receipts and other vouchers for the purpose.

The contractor shall place order for all materials required in time and in any case not later than the dates fixed in the approved programme. Where in the matter of procurement of such regulated by Government, Central or Local, or by any other Central or Local Authority, the Employer is obliged to issue any certificate or sign applications for license or permit, by virtue of orders of such Government or Authority or by custom or practice it shall be the sole responsibility of the contractor to arrange for all the formalities to be completed in time and follow up the matter with the concerned Authorities and to procure the materials in time for incorporation in the works/installations according to the approved programme, and the Employer or the Architect will not assume any responsibility for delays in this regard nor any responsibility for the payment of fines, penalties, demurrage and so forth due to the contractor not taking timely action in the process of procurement. The contractor shall not raise any plea, quoting delays in the completion of the formalities or of delays by the Authorities concerned for any compensation whatsoever.

However, the contractor shall before he places orders for supply, furnish to the Architect/Employer, at his own expense, samples of materials proposed to be used in the works, well in time.

The Architect/Employer will within two weeks of the day of supply of samples or within such further period as it may require, depending upon each case, intimate to the contractor whether the samples are approved by him or not. If samples are not approved the contractor shall forthwith arrange to supply to the Architect/Employer for his approval fresh samples complying with the specifications.

The contractor shall indemnify the Employer or any agent, servant or employee of the Employer against any action, claim or proceeding relating to infringement or use of any patent or design or any alleged patent or design rights and shall pay any royalties or other charge which may be payable in respect of any article or material or part thereof included in the contract. In the event of any claims being made or action being brought against the Employer or any agent, servant or employee of the Employer in respect of any such matters as aforesaid, the contractor shall immediately be notified thereof. Provided that such indemnity shall not apply when such infringement has taken place in complying with specified directions issued by the Employer or the Architects in connection with the contract, but the contractor shall pay any royalties or other charges payable in respect of any such use, the amount so paid being reimbursed to the contractor only if the use was the result of any drawings and/or specifications issued after conclusion of the contract.



All charges on account of octroi, GST, terminal or sales tax and other duties on materials obtained for the works from any source, (other than materials supplied by the Employer) shall be borne by the contractor.

The Architects/Employer shall be entitled to have tests carried out on the work or its parts or accessories, either during its progress or on completion, where and when deemed necessary or on any materials to be incorporated in the work/installation supplied by the contractor or otherwise, notwithstanding that the work or its parts or accessories or the said materials have been accepted and passed, at the cost of the contractor who shall arrange to have the tests carried out as and when directed, providing for the purpose the necessary facilities to the Architects. The costs of the tests and of the materials and labour involved in the testing operations shall be borne by the contractor in all cases except as otherwise provided for in the contract.

The methods of sampling, the nature and extent of the tests to be carried out and their interpretation shall be in accordance with the relevant I.S.S. Unless otherwise provided in this contract. The name of the laboratories or test houses in which the tests are to be carried out shall be got approved by the Architects/Employer and the test results shall be submitted regularly to the Architects/employer

Works during nights or holidays: Subject to any provisions to the contrary contained in the Contract, none of the permanent works shall be carried out during night or on weekly and authorised holidays without the permission in writing of the Architect except when the works is unavoidable or absolutely necessary for the safety of life, property or works, in which case the Contractor shall immediately advise the Employer accordingly. Provided always that the provisions of this clause shall not be applicable in the case of any work which it is customary to carry out in rotary or double shifts.

8. Supervision by Contractor:

The contractor shall give all necessary personal superintendence during the execution of the works, and as long thereafter as the Architects/Employer may consider necessary until the expiration of the "Defects Liability Period", stated in the Appendix hereto. The contractor shall also during the whole time the works are in progress, employ a competent and qualified representative whose name shall be approved by the Architect/ Employer and who shall be constantly in attendance at the works while the men are at work. Any directions, explanations, instructions, or notices given by the Architects/Employer to such representative shall be held to have been given to the contractor.

If the contractor fails to appoint and keep on the works a competent and qualified representative as aforesaid the Employer/ Architects shall have powers to suspend the works till such time a competent and qualified representative as aforesaid is posted and the contractor shall not be entitled to claim extension of time on the plea of such suspension of the works.

9. Dismissal of workmen:

The contractor shall on the request of the Architect/Employer immediately dismiss from the works any person employed thereon by him who may, in the opinion of the Architect/Employer be incompetent or mis-conduct himself, and such persons shall not be again employed on the works without the permission of the Architect/Employer.



10. Access to Works:

The Employer, the Architect and his respective representative shall at all reasonable times have free access to the works and/or to the workshops, factories or other places where materials are lying or from which they are being obtained and the contractor shall give the employer, the Architect and his respective representative, all reasonable facilities necessary for inspection and examination and tests of the materials and workmanship. No person not authorized by the Employer or the Architect except the representatives of Public Authorities shall be allowed on the works at any time.

11. Site Engineer/Asst. Engineer/Clerk of Works:

The terms "Site Engineer/Asst. Engineer/Clerk of Works" shall mean the person appointed, and acting under the orders of the Architects/Employer to inspect the works in the absence of the Architect or the Employer; the contractor shall afford the Site Engineer/Asst. Engineer/Clerk of Works every facility and assistance for inspecting the works and materials and for checking and measuring the work and materials. Such person/ persons shall be considered to act solely as Inspectors.

If any work or materials is not approved by the site Engineer/ Asst. Engineer/Clerk of Works or any such representative, such work shall be suspended or the use of such material shall be discontinued until the decision of the Architect/Employer is obtained. The work will from time to time be examined by the Architect/Employer, the Site Engineer/Asst. Engineer/Clerk of Works or the Architects' representatives, but such examination shall not in any way exonerate the contractor from the obligation to remedy any defects which may be found to exist at any stage of the works or after the same is completed. Subject to the limitation of this Clause the contractor shall take instructions only from the Architect/Employer.

12. Work not to be sublet:

The whole of the works included in the contract shall be executed by the contractor who shall not directly transfer, assign or underlet the contract or any part share thereof or interest therein without the written consent of the Employer; and no undertaking shall relieve the contractor from the full and entire responsibility of the contract or from active superintendence of the works during their progress.

13. Variation not to vitiate the contract:

No alteration, omission or variation shall vitiate this contract but in case the Architect thinks proper at any time during the progress of the works to make any alterations in addition to or omissions from or substitutions for the original drawings, specifications, designs and instructions or any alterations in the kind or quality of the materials to be used in the work and shall give notice thereof in writing to the contractor, the contractor shall alter, add to or omit from or substitute for as the case may require, in accordance with such notice and carry out the amended work on the same conditions in all respects on which he agreed to do the main work, but the contractor shall not do any work extra to or make any alterations or additions to or omissions from or substitutions in the work or any deviations from any of the provisions of the contract stipulation, specification or contract drawings without the previous consent in writing of the Architects/Employer and the values of such extras, alterations, additions or omissions or substitutions shall in all cases be determined by the Architect with the prior approval in writing of the Employer in accordance with the provisions of Clause 17 hereof, and shall be added to or deducted from the contract amount accordingly.



The supply and execution of any part or the carrying out of any work incidental to the execution of any item or class of work shown in the schedule of quantities shall not constitute a variation entitling the contractor to extra payment provided that the said item or class of work cannot be executed satisfactorily according to the true intent and meaning of the specifications without the said part thereof or the said work incidental thereto, whether the same may or may not be particularly shown or described in the drawings, specifications and schedule of quantities and provided the same may be reasonably inferred there from.

Similarly the changing of the position of the work from one to another, or to a more difficult position than that shown in the drawings or described in the specifications or the contract schedule, or the carrying out of work under circumstances not contemplated in the specifications or the contract schedule shall not constitute a variation entitling the contractor to extra payment.

13.A No compensation for alteration in or restriction of work:

If at any time after the commencement of the work the Employer for any reason whatsoever does not require the whole thereof as specified in the tender to be carried out, the Architect/Employer shall give notice in writing of the fact to the contractor who shall have no claim for any compensation whatsoever on account of any profit which he might have derived from the execution of the work in full, but which he did not derive in consequence of the full amount of the work not having been carried out. Nor shall he have any claim for compensation by reason of any alterations having been made in the original specifications, drawings, designs and instructions which shall involve curtailment of the work originally contemplated.

14. Schedule of quantities on standard method of measurement:

The schedule of quantities unless otherwise stated shall be deemed to have been prepared in accordance with the Indian Standard method of measurement. Measurements shall be as per latest work addition of IS:1200 in case of extra/substituted/deleted items.

15. Errors in bill of quantities:

Any error in description or in quantity or in omission of items from the schedule of quantities shall not vitiate this contract but shall be rectified and the value thereof as ascertained under Clause 17 hereof shall be added to or deducted (as the case may be) from the contract amount provided that there shall be no rectification of errors in the contractor's schedule of rates.

16. Measurement of Works:

The Architect/Employer may from time to time intimate to the contractor that he requires the works to be measured, and the contractor shall forthwith attend or send a qualified Agent to assist the Architect/Employer or his representative in taking such measurements and calculations and to furnish all particulars or to give all assistance required by either of them.

Provided that the contractor shall give notice of not less than ten clear days to the Architect/Employer of his representative in charge of the work before covering up or placing beyond the reach of measurement any work in order that the same is covered up or placed beyond reach of measurement and shall not cover up and place beyond reach of measurement any work without the consent of the Architect/Employer and his representative in charge of the work who shall within the aforesaid period of ten days inspect the work and cause the measurements to be



made; if, any work be so covered up without the consent of the Architect/Employer or his representative in charge of the work, the same shall be uncovered at the contractor's expense, or in default thereof no payment or allowance shall be made for such work or materials with which the same was executed.

Should the contractor not attend or neglect or omit to send such agent then the measurements taken by the Architect/Employer or a person approved by him shall be taken to be correct measurement of the works. Such measurements shall be taken in accordance with the Indian Standard method of measurements, unless otherwise provided for elsewhere in this contract.

The contractor or his agent may at the time of measurement take such notes and measurements as he may require.

Any authorized extra works, omissions and all variations made without the Architect's/Employer's knowledge, if subsequently sanctioned by him in writing (with the prior approval in writing of the Employer) shall be included in such measurements.

17. Price of Variation:

The rates for additional, altered, substituted work shall be arrived at in accordance with the following rules:

- (i) The net rates or prices in the contract schedule shall determine the valuation of (the rates for) the extra work (items) where such extra work is of similar character and is executed under similar conditions as the work priced therein.
- (ii) If the rates for the extra, altered or substituted (deviated) work are not provided for (available) in the contract schedule, they shall to the extent possible be derived out of the rates given in that schedule for similar or near similar items. For the purpose of such derivation, where necessary and when so directed, the contractor shall furnish detailed analysis for the said similar or near similar items in the contract schedule. For such portions of the analysis for the extra, altered or substituted (deviated) work for which prices cannot be abstracted from the corresponding analysis of rates for the said similar or near similar items in the contract schedule, market rates substantiated by purchase bills/vouchers shall be adopted, using factors and constants for quantum's of material, labour, T & P and sundries from standard PWD/CPWD data analysis, adding 15% towards profits and overheads. When called upon to do so the contractor shall submit the required purchase bills/vouchers.
- (iii) In respect of a contract which incorporate more than one schedule the rate applicable in case (i) above if not provided for in the schedule pertaining to the work in which the addition /alteration or substitution (deviation) occurs, shall be taken as the lowest applicable rate in the other schedules; similarly, in case (ii) above, if similar or near similar items cannot be found in the schedule pertaining to the work in which the addition, alterations or substitution (deviation) occurs, similar or near similar items from the other schedules shall be adopted.
- (iv) In the case of additional, altered or substituted (deviated) work for which rates cannot be reasonably be derived as at (ii) and (iii) above, the rates shall be worked out adopting Market prices, substantiated by purchase bills/vouchers, using factors & constants for quantum's of material, labour, T & P and sundries from standard PWD/CPWD, Data/Analysis adding 15% towards profits and overheads. When called upon to do so the contractor shall submit his purchase bills/vouchers, to the Architect.



- (v) The questions as to what particular items, being similar or near similar to the additional, altered or substituted (deviated) work in the contract schedule are to be adopted for derivation of rates for the additional, altered or substituted (deviated) work and whether the said rates cannot be derived from similar or near similar items in the contract schedule will be decided by the Architect/Employer.
- (vii) In cases (ii) to (iv) the contractor is required to submit his analysis of rates adopting the principles enunciated and the Architect/Employer, after scrutinizing the analysis and other papers furnished, will allow such rates as he considers reasonable.
- (viii) Where extra work is of such a nature that it cannot be properly measured or valued the contractor shall be allowed day work prices at the net rates stated in the tender or the priced schedule of quantities or, if not so stated, then in accordance with the local day work rates and wages for the district; provided that in either case if required by the Architect/ Employer, vouchers, muster rolls and other documents required for proper verification of the labour employed and the materials deployed on the said work and the costs thereof be delivered to the Architect/Employer or his representative at or before the end of the week following that in which the work has been executed.

The question as to whether extra work is of such nature that it cannot be properly measured or valued will be decided by the Architect/Employer. The margin to be allowed on actual costs to the contractor towards profits and overheads shall be 15%.

(ix) Deviation Limit: There is no deviation limit and the contractor is bound to carryout all the works as entrusted to him during the pendency of the contract on the same terms and conditions.

18. Unfixed Materials:

Where in any certificate (of which the contractor has received payment) the Architect/Employer has included the value of any unfixed materials intended for and/or placed on or adjacent to the works such materials shall become the property of the Employer and they shall not be removed, except for the use upon the works, without the written authority of the Architect/ Employer. The contractor shall be liable for any loss or damage to such materials.

19. Removal of improper work, material, etc.:

The Architects/Employer shall, during the progress of the work, have full powers to order in writing from time to time, removal from the work within such reasonable time or times as may be specified in the order, of any materials which in the opinion of the Employer/Architects are not in accordance with the specifications or the instruction of the Architects/Employer, or do not conform to approved samples, the substitution of the rejected materials by proper other materials, and the removal and proper re-execution of any work executed with materials not in accordance with the contract, notwithstanding that the same may have been passed and/or certified and/or paid for, the contractor shall forthwith carry out such order at his own cost. In case of default on the part of the contractor to carry out such order, the Employer shall have the power to employ and pay other persons to carry out the same without being answerable or accountable for any loss or damage that may happen or arise to such materials removed and all expenses consequent or incidental thereto as certified by the Architect/Employer shall be borne by the contractor, or may be deducted by the Employer from any money due or that may become due to the contractor.



20. Defects Liability Period:

Any defect, shrinkage, settlement or other faults which may appear within the 'Defects Liability Period' stated in the appendix hereto, or if none so stated, then within 12 months after the virtual completion of the works, arising in the opinion of the Architect/Employer from materials or workmanship not in accordance with the contract, shall on demand which shall be made within the defects liability period, in writing by the Architect/ Employer, and within such reasonable time as shall be stated therein specifying the work, materials or articles complained of notwithstanding that the same may have been passed and/or certified, paid for, be amended and made good by the contractor, at his own proper charge and cost and in case of default the Employer may employ and pay other person or persons to amend and make good such defects, shrinkage, settlements or other faults, and all damages, loss and expenses consequent thereon or incidental thereto shall be made good and borne by the contractor and such damages, loss and expenses shall upon the Architect's/ Employer's certificate in writing, be recoverable from him by the Employer or may be deducted by the Employer from any money due or that may become due to the contractor or the Employer may, in lieu of such amending and making good by the contractor, withhold a sum to be determined by the Architect/Employer equivalent to the cost of amending and making good such work and in the event of the amount retained under Clause-32 being insufficient, recover the balance from the contractor, together with any expenses the Employer may have incurred in connection therewith.

Should any defective work have been done or material supplied by any sub-contractor employed on the works who has been nominated or approved by the Architect/Employer as provided in Clause-12 and 22 the contractor shall be liable to make good in the same manner as if such work or materials had been done or supplied by the contractor himself and been subject to the provisions of Clause-2 thereof. The contractor shall remain liable under the provisions of this Clause notwithstanding the signing by the Architects/Employer of any certificate including the final certificate, or the passing of any accounts. Defects Liability Period commences from the certified date of Virtual completion, issued by the architect.

21. Employer may use premises:

The employer reserves the right to use the premises and any portion of the site for the execution of any work not included in this contract which he may desire to have carried out by other persons and the contractor is to allow all reasonable facilities for the execution of such work but is not required to provide any plant or materials for the execution of such work except by special arrangements with the Employer. Such work shall be carried out in such manner as not to impede the progress of the works included in this contract and the contractor is not to be responsible for any damage or delay which may happen to or be occasioned by such work.

22. Responsibility for safety of buildings:

The contractor shall be responsible for the safety of the works (including the materials, temporary buildings and plant) until they are taken over by the Employer and they shall stand at the risk, and be in the sole charges of the contractor, who shall be responsible for and must with all possible speed make good all damage from whatever cause.



23. Completion Certificate:

The works shall not be considered as completed until the Architect/Employer has certified in writing that they have been virtually completed and the defects liability period shall commence from such certified date of virtual completion of work. Within ten days of the completion of the work, the contractor shall give notice of such completion to the Architect/Employer and within ten days of the receipt of such notice the Architect/ Employer shall inspect the work and if there is no defect in the work shall furnish the contractor with a certificate of completion, otherwise a provisional certificate of completion indicating defects (a) to be rectified by the contractor and/or (b) for which payment will be made at reduced rates, shall be issued, but no certificate of completion, provisional or otherwise, shall be issued, nor shall the work be considered to be complete until the contractor shall have removed from the premises on which the work was executed, all scaffolding, surplus material rubbish and all huts and sanitary arrangements required for their work, people on the site in connection with the execution of the works and as shall have been erected or constructed by the contractor(s) and cleaned off the dirt from all wood work, doors, windows, walls, floors or other parts of any building, in upon or about which the work was executed, or of which he may have had possession for the purpose of the execution thereof, and not until the work shall have been measured by the Architects.

If the contractor shall fail to comply with the requirements of this clause as to the removal of scaffolding, surplus materials and rubbish and all huts and sanitary arrangements as aforesaid and cleaning off dirt on or before the date fixed for the completion of the work, original or extended in terms of Clause-27 herein, the Employer after issuing due notice, may at the expense of the contractor remove such scaffolding, surplus materials and rubbish, etc. and dispose of the same as he thinks fit and clean off such dirt as aforesaid, and the contractor shall have no claim in respect of any such scaffolding or surplus material as aforesaid except for any sum actually realised by the sale thereof. And the expense, if any, so incurred may be recovered from any money due or that may become due to the contractor by the Employer. If several sub-works covered by separate schedules are included in the contract, and if at any time before the completion of the entire work, the Employer takes possession of any of the separate sub-works that may have been duly completed in accordance with the contract and so certified by the Architects/Employer, notwithstanding any other provision in this contract in this regard, a completion certificate may be issued in respect of that sub-work subject to the provisions in the previous sub-clauses (regarding completion certificate) having been complied with, in respect of the said duly completed sub-work, the defects liability period, for such sub-work may be reckoned from the separate date of virtual completion so certified and that part of the full security deposit as may be proportionate (contract value of this sub-work to the whole contract value) be attributed to this sub- work may be refunded in accordance with and subject to the provisions of Clause-20. The same principles will apply where different dates are specified in the contract for different sub-works.

It may be noted that virtual completion certificate will be granted only after:

- 1. Assisting in obtaining permanent power supply from EB for Electrical works.
- 2. Obtaining clearance from Electrical inspectorate (Govt. of TAMILNADU for Electrical Installation works
- 3. Receipt of all as-built (completion) drawings for Electrical work, duly certified by Architect and consultants.



23. Contractor Liable for damage done:

The contractor shall be responsible for all injury to persons, animals, or things, and for all structural and decorative damages to property which may arise from the operation or neglect of himself or any of his employees whether such injury or damage arises from carelessness, accident or any other cause whatever in any way connected with the carrying out 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, streets, foot-paths, bridges or ways as well as all damages caused to the buildings and works forming the subject of this contract by frost or other inclemency of weather. The contractor shall indemnify the Employer and hold him harmless in respect of all and any expenses arising from any such injury or damage under any Act of Government or otherwise and also in respect of any award of compensation or damages consequent upon such claim.

The contractor shall reinstate all damages of every sort mentioned in the Clause, so 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.

The contractor shall indemnify the Employer/Architect against all claims which may be made against the Employer by any member of the public or other third party in respect of anything which may arise in respect of the work or in consequence thereof and shall at his own expense arrange to effect and maintain, until the virtual completion of the contract, with an approved insurer a Policy of Insurance in the joint names of the Employer and contractor against such risks and deposit such policy or Policies with the Employer from time to time during the currency of this contract. The contractor shall also similarly indemnify the Employer whether under the Workmen's Compensation Act or any other statute in force during the currency of this contract or at common Law in respect of any employee of the contractor or sub contractor and shall at his own expense effect and maintain, until the virtual completion of the contract, with an approved insurer a Policy of Insurance in the joint names of the Employer and the contractor against such risks and deposit such policy or policies with the Employer from time to time during the currency of the contract.

The contractor shall be responsible for anything which may be excluded from the Insurance Policies above referred to and also all other damages to any property arising out of and incidental to the negligent or defective carrying out of this contract. He shall also indemnify the Employer in respect of any costs, charges or expenses arising out of claim or proceedings and also in respect of award of or compensation of damage arising there from.

The Employer shall be at liberty and is hereby empowered to deduct the amount of any damage, compensation, costs, charges and expenses arising or accruing from or in respect of any such claims or damage from any or all sums due or to become due to the contractor.

24.A Insurance of the works:

The contractor shall within 14 days from the date of commencement of the work insure (CAR Policy) the works at his cost and keep them insured until one month after the works are taken over by the Employer or three months after the date of completion whichever is earlier, against loss or damage by fire or other such unusual risk with an insurer to be approved by the Architects/Employer, in the joint names of the Employer and the contractor (the name of the former being placed first in the policy), progressively for the full amount of the contract, in three stages, beginning with 1/3 of the contract value, and for any further sum being allowed to the contractor as an authorized extra. Such policy shall cover the property of the Employer only and Architect's and surveyor's fees for assessing the claim and in connection with his services generally in



reinstatement and shall not cover any property of the contractor of any sub- contractor or employee. The contractor shall deposit the policy and receipts for the premiums paid with the Architect/Employer within twenty one days of/before the date of commencement of the work unless otherwise instructed by the Architects/Employer. In default of the contractor insuring as provided above, the Employer may insure and may deduct the premiums paid from any money that may be due or that may become due to the contractor. The contractor shall as soon as the claim under the policy is settled, or the work reinstated by the insurers should they elect to do so, proceed with all due diligence with the completion of the works in the same manner as though the fire or other such risks had not occurred and in all respects under the same conditions of contract. The contractor in case of rebuilding or reinstatement after fire or other usual risk shall be entitled to such extension of time for completion as the Architect/Employer deems fit.

24. A.1. Without limiting his obligations and responsibilities above, the Contractor shall provide necessary insurance in terms approved by the Employer, to cover the following, indemnifying the Employer. The Contractor shall furnish a copy/copies of the policies to the Employer within one month from the award of the Contract.

Contractors all risk insurance policy covering loss or damage due to fire, lighting collapse, defective workmanship and/or Materials flood, storm, theft, burglary, malician damage, subsidence riots etc.,

Third party liability

Accident insurance to any workmen/staff, casual or otherwise, under the workmen's compensation act in accordance with the latest amended provision of the workmen's compensation act. Contractor's tools, tackle and Machinery.

All risks to Materials during transit.

Any other insurance required for fully indemnifying the Employer from any claim that may arise on account of the Contractors operation at site.

- 24. A.1.1. The above mentioned insurance coverage shall be with effect from the commencement of the works. In case the Contractor fails to effect the insurance coverage and keep in force the insurance referred to above, any other insurance that he may be required to effect under the terms of the Contract, then the Employer may effect and keep in force any such insurance and to such premium or premiums as may be necessary for that purpose and is to deduct the same from time to time from the monies due or which may become due to Contractor in the manner laid down in clause of virtual completion.
- 24. A. 1.2 The Contractor shall be responsible for all structural and decorative damage to property which may arise from the operation or neglect of himself or of any nominated sub Contractor's employees, whether such injury or damage arise from carelessness, accident or any other cause whatever in any way connected with the carrying out this Contract. This clause shall be held to include inter-alia, any damage to buildings, whether immediately adjacent or otherwise, and any damage to roads, streets, footpaths, bridges or ways as well as damage caused to the buildings and work forming the subject of this Contract by force or other inclemency of weather. The Contractor shall indemnify the Employer and hold him harmless in respect of all and any expenses arising from any such temporary damage to premises of property aforesaid and also in respect of any claim made in respect of injury or damage under any act of government or otherwise and also in respect of any award of compensation or damage consequent upon such claim.



- 24. A.2. The Contractor shall reinstate all damage of every sort mentioned in this clause, so 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 the third parties.
- 24. A.3. The Contractor shall indemnify the Employer against all claims which may be made against the Employer by any member of the public or other third party in respect of the works or in consequence thereof and shall at his own expense arrange to effect and maintain, until the virtual completion of the Contract, with an approved office policy of insurance in the joint names of the Employer and the Contractor against such risks and deposit such policy or policies with the Employer from time to time during the currency of this Contract. The Contractor shall similarly indemnify the Employer against all claims which may be made upon the Employer whether under the Workmen's Compensation Act or any other statute in force during the currency of this Contract or at common law in respect of any employee.
- 24. A.4. Sub-Contractor shall at his own expense effect and maintain until the virtual completion of the Contract, with an approved office a policy of insurance in the joint names of the Contractor and the Employer against such risks and deposit such policy or policies with the Employer from time to time during the currency of the Contract.
- 24. A.5. The Contractor shall be responsible for anything which may be excluded from the Insurance Policies above referred to and also for all other damages to any property arising out of incidental to the negligence or defective carrying out of this Contract. He shall also indemnify the Employer in respect of any costs, charges or expenses arising out of any claim or proceedings and also in respect of any ward of or compensation of damage arising there from.
- 24. A.6. The Employer with the concurrance of the Contractor shall be at liberty and is hereby empowered to deduct the amount of any damage, compensation, costs, charges and expenses arising or accuring from or in respect of any claim or damage from any sum or sums due to or become due to the Contractor.

24. B. Fire Insurance

a. The Contractor shall at the time of signing the Contract insure the works and keep them insured until the virtual completion of the Contract against loss or damage by fire in an office to be approved by the Employer in the joint names of the Employer and Contractor (the name of the former being placed first in the policy). for the full amount of the Contract premium of such further sum being allowed to the Contractor as an authorized extra. Such policy shall cover the property of the Employer only, fees for assessing the claim and in connection with his services generally therein and shall not cover any property of the Contractor or any sub Contractor or employee. The Contractor shall deposit the policy and receipts for the premium with the Employer within 21 days from the date signing the Contract. In default of the Contractor insuring as provided above the Employer on his behalf may so insure and may deduct the premiums paid from any money due or which may become due to the Contractor shall as soon as claim under the policy is settled or the work reinstated by the Insurance office, should they elect to do so, proceed with all due diligence with the completion of the works in the said manner as though the fire had not occurred and in all respects under the same conditions of Contract. The Contractor, in case of rebuilding or reinstatement after fire, shall be entitled to such extension of time for completion as the Employer deems fit.



b. The amount so due as aforesaid shall be total value of the works duly executed and of the Contract materials and goods delivered upon the sites for use in the works up to and including a date not more than seven days prior to the date of the said certificates less the amount to be retained by the Employer (as hereinafter provided) and less any installments previously paid under this clause.

25. Day of commencement and day of completion:

The contractor shall be allowed admittance on the site on the "date of commencement" stated in the Appendix, and he shall thereupon and forthwith begin the works and shall regularly proceed with and complete the same (except such painting or other decorative work as the Architect/Employer may desire to delay) on or before the "Date of completion" stated in the Appendix subject nevertheless to the provision for extension of time hereinafter contained.

26. Liquidated damages:

If the contractor fails to complete the works by the date stated in the Appendix or within any extended time under Clause 28 hereof the contractor shall pay or allow the Employer to deduct the sum named in the Appendix as "Liquidated Damages" for the period during which the said works shall remain complete and the Employer may deduct such damages from any money due or that may become due to the contractor.

27. Extension of time:

If the contractor shall desire an extension of time for completion of the work on the grounds of his having been unavoidably hindered (a) by force majeure or (b) by reason of any exceptional inclement weather or (c) reason of any proceedings taken or threatened by or dispute with adjoining or neighbouring owners or public authorities arising otherwise than through the contractor's own defaults or (d) by the work or delays of other contractors or tradesmen engaged or nominated by the Employer or the Architect and not referred to in the Schedule of Quantities and/or specification or (e) by strikes or Lockout affecting any of the building trades or (f) by reason of delays in the supply of materials stipulated to be supplied by the Employer, he shall apply in writing to the Architects/Employer within 15 days of the of such hindrance on account of which he desires such extension as aforesaid and the Architect/Employer, if in his opinion reasonable grounds have been shown therefore, may make a fair and reasonable extension of time for completion of the contract works, but the contractor shall nevertheless constantly use his endeavors to prevent delay and shall do all that may reasonably be required of him to proceed with the work expeditiously provided

- a) That the contractor shall have no claim other than extension of time for the delay in Completion of the work due to such hindrance and nothing else and
- b) That the contractor shall suspend the works whenever called upon to do so in writing by the Architects/Employer and shall be allowed reasonable extension of time for completion of work due to such suspension of work and nothing else.

28. Failure of contractor to comply with Architect's/Employer's instructions:

If the contractor after receipt of written notice from the Architects/Employers requiring compliance within ten days fails to comply with such further drawings and/or Architects'/Employer's instructions the Employer may employ and pay other persons to execute any such work whatsoever that may be necessary to give effect thereto, and all costs incurred in connection therewith shall be recoverable from the contractor by the Employer on the Certificate of the Architects as a debt or may be deducted by him from any money due to or become due to the contractor.



29. Termination of contract by employer:

If the contractor being an individual or a firm commits any "Act of Insolvency", or shall be adjudged an insolvent or being an Incorporated Company shall have an order for compulsory winding up against it or pass an effective resolution for winding up voluntarily or subject to the supervision of the court, or its official assignee or the Liquidator in such acts or insolvency or winding up, as the case may be, shall be unable within seven days after notice to him requiring him to do so to show to the reasonable satisfaction of the Architects/Employer that he is able to carry out and fulfill the contract and to give security therefore if so required by the Architects/Employer:

OR if the contractor (whether an individual, firm or incorporated company) shall suffer execution to be issued;

OR shall suffer any payment under this contract to be attached by or on behalf of any of the creditors of the contractor;

OR shall assign or sublet this contract without the consent in writing of the Employer first obtained; OR shall charge or encumber this contract or any payments due or which may become due to the contractors there under;

OR if the Architect shall certify in writing to the Employer that the contractor:

- i) Has abandoned the contract, or
- ii) has failed to commence the works, or has without any lawful excuse under these conditions suspended the progress of the works for 14 days after receiving the Employer's notice to proceed, or
- iii) has failed to proceed with the works with such due diligence and failed to make such due progress as would enable the works to be completed within the time agreed upon, or
- iv) has failed to remove the materials from the site or to pull down and replace work for seven days after receiving from the Architect/Employer written notice that the said materials or work were condemned and rejected by the Architects/Employer under these conditions, or
- v) had neglected or failed persistently to observe and perform all or any of the acts, matters, or things by this contract to be observed and performed by the contractor for seven days after written notice shall have been given to the contractor requiring the contractor to observe or perform the same;
- vi) OR has to the detriment of good workmanship or without the consent in writing of the Employer sublet any part of the contract; then and in any of the said cases the employer may notwithstanding any previous waiver, after giving seven days notice in writing to the contractor, determine the contract, but without thereby affecting the powers of the Architect/Employer or the obligations and liabilities of the contractor, the whole of which shall continue in force as fully as if the contract had not been executed by or on behalf of the contractor. And further, the Employer by his Agents or servants may enter upon and take possession of the work and all plant, tools, scaffoldings, sheds, machinery, steam or other power equipment and materials lying upon the premises or the adjoining lands or roads, the same as his own property or may employ the use same by means of his own servants and workmen in carrying on and completing the works or by employing any other contractors or person or persons to complete the work, and the contractor shall not any way interrupt or do any act, matter or thing to prevent or hinder such other contractor or



other person or persons employed for completing and finishing or using the materials and plant for the works. When the work shall be completed or as soon as thereafter as convenient the Architect/Employer shall give notice in writing to the contractor to remove his surplus materials and plant, and should the contractor fail to do so within a period of 14 days after receipt thereof by him, the Employer shall be entitled to sell the same by public auction and give credit to the contractor for the amount realized.

The contractor's account shall also be credited with the amount that would have been payable to him, for the uncompleted work (completed by the Employer through other contractor or person or persons as aforesaid) in terms of his agreement as if the contract has not been determined and he (the contractor) had continued to execute the work to its completion. The actual gross expense to the Employer including incidental charges in completing the uncompleted work through other contractor's or person or persons shall be debited to the contractor's account if it be not less than the credit for the uncompleted work as above referred; if, however, the said debit to be made is less than the said credit, then the amount to be debited shall be equal to the value of the credit given as above referred.

The Architect/Employer shall thereafter ascertain and certify in writing what (if anything) in the final accounting is due to or payable to the contractor by the Employer or to the Employer by the Contractor for the sale of the surplus materials and plant and the loss the Employer shall have been put to in procuring the works to be completed. The amount, if any, owing to the contractor and which shall be certified and vice versa; and the certificate of the Architect in this regard shall be final and conclusive between the parties.

30. Termination of contract by contractor:

If payment of the amount payable by the Employer under any certificate of the Architects shall be in arrears and unpaid for sixty days after "notice" in writing requiring payment of the amount as aforesaid shall have been given by the contractor to the Employer, or if the Employer interferes with or obstructs the issue of any such certificates, or the Employer commits any "act of insolvency", or if the Employer (being an individual or Firm) shall be adjudged an insolvent, or (being an incorporated Company) shall have an order made against him or pass an effective Resolution for winding up, either compulsorily, or subject to the supervision of the Court or Voluntarily, or if the official assignee or the Employer shall repudiate the contract, or if the Official Assignee or the Liquidator in any such winding up shall be unable within fifteen days after notice to him requiring him to do so to show to the reasonable satisfaction of the contractor that he is able to carry out and fulfill the contract and to make all payments due, and to become due there under, and if required by the contractor, to give security for the same, or if the works be stopped for three months under the order of the Architect or the Employer or by any injunction or other order of any court of Law, then and in any of the said cases the Contractor shall be at liberty to determine the contract by the notice in writing to the Employer, and he shall be entitled to recover from the Employer, payment for all works executed and for any loss he may sustain upon any plant or materials supplied or purchased or prepared for the purpose of the contract.

In arriving at the amount of such payment the net rates contained in the contractor's original tender shall be followed or where the same may not apply, valuation shall be made in accordance with Clause 17 hereof.

31. Provisional Sums:

a) All goods or work for which provisional sums of money are provided may be selected or ordered from any manufacturers or firms by the Employer who reserves to himself the right of paying direct for any such goods or work and deducting the said prices or sums from the amount of contract.



The contractor shall receive and sign for such goods and be responsible for their safe custody as and from the date of their delivery upon the works, and shall be paid for fixing, where applicable, in terms of the contract. Fixing shall cover unloading, getting in, unpacking and return of empties and other incidental work.

If any provisional items are provided for work of a nature usually carried out by the contractor in the ordinary course of his business the Employer shall give the contractor an opportunity for tendering for the same without prejudice to the Employer's right to accept any or reject any or all of the tenders received.

32. Certificates and Payments:

Running Bills in quadruplicate shall be submitted by the contractor each fortnight on or before the date fixed by the Architect or if no date is so fixed, by the 15"th" of every month, or at other suitable intervals consistent with the stipulation in the appendix to this conditions of contract regarding, "value of work for interim payments", along with detailed measurements for the work executed in the previous month or period, and the Architect shall check/take measurements or cause the measurements to be checked/taken for the purpose of having the same verified and to the extent work has been executed in accordance with the contract, issue interim certificate, and the employer shall make payments to the contractor on the basis of such certificates within the period specified for honoring interim certificates (in the appendix to the conditions of contract), subject to retention of such sums at the percentage marked in the appendix till the whole of the retention money (part security deposit) is collected whereafter the installments (interim payments) shall be up to the full value of the work subsequently so executed and fixed. The Architect may in his discretion certify 75% of the claim immediately on receipt of an interim bill prior to checking of measurements and issue the full certificate after checking the measurements as aforesaid.

The Architect may in his discretion include in the interim certificate such amount as he may consider proper on account of any materials which are in his opinion non perishable and are in accordance with the contract and which have been brought to the site (but not prematurely) in connection with the work and adequately stored and or protected against damage by weather or by other causes, but which have not at the time of advance been incorporated in the work, up to 75% of their value. When the materials on which advance has been made are incorporated in the work, the amount of advance shall be deducted on the basis of actual consumption on the works from subsequent bills.

When the works have been virtually completed and the Employer shall, have verified, that they have been so completed, the contractor shall submit the final bill in respect of the contract work within one month thereafter and payment shall be made by the Employer as specified in the Appendix "Installment after virtual completion", and "Period for honoring bills".

The contractor shall be entitled to the payment of the final balance in accordance with the final verification by the Employer after the expiration of the period referred to as "the Defects Liability Period" in the Appendix attached hereto from the date of virtual completion or as soon after the expiration of such period as the works shall have been finally completed and all defects made good according to the true intent and meaning thereof whichever shall last happen, provided always that the verification by the Employer during the progress of the works or at or after their completion shall not relieve the contractor from his liabilities under applicable Clause nor relieve the contractor of his liability in case of fraud, dishonest or fraudulent concealment relating to the works or materials or to any matter dealt with in the certificate, and in case of all defects and insufficiencies in the works or materials of which a reasonable examination would not have disclosed. No verification/ payment by the Employer shall of itself be conclusive evidence that any work or materials to which it relates are in



accordance with the contract neither will the contractors have a claim for any amounts which the Employer might have paid and which might subsequently be discovered as not payable and in this respect the Employer's decision shall be final and binding.

The Employer shall have power to withhold any payment if the works or any parts thereof are not being carried out to his satisfaction.

The Employer may make any correction in any previous verification /payment which shall have been made by him. No payment will be made by the Employer if the contractor fails to insure the works and keep them insured till the issue of the virtual completion certificate. Also payment may be refused if the contractor fails to execute the formal agreement.

33. Security Deposits bear no interest:

Security Deposit or the balance of it available with the Employer, however, shall be refunded to the contractor in the manner specified in the Appendix to the conditions of contract and shall bear no interest whatsoever until the date of its return.

34. Matters excepted from Arbitration:

The decision, opinion, direction, certificates (except for payments) with respect to all or any of the matters under clauses 2,4,7,9,13,13A,17,19,27,29,41,42 hereof (which matters are herein referred to as the excepted matters) shall be final and conclusive and binding on the parties hereto and shall be without appeal. Any other decision, opinion, direction, certificate or valuation of the Architect/Employer or any refusal of the Architect/Employer to give any of the same way in all respect (including the provision as to opening the references) as if it were a decision of the Architect under the following clauses.

35. Arbitration:

- i) All disputes or differences of any kind whatever, arising out of or in connection with the contract or the carrying out of the works (whether during the progress of the works or after their completion and whether before or after the determination, abandonment or breach of the contract), shall be initially referred to and settled by the Architect who shall state his decision in writing. The decision of the Architects with respect to any of the excepted matters shall be final and without any appeal as stated in clause 34. But if the Employer or the Contractor be dissatisfied with the decision of the Architects on any matter, question or dispute of any kind (except of any of the excepted matters) or as to the withholding by the Architects of any certificate to which the contractor may claim to be entitled, then and in any such case either party to this contract may within 4 weeks after receiving notice of such decision, give a written notice to the other party through the Architects requiring that the matters in dispute or difference be arbitrated upon. Such written notice shall specify the matters which are in dispute or difference of which such written notice has been given, stating the amount or amounts claimed therefore and no other shall be and is hereby referred to arbitration, and in the absence of such written notice within the said period of four weeks, the claim arising out of the dispute or difference is deemed to have been waived.
- ii) All disputes or differences of any kind arising out of or in connection with the contract or the carrying out of the works other than the excepted matters referred to in clause 34 herein before (whether during the progress of the work or after their completion and whether before or after determination, abandonment or breach of contract) shall be referred to a single arbitrator who shall be a technically competent person nominated by the Employer and the same shall be deemed to be submission to arbitration in accordance with the provisions of the Indian Arbitration and Conciliation Act 1996 and any modification thereof for the time being in force.



- iii) Provided always that the Employer shall not withhold the payment of an interim certificate nor the contractor in any way delay the carrying out of the works by reasons of the existence of any such matter, question or dispute or difference to be referred to arbitration but shall proceed with the work with all due diligence and shall until the decision of the arbitrator abide by the decision of the Architects and no award of the Arbitrator shall relieve the contractor of his obligation to adhere strictly to the Architect's instructions with regard to the carrying out of the works.
- iv) The Arbitrator(s) may from time to time with the consent of the parties enlarge the time for making and publishing the award.
- v) The venue for Arbitration shall be **Tiruppur**.
- vi) Subject as aforesaid the provisions of the Arbitration and Conciliation Act 1996, or any statutory modification of re-enactment thereof and the rules made there under and for the time being in force shall apply to the arbitration proceedings under this clause.
- 36. Right of technical scrutiny of final bill:

The Employer shall have a right to cause a technical examination of the works and the final bill of the contractor including all supporting vouchers, abstracts, etc., to be made at the time of payment of the final bill. If as a result of this examination or otherwise any sum is found to have been overpaid it shall be lawful for the Employer to recover the sum.

37. Employer entitled to recover compensation paid to workmen:

If, for any reason, the Employer is obliged, by virtue of the provisions of sub-section (1) of Section 12 of the Workmen's Compensation Act 1923, to pay compensation to workmen employed by the contractor, in execution of works, the Employer will recover from the contractor the amount of compensation so paid, and without prejudice, to the right of the Employer under sub-section (2) of Section 12 of the said Act, the Employer will be at liberty to recover such amount or any part thereof by deducting it from the security deposit or from any sum due by the Employer to the contractor under this contract or otherwise. The Employer shall not be bound to contest any claim made against him under sub-section (1) of Section 12, of the said Act, except on the written request of the contractor and upon his giving to the Employer full security for all cost for which the Employer might become liable in consequence of constructing such claim.

38. Labour Laws/Regulations:

The contractor shall employ Labour in sufficient numbers directly or through sub-contractors to maintain throughout the period of the contract the rate of progress required according to the approved programme of the work and of quality to ensure proper workmanship in accordance with specifications and drawings and the Architect's/Employer's instructions.

The contractor will comply with the provisions of all Acts of Government relating to labour and the rules and regulations made there under from time to time. He shall also submit at the proper time all particulars and statements required to be furnished to the Labour Authorities on being directed to do so by the Architects.

The Contractor shall maintain full record of all labour employed by him and shall make all payments required to be made under the Employee State Insurance(ESI) scheme under the code number of the Employer and shall lodge receipts of such payment with the Employer. If the contractor fails to make the payments the Employer reserves the right to deduct the same from the contractor's bills.



38.(i) The Contractor undertakes to obtain any license, permit, consent, sanction etc. as may be required or called for from/by local or any other authorities for doing such work. The contractor undertakes to obtain such permission / license, code numbers etc. as may be required under the Contract Labour (Regulations and Abolition) Act, 1970, The Contractor undertakes to produce the permissions / license etc. so obtained and furnish to the bank copies thereof as and when required. The contractor shall be responsible for any contravention of the local/Municipal/other laws/rules/regulations. It is reiterated that the minimum wages paid to the workmen shall be as per Central/ state Government minimum wages act whichever is higher and which is being updated from time to time, The Contractor shall indemnify the bank against any claims, damages, loss or penalty including the costs thereof arising out of any breach or violation of any of the provisions of all the laws including the labour laws as applicable from time to time governing the employees employed by the contractor"

38.(ii) The contractor shall indemnify the employer against any liability that may arise due to non-compliance of any provision under the said contract labour (abolition and regulation) Act,1970 or any enactment affecting the work contemplated under this agreement.

39. Apprentice Act:

The contractor shall comply with the provisions of the Apprentice Act 1961 and the rules and orders issued there under from time to time. Failure to do so will amount to breach of contract. The contractor shall also be liable for any pecuniary or other liability arising on account of any violation by him of provisions of the Act.

40. When contractor dies:

Without prejudice to any rights or remedies under this contract, if the contractor dies, the Employer shall have the option of terminating the contract without compensation to the contractor.

41. Theoretical Check: (If supply is made by Employer to contractor partially or wholly)

After the completion of the work the theoretical quantity of cement to be used on the work shall be calculated on the basis of CPWD data. Over the theoretical quantity so calculated a variation up to 5% plus or minus shall be allowed.

The difference in the quantity of cement actually supplied to the contractor and the theoretical quantity including the authorized variation, if not returned by the contractor at the place that may be specified, "shall be recovered for at thrice the supply rate without prejudice to the provisions of the relevant condition regarding the return of the surplus materials."

In the event of it being discovered that the quantity of cement used is less than the quantity ascertained as hereinbefore provided (allowing variations on the minus side as stipulated above), the cost of the quantity of cement not so used shall be recovered from the contractor on the basis of the supply rate.

The provision of the foregoing sub-clauses shall apply in the case of steel, if supplied, except that the theoretical quantity shall be taken as the quantity actually fixed and tied or erected in position, as per design or as authorized by the Architects and measured for payment at the steel work rate in the bills of quantities, including authorized lappages; over this theoretical quantity shall be added a variation up to 5% due to wastage being more or less and scrap steel of lengths less than 2 meters shall form part of the wastage and shall not be taken back as steel in good condition.

42. Return of Surplus Materials:

Notwithstanding anything contained in any or all of the clauses of this contract, where any materials for the execution of the work have been supplied by the Employer in whatever manner, the contractor shall hold the said materials economically and solely for the purposes of this contract and not dispose of them without the permission of the Employer and return if required what may



be left with him after the completion of the contract or at its termination for any reason whatsoever, on being paid or credited such prices as the Architect/Employer shall determine having due regard to the condition of the materials. The decision of the Architect/Employer in this regard will be final. Provided that the contractor shall not be entitled to return any such material unless with such consent and if the Employer does not so require the material to be returned the contractor may at his risk and expense dispose of the materials and he shall not be entitled to any compensation whatsoever in this regard and provided that steel in lengths of less than 2 meters shall not be deemed to be steel in good condition.

43. Site Drainage:

All water which may accumulate on the site during the progress of the works, or in trenches and excavations, from other than the excepted risks (as defined in this contract) shall be removed from the site to the satisfaction of the Architects, at the contractor's expense.

44. Nuisance:

The contractor shall not at any time do, cause or permit any nuisance on the site or do anything which shall cause unnecessary disturbance or inconvenience to owners, tenants or occupiers of other properties near the site and to the public generally.

45. Watching and Lighting:

The contractor shall provide and maintain at his own expense all lights, guards, fencing and watching when and where necessary or required by the Architects for the protection of the works or for the safety and convenience of those employed on the works or the public.

46. Others:

Obtaining clearance of statutory authorities for various services that which are necessary for obtaining completion certificate, shall be the responsibility of the contractor.

Contractors to give shop floor drawing for structural steel frame works, if any.

If the Contractor proposes to sink a bore well within the plot for obtaining water for constructions purpose, the same shall be permitted by Bank but only the contractor has to approach the authorities to sink a tube well and any delay in any such approval or disapproval by the govt. authorities will no way be taken as a reason for extension of time. The ancillary works will be to contractor's account. However, the contractor has to ensure that the quality of water meets with requirement of IS code on water for construction purpose.

Signed & Delivered by The Bank

Signed & Delivered by The Contractor



SAFETY CODE



SI.No	Description
1	GENERAL
1.1	INTENT
1.2	SCOPE OF APPLICATION
2	GENERAL REQUIREMENTS TO PROMOTE SAFETY
2.1	CONTRACTORS PHILOSOPHY
2.2	CORPORATE SAFETY POLICY
2.3	WORK SITE INDUCTION
2.4	TRAINING
2.5	SAFETY AUDITS
2.6	INCENTIVE SCHEMES
2.7	INDIAN STATUTORY REQUIREMENTS
2.8	PROJECT SAFETY ORGANISATION AND RESOURCES
2.9	FIE FIGHTING AT THE WORK SITE
3	PROJECT SAFETY GOALS
4	IDENTIFICATION OF HAZARDS
4.1	PRELIMINARY HAZARD ANALYSIS (PHA) CHECKLIST
5	COMMUNICATION
5.1	STAFF PARTICIPATION
5.2	DAILY WEEKLY AND MONTHLY SAFETY MEETINGS
5.3	COMMUNICATION CONTACT AT THE WORK SITE
5.4	APPOINTMENT OF RESPONSIBLE PERSONS



Sl.No	Description
6	SAFETY NOTICES
6.1	FIRE PREVENTION SIGNS
6.2	SAFETY SIGNS
6.3	EMERGENCY SIGNS
6.4	SCAFFOLD
7	SAFETY REQUIREMENTS
7.1	PERSONNEL PROTECTIVE EQUIPMENT
7.2	HIGH NOISE LEVELS
7.3	USE OF SAFETY EQUIPMENT
7.4	CONSTRUCTION EQUIPMENT INSPECTION
7.5	VEHICLE EQUIPMENT INSPECTION
7.6	HEAVY LIFTING/RIGGING STUDIES
8	SAFETY RECORDS AND REPORTS
9	WORK SITE EVACUATION
10	PRECOMMISSIONOING AND COMMISSIONING
11	PERMIT TO WORK SYSTEM



1.0 GENERAL

1.1 INTENT

The Intent of the site SAFETY PLAN (herein referred to as "PLAN") is to establish a framework for the Safe Working Practices and Safety Standards which shall be fully developed in the PROJECT SITE SAFETY MANUAL, and employed on the WORK SITE in TIRUPPUR during construction. The standards shall meet the PROJECT Health, Safety and Environmental objectives and shall detail the organizational requirements and obligations of OWNER and its CONTRACTORS employed on WORK SITE.

- 1.1.1 "OWNER" means M/s. INDIAN BANK, ZONAL OFFICE and shall include its employees, agents or designated representatives or successors and permitted assigns.
- 1.1.2 "Architects" means M/s. DESIGN CONSULTANTS, who is employed by OWNER for this PROJECT.
- 1.1.4 "CONTRACTOR" means TAKES UP INDIVIDUAL WORKS, and shall include its agents, workmen and representatives.
- 1.1.5 "PLANT" means the below mentioned facilities and installations of the new PROJECT contracted to the CONTRACTOR.
- 1.1.6 "WORK SITE" means the place or places so designated by OWNER for the Construction & Furnishing of facilities including such places adjacent thereto which are for storage and assembly of equipment and materials.
- 1.1.7 "PROJECT" means -----undertaken under a CONTRACT between OWNER and the CONTRACTOR.
- 1.1.8 "SFM" means the CONTRACTOR'S Safety Manager who is directly responsible for the safety as to the Construction, PRECOMMISSIONING and COMMISSIONING WORK performed at the WORK SITE and who shall be engaged in, carry out and/or coordinate the required actions for compliance to safety regulations and cause other persons to comply to safety regulations. Refer clause 4.1 of this procedure for the SFM description of duties
- 1.1.9 "SFO" means the CONTRACTOR'S Safety Officer who is directly responsible to the CONTRACTORS SFM for the safety as to the Construction, PRECOMMISSIONING and COMMISSIONING WORK performed at the WORK SITE and who shall assist the CONTRACTORS SFM to carry out and or coordinate the required actions for compliance to safety regulations and cause other persons to comply to safety regulations

1.2 SCOPE OF APPLICATION

This PLAN shall apply to the CONTRACTOR as to safety during construction and up to PROVISIONAL ACCEPTANCE of the PROJECT



2 GENERAL REQUIREMENTS TO PROMOTE SAFETY

2.1 OWNER'S PHILOSOPHY

The CONTRACTOR shall strive to achieve its Health, Safety and Environment (HSE) objectives stipulated in the OWNER Corporate Safety Policy by ensuring the following Safety Management strategies are carried out at the WORK SITE.

2.2 CORPORATE SAFETY POLICY

The Corporate Safety Policy endorsed by the OWNER'S PROJECT MANAGER, shall be adopted on the PROJECT.

The CONTRACTOR shall fully comply with all the requirements in the PROJECT Safety Policy.

2.3. WORK SITE INDUCTION

The CONTRACTOR shall implement and conduct a standardized Health, Safety, Environment and Security induction and orientation, aided by visual materials or illustrations, lasting approximately 30 Minutes to 1 Hour.

The induction and orientation shall be given to all WORK SITE employees and shall be mandatory prior to admittance to the WORK SITE.

The WORK SITE Induction shall be based on, but not limited to, the following curriculum:

- Brief overview of the PROJECT.
- OWNER'S philosophy for safety awareness.
- Accident and incident cause and prevention.
- Hazard recognition.
- Personnel Protective Equipment (PPE).
- WORK Permit Procedure when PROCESS machinery installed.
- Availability of first aid treatment.
- Rigging colour coding.
- Tool box talks.
- Smoking at the WORK SITE.
- Evacuation Procedure in the event of an emergency.
- Emergency siren at the WORK SITE and the adjacent Operating Facilities.
- PROJECT Safety Handbook issue.

Records of all employee orientation shall be logged in a Safety and Security Attendance Record.

2.4. TRAINING

The CONTRACTOR shall implement and conduct a monthly employee and supervisor training program based on, but not limited to, the following curriculum:

- WORK SITE Induction.
- PROJECT Site Safety Manual
- Evacuation and emergency response drill.
- Use of fire extinguishers.
- Manual lifting techniques.
- Radiography hazards.



- Breathing Apparatus training
- Correct rigging techniques
- WORK Permit Procedures
- Basic First Aid
- Pressure testing at the WORK SITE.
- Working on Live Systems
- Fire team training
- Hazardous Substances

2.5. SAFETY AUDITS

The CONTRACTOR shall carry out monthly Safety Audits in which OWNER and the CONTRACTOR representatives participate.

The safety audit inspection program shall be comprised of a check list and shall be carried out to an agreed timetable.

Proper scrutiny of the WORK place shall be carried out and the findings of the audit shall be distributed to all SUB-CONTRACTORS for their action, and to OWNER

2.6. OWNER MONITORING

The CONTRACTOR shall introduce at the WORK SITE a daily safety patrol to be attended by all CONTRACTOR SFO. The patrol shall include inspection of the WORK SITE and CONTRACTOR temporary facility areas.

The CONTRACTOR shall issue Safety Instruction and Non-Compliance Notices to SUBCONTRACTOR/S for any Non-Compliance with the OWNER'S and the Government of India's Safety Legislation.

Non-Conformance or any Violation to the Safety Rules and Regulations shall be dealt with by verbal warnings and the issuance of the Safety Instruction and Non-Compliance Notices.

Any serious violation or persistent infringement of any of the WORK SITE Safety Rules and Regulations will result in immediate dismissal. Records of all Non-conformances or any Violation to the Safety Rules and Regulations shall be maintained by the CONTRACTOR and issued to SUBCONTRACTOR for their action and to OWNER.

2.7 INCENTIVE SCHEMES

The CONTRACTOR shall introduce a PROJECT SITE SAFETY Incentive Scheme which shall be open to all employees. Three types of incentive scheme shall be introduced as follows:

- Lost time accident-free Celebration Luncheon Party and Safety Award.
- CONTRACTOR Safe WORK Award Scheme.
- Safe Workman Award Scheme.

The content of the above incentive schemes shall be developed in the PROJECT Site Safety Manual.



2.8 INDIAN STATUTORY REQUIREMENTS

OWNER and its CONTRACTORS shall incorporate and comply with all applicable Indian Government Legislation.

- Factories and Machinery Act, 1956 and Regulations and Rules.
- Occupational Safety and Health Act,
- Electrical Act,
- Indian Environmental Quality Act, and Subsidiary Legislation made thereafter.

Where a conflict arises between the requirements of this PLAN and the laws governing safety, the OWNER and its CONTRACTORS shall apply the more stringent of the regulation at all times.

2.9 PROJECT SAFETY ORGANIZATION AND RESOURCES

The CONTRACTOR shall employ a Safety Manager, responsible to the PROJECT Manager, whose primary responsibility shall be to ensure that all WORKS carried out at the WORK SITE meet the OWNER'S and those of the Government of India's Health, Safety, Environment (HSE) and Security Standards.

The CONTRACTOR shall employ at the WORK SITE suitably qualified Safety Officers. The CONTRACTOR'S Safety Officer shall be directed by, assist and report directly to the CONTRACTOR'S SFM.

The PROJECT HSE Organization will be formed by the OWNER and CONTRACTORS headed by the OWNER'S Field Manager and will comprise of the following OWNER'S and CONTRACTOR'S personnel:

OWNER:

- Field Manager
- Construction Manager / PMC
- Safety Manager
- Area Manager, when required.

CONTRACTOR:

- Senior Site Representative
- Safety Officer
- Supervisor/s, when required.

2.9 FIRE FIGHTING AT THE WORK SITE

In the event of a fire at the WORK SITE, OWNER, CONTRACTOR or SUBCONTRACTOR offices or a SUBCONTRACTOR lay-down area the CONTRACTOR shall organize and implement an Internal Fire Fighting Team.

The CONTRACTOR shall arrange for periodic fire drill training for it's Internal Fire Fighting Team and the findings shall be evaluated.

The CONTRACTOR shall establish cooperative ties with the OWNER's Fire Fighting Team.



3. PROJECT SAFETY GOALS

The CONTRACTOR shall strive to achieve the following safety goals:

ZERO LOST TIME ACCIDENTS

It is OWNER's company policy that all possible steps shall be taken to protect the health and safety of all employees working at the WORK SITE at all times. The CONTRACTOR shall comply with this requirement with their overall objective as ZERO LOST TIME ACCIDENTS for this PROJECT.

SAFETY TARGETS

The CONTRACTOR during the life of the PROJECT, shall target each and every 1,000,000 man hours as their realistic safety target to be achieved by all personnel. All employees shall be positively encouraged to contribute towards making the WORK areas as safe as possible by continuously exercising safe working practices.

SAFETY PROGRESS

The monitoring of the safety progress shall be carried out on a weekly basis. A safety notice board, which shall be updated with the weekly safety statistics shall be provided by the CONTRACTOR, located at the WORK SITE, in a position to be agreed with OWNER and shall include the following statistics:

- Number of accident free days without a Lost Time Accident.
- Total Number of Man Hours Worked
- Number of Lost Time Injuries
- Total Number of Man Days Lost
- Number of Near Miss
- Total Man Hours without a Lost Time Accident

4. IDENTIFICATION OF HAZARDS

Hazards are defined as the potential for harm or damage to people, property or the environment. Hazards include the characteristics of things and the actions or inaction of people.

The CONTRACTOR shall establish and implement a check list for hazard identification of specific WORK tasks for use by the CONTRACTOR and their SUBCONTRACTORS.

4.1 PRELIMINARY HAZARD ANALYSIS (PHA) CHECK LIST

The intent of the Preliminary Hazard Analysis (PHA) is to identify typical WORK SITE tasks, conditions, equipment used, material specifications, etc. for which there exists special requirements are known hazards to perform the WORK safely



A Preliminary Hazard Analysis and PHA Checklist shall be undertaken for any major hazardous operations or activities. Such major hazardous operation or activities include the following:

- Welding and Gas Cutting
- Preliminary Hazard Analysis
- Lifting and Steel Structure Erection
- Confined Space Entry
- Excavation
- Others

5 COMMUNICATION

5.1 STAFF PARTICIPATION

A Healthy Safety and Environment (HSE) Committee headed by OWNER'S Field Manager shall be established. This Committee will have its functions clearly drawn out to continuously promote a pro-active safety culture WORK SITE wide.

The CONTRACTOR shall implement a safety committee as a credible body responsible for the improvement of WORK SITE safety standards.

An HSE Committee Meeting shall be held on every first working day of the week from 1000 hours.

The Minutes of Meeting shall be prepared by the CONTRACTOR and distributed to all SUBCONTRACTORS, for their action, and to the OWNER.

The safety representatives serving on the committee shall be able to discuss health and safety matters openly.

5.2 DAILY WEEKLY AND MONTHLY SAFETY DISCUSSIONS

CONTRACTOR's SFM shall conduct a Daily Safety Patrol to be attended by all CONTRACTOR SFOs. The Daily Safety Patrol shall include inspection of the WORK SITE and the CONTRACTOR lay-down areas and include discussion and dissemination of information between OWNER and the CONTRACTOR.

Daily Safety tool box talks shall be arranged where safety topics shall be discussed with the CONTRACTOR's work force.

The CONTRACTOR shall organize weekly WORK SITE Safety Inspections which shall be carried out by the CONTRACTOR, and OWNER'S Senior Discipline Supervisors/Managers on a joint basis, during which time the WORK shall be temporarily stopped to facilitate a Safety Audit. The CONTRACTOR shall organize Monthly Safety Patrols in which OWNER and CONTRACTOR representatives participate.

5.3 COMMUNICATION CONTRACT AT THE WORK SITE

The CONTRACTOR shall register and establish dedicated communication within their various departments.

The CONTRACTOR shall ensure that its SUB-CONTRACTOR's communication contracts are licensed and registered.



5.4 APPOINTMENT OF RESPONSIBLE PERSONS

The CONTRACTOR request to submit to OWNER, their names, designation, sample signatures and telephone contact numbers, of the following responsible persons.

Appointment of responsible person for:

Site Representative'

Administration

Safety

Security

Scaffolding

Rigging

Crane Lifting

Housekeeping

Material Control

Personal Protective Equipment

Hazard Analysis

Crane and Equipment Inspection

Confined Space Entry

The 'Appointment of Responsible Persons' shall be updated and submitted to OWNER whenever a change has been made to the original submission

6 SAFETY NOTICES

6.1 FIRE PREVENTION SIGNS

Fire prevention warning signs shall be displayed at the WORK SITE, and all signs shall be written in English, Hindi and Tamil language.

The fire prevention signs shall include the following:

- Action to be taken in the "event of a fire" signs shall be displayed in all offices.
- Information signs for the use of fire extinguishers to be displayed.
- Fire equipment layout signs shall be displayed

6.2 SAFETY SIGNS

The CONTRACTOR shall display at the WORK SITE safety signs and banners which shall be written in English, Hindi and Tamil. The safety signs, signals and banners shall include the following:

- Safety equipment requirements (PPE)
- Road closure signs
- Excavation warning signs
- Caution men working above signs
- No smoking signs
- WORK SITE speed limit signs
- Housekeeping signs
- Heavy lift in progress signs
- Hearing protection signs shall be displayed in all areas of high noise levels.



6.3 EMERGENCY SIGNS

Emergency warning signs shall be displayed at the WORK SITE all signs shall be written in English, Hindi and Tamil.

- Emergency escape route signs at WORK SITE in all offices shall be displayed.
- Emergency assembly point locations shall be identified and sign posed in English, Hindi and Tamil.
- The WORK SITE Medical Facility shall be clearly identified.
- Emergency telephone contact numbers shall be displayed.

6.4 SCAFFOLD

- A scaffold tagging system (colour coded) is to be employed at the WORK SITE.
- Safety signs shall be prominently displayed on all scaffold erected at the WORK SITE indicating "do not use" and "safe for use" depending on the inspection status of the scaffold.

7 SAFETY REQUIREMENTS

7.1 PERSONNEL PROTECTIVE EQUIPMENT (PPE)

The use of PPE by all personnel entering the WORK SITE and the CONTRACTOR Temporary Facilities Areas shall be mandatory.

The CONTRACTOR shall ensure only the approved type of PPE, meeting India, or ISO standards shall be issued and used by personnel employed at the WORK SITE.

The CONTRACTOR shall ensure the usage of PPE shall be in accordance with the relevant PPE manufacturer's recommendations.

Identification of responsible persons at the WORK SITE shall be by the distinctive colour of their helmets. This shall include, as a minimum, the following persons:

- First Aid Personnel
- Discipline Foremen
- Scaffolding Personnel
- Supervisors

7.2 HIGH NOISE LEVELS

Areas of high noise levels shall clearly display warning signs and personnel shall be issued with suitable hearing protection.

7.3 USE OF SAFETY EQUIPMENT

All SUBCONTRACTOR and SUB-SUBCONTRACTOR personnel shall strictly observe and comply with the OWNER's Safe Working Practices and take all necessary precautions and measures, as far as practical, to safeguard the interest of all personnel employed at the WORK SITE.



The mandatory minimum requirement for the wearing of Personnel Protective Equipment (PPE) at the WORK SITE and all Temporary Facility Areas shall be as follows:

- Protective (metal toe capped) safety shoes
- Hard hat
- Safety spectacles
- Safety Belt

Supplementary PPE shall be as follows:

- Hand protection
- Face and eye protection
- Breathing Apparatus
- Coverall
- Life preserver
- Hearing protection
- Full body harness

7.4 CONSTRUCTION EQUIPMENT INSPECTION

The CONTRACTOR shall inspect and test all construction equipment used at the WORK SITE.

The inspections and tests shall be documented and the use of a colour coding system shall be employed to verify all inspections and tests are current. The colour code shall be changed every quarter period.

The CONTRACTOR shall allow a ten day period into each quarterly period to allow for the retesting of construction equipment. During this ten day period either colour shall be deemed acceptable.

7.5 VEHICLE EQUIPMENT INSPECTION

All motor vehicles and heavy equipment shall be subjected to documented inspection by OWNER to ensure that prior to entry to the WORK SITE they are in good and safe operating condition.

Only approved vehicles with a valid Vehicle Entry Permit shall be permitted to enter the WORK SITE or PLANT facilities.

The approved WORK SITE Vehicle Entry Permit shall be displayed and entry restricted to the area in which they are permitted to operate and for the validated time period only.

Motor cycles shall not be permitted into the WORK SITE.

Vehicle driver, for such as pickups, excavators, forklifts etc. shall have a valid driving license, for the vehicle to be driven, issued by the Tamilnadu Road Transport Department.

Unless otherwise specified all motor vehicles shall have all the relevant current and approved certificates of insurance and registration.

7.6 HEAVY LIFTING / RIGGING STUDIES

The CONTRACTOR shall develop and establish the safe working practices and standards for employing lifting appliances and gear within the operational WORK SITE. Heavy Lifting Rigging Studies shall be carried out by the CONTRACTOR and subject to OWNER'S approval.

The CONTRACTOR shall establish and maintain records of all cranes entering the WORK SITE using valid Road Transport Department (RTD) and Department of Occupational Safety and Health registration numbers.



All SUBCONTRACTOR and SUB-SUBCONTRACTOR crane and Construction Equipment shall be subject to inspection by the CONTRACTOR prior to WORK SITE entry and shall enter the WORK SITE through the OWNER'S controlled Main Gate.

Where the CONTRCTOR and SUB-CONTRACTOR carry out WORK within the OWNER'S Area, such as Workshop, New Chemical Store and warehouse upgrading areas, all Construction Equipment, vehicles or other engine driven equipment shall be subject to the inspection and approval requirements of OWNER.

Cranes requiring assembly at the WORK SITE shall be load tested in accordance with the requirements

8.0 SAFETY RECORDS AND REPORTS

The following safety records and reports shall be complied and maintained by the CONTRACTOR. On completion of the investigation the report shall be issued to the SUB-CONTRACTOR for their action and to OWNER.

- Accident investigation reports (issue immediately)
- Attendance log for all Site Safety Induction course attendees.
- Audit reports (issue monthly).
- Minutes of Meeting (issue weekly).
- Records of Safety Drills carried out by Site Rescue Teams (issue immediately).
- Log to report all incidents: Injury to Personnel, Accidental Death, and all first aid and medical treatment given (issue monthly).
- Summary report of all incident/accident Safety Statistics (issue monthly).
- Major incident investigation reports (issue immediately).
- Log of all WORK SITE evacuations (issue immediately).
- Log of all safety incentives and results achieved (issue monthly).
- Log of safety assessments and recommendations (issue monthly).
- Reporting forms.

9.0 WORK SITE EVACUATION

CONTRACTOR shall develop their WORK SITE Evacuation Procedure and this shall be included in the PROJECT SITE SAFETY MANUAL. The content of the Procedure shall include but shall not be limited to the following:

- Audible Alarms.
- Assembly Points.
- Evacuation from the WORK SITE.
- Training/Drills (to take place monthly).
- Fire Fighting Department Involvement.
- OWNER'S involvement
- CONTRACTOR involvement.

The emergency evacuation procedure shall be tested every month and the performance evaluated.

10. PRECOMMISSIONING and COMMISSIONING

Specific safety requirement shall be developed for PRECOMMISSIONING and COMMISSIONING and shall include the following as a minimum:



- Communication between construction and COMMISSIONING.
- System Identification
- Hand over of a specific system from construction to
- COMMISSIONING
- Identification of Hazards (PHA).
- Permit to WORK.
- Introduction of Inventory/ Live Systems.
- WORK SITE Safety / COMMISSIONING Organization.

11. PERMIT TO WORK SYSTEM

Work Permit Procedure shall include

- Main Permit to WORK.
- Hot WORK.
- Cold WORK.
- Electrical Lock Out for WORK on Live Systems.
- Confined Space Entry.
- Vehicle Entry.
- Scaffold Erection.

The following Safety Precautions need to be taken:

- 1. All workmen should work with safety gadgets like helmets, googles, belts, shoes issued by the contractor. For welding and gas cutting, face shields, leather gloves, are to be provided by the contractor. Domestic LPG Cylinders are not to be used inside the factory.
- 2. All equipments like welding sets, gas cutting sets, lifting tackles, vehicles etc.. used at the site are to be checked daily for their working condition to ensure safety before putting them into use. And, a record is to be maintained thereof.
- 3. Ensure documents like License, FC, PUC for equipments / vehicles used inside the company.
- 4. First Aid Boxes & adequate fire Extinguishers equipment should be available at site.
- 5. Only trained, license holders are to be engaged in the electrical works.
- 6. All people are to be trained in their respective field for safe work procedures.
- 7. Work permits are to be obtained for all activities from our safety cell employed by client/Architect.
- 8. Contractor Supervisors are required to give safety instructions every day before start of work to all work men.
- 9. The following registers are to be maintained by the contractors which are to be produced whenever required.

Register of Workmen.

- Muster Roll.
- Register of wages.
- Leave with wages register.
- OT Register.
- 10. All incidents and accidents are to be recorded. Corrective and Preventive Actions are to be made and submitted to the safety cell in the event of any accident.
- 11. Only adults above 18 years are to be employed in the works.
- 12. No activity should be done that will damage our natural environment.



BANK GUARANTEE FORMAT

To Indian Bank, Zonal Office, No: 1, Harvey Road, Mehala Towers, Third Floor, Tiruppur – 641601.

We -----, having registered office at ----- and branch office at ------ (hereinafter called "the bank") hereby unconditionally and irrevocably under take to the Employer immediately upon receipt of the first written demand such amount or amounts as may be demanded by the Employer from us under this Guarantee not exceeding a sum of Rs------ (Rupees --------) in aggregate with out demur or reference to the Bidder and agree that the employer's demand shall be final and binding on the Bank under all circumstances.

We agree that no change or addition to or modification of the terms of the tender or of the works is to be performed there under or of any of the tender documents which may be made between you and the bidder shall in any way release the bank from any liability under this guarantee, and we hereby waive notice of any such change, addition of modification.

We further agree that the Employer shall have the right to invoke a claim up to the last date of the last date of the validity of this bank Guarantee and that the employer shall remain the sole judge of the validity of the claim and the bank agrees not to contest any claim.

We further agree that any change in the Bidder's constitution or their liquidation or dissolution shall not discharge the bank's liability under this guarantee.

We further agree that the right of the Employer to make a claim shall not be vitiated by any dispute raised or pending with any statutory authority, arbitrator, tribunal or any other body or person. It is agreed that the employer's claim shall remain valid even if the employer has not issued a prior notice or has not proceeded against a contractor before making such claim.

This guarantee is confirmed and irrevocable and shall remain valid upto and including ----- and shall remain valid upto such extended period which may be mutually agreed to.

Unless a demand or claim under this guarantee is made on the Bank in writing on or

before----, the bank shall be discharged from all liability under this guarantee.

Page **70** of **90**



SPECIFICATIONS FOR ELECTRICAL WORKS

General:

The scope of work covers execution and completion of the electrical installation work of the proposed Interior Furnishing, Electrical, Electrical Fitting, Data Cabling, Air-conditioning Works And Supply Of Readymade Chairs At Zonal Office, KRBS Towers, Second Floor, No: 208/650(1-10), P.N. Road, Metupalayam Bus Stop, Tiruppur – 641602. In accordance with drawings & specifications,

Rules & Regulations:

The installation shall be generally carried out in confirmatory with the requirements of Indian Electricity Act 1910 (as amended up to date) and the latest Indian Electricity Rules and supplementary Regulations of the State Electricity Departments and Electricity Undertakings and where the installation is subject to inspection and approval of Fire Insurance and Explosives Authorities, such installation shall be planned and executed to conform to their special Rules.

1.0 Point Wiring:

1.1 Supply:

The following material shall be included in a point wiring and accessories.

- a) Conduit PVC rigid 2.0mm thick conduit and accessories.
- b) Wires PVC insulated copper conductor multi-stranded flexible type wires lSl mark of 1.0, 1.5, 2.5,4.0,6.0, 10, l6sq.mm
- c) Switches 5 Amp single pole, two way switch, 5 amp socket, 15 Amp switch and socket, fan Regulators with flush metal boxes wherever concealed and front plates and boxes of company make for surface mounting all of approved make.
- d) Cover plates for outlet boxes 3 mm thick Formica / Hylam sheet specially for electrical purposes,
- e) Hardwares screws and washers non-rusting type brass type.

 Switch Boards and outlet Boxes Factory made boxes of approved make for flush mounting for switches and accessories and 16 SWG ms. sheet with CI boxes as outlet boxes with knockouts for conduit entries and tapped holes for screws.
- f) Holders Pendant holders / angle holders / ceiling rose etc. of approved make white in colour.
- g) Industrial Sockets Industrial type metal clad with metallic top,

1.2 Installation

All conduit shall be concealed / surface mounted in / on walls, beam, column, slabs or concealed in false ceiling in all NC areas etc. by necessary charis or clamping with saddles, spacers of hotdeep Gl. made, Charis shall be made in walls to conceal the conduits and then refilling of the charis with cement mortar All switch boards and outlet boxes (placed for bracket wall points) shall be concealed / surface in/on watts and should be kept in line and level with help of spirit level, Fan boxes shall be provided with nut welded on top with threaded hook and check nut. Wire drawing should be done with the help of draw wire. The conduits shall be cleaned of all foreign materials before inserting the wires Drawing of wires should be done such that the insulation of wires is not damaged.

All works shall be done as per instruction and satisfaction of the Consultant.



For surface conducing wiring, the conduit fitting switch/ceiling fan regulator boxes etc. shall be installed surface exposed. Flexible conduits shall not be used earth continuity conductors. Separate earth wire shall be provided either inside or outside the flexible conduits which shall be connected by means of earth clips to the earth system at one end and to the equipment at the other end as per IS 3043-1987.

Size of wire shall be chosen to limit Voltage drop within 5 %. Area of conductor shall be 1.0, 1.5, 2.5, 4.00 and 10.0 sq. mm copper. Generally not more than 8 to 10 points shall be wired in one circuit.

1.3 Testing:

After completion of wiring, installation of switches etc., testing shall be done for insulation resistance as specified in the tender

Notes No Joints shall be allowed in any wires in the conduits, all wires shall only be joined connected at termination points. All circuits shall have individual neutrals and one neutral shall riot complete the whole wiring system.

Circuit's mains shall start from Distribution board to switch board or from Meter board to Distribution. The circuit's mains include supply and installation of two nos., of wires with earth wire for single-phase mains and Four nos., of wires with earth wire for three phase mains.

2.1 Supply:

- a) Conduit PVC rigid 2.0mm thick conduit and accessories.
- b) Wires PVC insulated copper conductor multi-stranded flexible type wires 151 mark of 1.0, 1.5, 2.5,4.0,6.0,10, 16 sq.mm

2.2 Installation:

- a) For conceal wiring system all conduits shall be laid in the slab before casting of slab and shall be concealed in walls by making charts in walls and refilling the same before the final plaster of wall is done. All the switchboards and outlet boxes also shall be installed concealed in line and level.
- b) For surface wiring system all conduits / PVC trunking shall be clamped with hotdeep GI. saddles / spacers on wall, ceiling, beam, column etc. in line align with the help of spirit level, All the switch boards and outlet boxes shall be surface mounted type and to be installed in line and level,
- c) Wires shall be drawn in conduit after cleaning of conduits and drawn with the help of draw wires, No damage to the insulation of wires should be done while drawing.

2.3 Testing:

After completion of wiring, installation of switches etc., testing shall be done for insulation resistance as specified in the tender.

3.0 Distribution Boards

3.1 Supply:

Distribution boards shall be of sheet metal with rated bus bars, factory made. They shall be for three-phase or single-phase distribution system as per the requirements or schedule of quantities.

3.2 Installation

The distribution board shall be concealed in wall; flush mounted or surface mounted and should be in line and level. These shall be factory tested. Final MCBs on sub circuits shall be marked by permanent markers on the DB door

3.3 Test:

After installation of MCBs, it shall be tested.



4.0 M.C.B & ELMCB.

4.1 Supply:

MCB: These shall be SP, SPN.TP or TPN as specified in drawings Rating of 2A, 6A, 16A, 25A. 30A, 63A. 1OKA fault level, as per tS-8828--5978; BS 3871-part I.

ELMCB: These shall be of SPN. TPN and specified in drawings of rated value, ELMCB - BS-4293 neutral advance feature at closing neutral will be first to contact at the time of opening neutral breaks last after allowing the phases to open first Since the ELCB is to be used as main switch, it shall have safe interrupting clearance as per IEC 408/IS 4064. The ELCB shall have terminals to terminate aluminium conductor up to 25 mm2, The ELMCB shall have sensitivity of 30 - 300 mA as per requirements

4.2 Installation

All ELMCB and MCBs shall be installed in the DB on din rail provided in the DB, spares shall be blocked by blank plates.

4.3 Testing:

Alt ELMCB should be tested for overloading short circuit; earth leakage tripping and MCBs should be tested for overloading and short circuit tripping

5.0 Material:

All materials, fittings and appliances used in the electrical installation shall be of the best quality of approved manufacturer and shall conform to the latest Indian Standard Specifications wherever these exist.

6.0 Workmanship:

Good workmanship and neat appearance are the prerequisites for compliance with the various sections of these specifications. The work shall be carried cut under direct supervision of a person holding Certificate of Competency issued by the State Government and in accordance with the statutory rules and regulations in force. The relevant SI code of practice shall be followed wherever applicable.

7.0 Drawing:

The set of all relevant electrical drawings, with specifications are furnished to the Contractor for his own use until the completion of the contract, however wherever required, detailed drawings shall be prepared and got approved.

On completion of the work, completion drawings shall be prepared and five copies of the same should be submitted to the Employer. The completion drawings shall indicate clearly the main switch board, the runs of various mains and sub-mains, position of points and their controls, All circuits shall be clearly indicated and numbered in the wiring diagrams and all points shall be given the same number as the circuit to which they are electrically connected,

8.0 Marking & Apparatus:

When a board is connected to voltage higher than 250 volts, all the terminals or leads of the apparatus mounted on it shall be marked in the following colours to indicate the different poles or phases to which the apparatus or its different terminals may have been connected.

Three Phases -- Red. Blue & Yellow

Neutral -- Black

Off wire -- White or Grey

Earth wire -- Green



Where four wire three phase wiring is done, the neutral shall be in black colour and the other three wire in another colour, Where has more than one switch, each such switch shall be marked to indicate which section of the installation it controls, The main switch shall be marked as such and where there is more than one main switch is the building, each such switch shall be marked to indicate which section of the installation it controls.

All marking required under this clause shall be clear and permanent,

9.0 Materials

All materials used in the construction of fittings shall be of such quality; design and construction that will provide adequate protection in normal use against mechanical and electrical failures and exposures to the risk of injury or electric shock and shall withstand the effects of exposure to atmosphere.

10.0 Ceiling Rose:

Ceiling rose and similar attachments - A ceiling rose or any other similar attachments shall not be used on a circuit, the voltage of which normally exceeds 250 Volts. Normally only one flexible cord shall be attached a ceiling rose, Specialty designed ceiling roses shall be used for multiple pendants

11.0 Socket Outlets & Plugs:

A socket outlet shall not embody fuse terminals as an integral part of it. But the fuse may be embodied in plug in which case the plug shall be non-reversible and shall be so arranged and connected that the fuse is connected to an cuter or phase conductor or the non-earthed conductor of the circuit. Every socket outlet shall be controlled by switch will be on the live side of the line. In an earthed system of supply, the outlet and plug shall be three pin type and the third terminal connected to earth.

- a) Every lighting fitting shall be controlled by a switch and where control at more than point is necessary by as many as two ways and intermediate switches as there are control points. Lights, fans and socket outlets shall be so located as to provide maximum comfort to the occupant and to enable him to utilise the electricity in the most economical manner.
- b) Where conductors are required to be drawn through tube or channel leading to the fittings, the tube or channel must be free from sharp angles or protecting edges and of such size as will enable them to be wired with the conductors used for the final sub-circuit without removing the braiding or taping, As far as possible all tubes or channels should be of sufficient size to permit looping back.
- c) Where a light fitting is supported by one or more flexible cords, the maximum weight to which the twin flexible cords can be subjected shall be as follows:

SIZE OF TWIN FLEXIBLE CORDS

Nominal cross sectional		No. & diameter area of in wires		Maximum permissible weight	
Sq.lnch	Sq.mm.	Sq.lnch	Sq.mm.	Sq.lnch	Sq.mm.
0.006	0.5	14/0.0076	14/0.193	1.4	3
0.0010	-	23/0.0076	23/0.93	2.3	5
0.0017	1.5	40/0.0076	40/0.193	4.3	10

Where a weight is greater than 4.5 Kgs. (10 Lbs) then it has to be supported, two or three twin flexible cords shall be used so that the maximum weight to which any cord is subjected does not exceed the above values, or Alternatively other support viz, suitable metal pipe or suitable support shall be provided.



No inflammable shade shall form a part of a light fitting unless such shade is well protected against alt risks of fire. Celluloid shade or tight fitting shall not be used under any circumstances.

Enclosed type fittings shall be provided with a removable glass receptacle, arranged to enclose the tamp completely and of such size or construction as to prevent undue heating of the tamp or if the position of fitting be such that the glass receptacle is liable to mechanical damage the glass shall be protected by a suitable wire guard,

12.0 Fittings Wire:

The use of fitting wire shall be restricted to the internal wiring of the lighting fittings. Where fittings wire is used for wiring fittings, the sub-circuit leads shall terminate in a ceiling rose or connector from which they shall be carried into the fittings,

13.0 Lamp Holders:

Lamp holders for use on brackets and the like shall have not less than 1.3 cm (1/2) nipple and all those for use with flexible pendant shall be provided with cord grips. Alt tamp holders shall be provided with shade carriers, Where centre contact Edison screw tamp holders are used, the outer or screw contact shall be connected to the 'middle wire 'or the neutral or to the earthed conductor of the circuit.

14-0Lamps:

All incandescent lamps, unless otherwise required, shall be hung at height of 2.5m (8 ft.), above the floor level they shall be provided with caps of the following patterns:

Upto and including 200 watt. - Standard Bayonet (B)

Above 200 watts and not exceeding 300 watts -Edison Screw (ES.)

Above 300 watts - Golliath Screw (CS)

15.0 Fans, Regulators and Clamps:

- i) Ceiling Fans: Ceiling fans including their suspension shall conform to IS: 374-1951 and to the following requirements:
- a) All ceiling fans shall be wired to ceiling roses or to special connector boxes and suspended from hooks or shackles with insulators between hooks and suspension rods, There shall be no joint in the suspension rod but if joints are unavoidable then such joints (2") minimum length and both ends of the pipes shall touch together within couplers and shall in addition to, be secured by means of split pins; alternatively the two pipes may be welded.
- b) Canopies on top of suspension red shall effectively hide the suspension.
- c) The leadings-in-wire shall be of nominal cross section area not less than 0.002 sq.inch (3.00.029") and shall be protected from abrasion.
- Exhaust fans shall be erected at the places indicated by the Architects, For fixing an exhaust fan, a circular hole shall be provided in the watt to suit the size of the frame, which shall be fixed by means of rag bolt embedded in the wall, The exhaust fan shall be aired as near to the hole as possible by means of a flexible cord, care being taken that the blades rotates in the proper direction.

TESTING OF INSTALLATION

16.0 Insulation Resistance:

a) The insulation resistance shall be measured by applying between earth and the whole system of conductors or any section thereof with all fuses in place and all switches closed and except in earthed concentric wiring alt lamps in position or both poles of the installation otherwise electrically connected together, a direct current pressure of not less than twice the working



pressure provided that it need not exceed 500 volts for medium voltage circuits, Where the supply is derived from the three wire (AC or DC) or a poly phase system, the neutral pole of which is connected to earth either direct 01 through added resistance, the working pressure shall be deemed to be that which is maintained between the outer or phase conductor and the neutral.

- b) The insulation resistance measured as above shall not be less than 50, divided by the number of points on the circuits provided that the whole installation shall be required to have an insulation resistance greater than one megohm.
- c) Control rheostats, heating and power appliances and electrical sings may, it required, be disconnected from the circuit during the test, but in that event the insutation resistance between the case of frame work and all live parts or each rheostat appliance and sign shall not be less than that specified in the relevant 5 specifications shall not be less than half a megohm.
- d) The insulation resistance shall also be measured between all conductors connected to one or phase conductor of the supply and all the conductors connected to the middle wire or the neutral or to the other pole or phase conductors of the supply and its value shall not be less than that specified in sub clause (b)
- e) On completion of an electric installation (or an extension to an installation) a certificate shall be furnished by the contractor countersigned by the qualified supervisor the installation was carried out, The certificate shall be in the prescribed form as required by the local Electrical Supply Authorities, One such recommended form is given in Appendix-B.

Testing of earth continuity path: The earth continuity conductor including metal conduits and metallic envelopes of cables in all cases shall be tested for electric continuity and the electrical resistance of the same along with the earthing lead but excluding any added resistance or earth leakage circuit-breaker measured from the connection with the earth electrode to any point in the earth continuity conductor in the compteted installation shall not exceed one ohm.

Testing of polarity of non-linked single pole switches:

- a) In a two wire installation a test shall be made to verify that all non-linked single pole switches have been fitted in the same conductor throughout and such conductor shall be labeled or marked for connection to an outer of phase conductor or to the non-earthed conductor of the supply.
- b) In a three wire or a four wire installation, a test shall be made to verify that every non-linked single pole switch is fitted in a conductor which is labeled or marked for connection to one of the outer or phase conductor of the supply.

17.0 CONDUIT CAPACITY:

Maximum number of PVC insulated cables confirming to IS: 694-1977 that can be drawn in one conduit shall be as follows:

Nominal cross sectional area of conductor

SIZE OF CONDUIT

	20mm S B	25mm S B	32mm S B	38mm S B	51mm S B	64mm S B
1.5	5 4	10 8	18 12			
2.5	5 3	8 6	12 10			
4	3 2	6 3	10 8			
6	2 -	5 4	8 7			
10	2 -	4 3	6 5	8 6		
16		2 2	3 3	6 5	10 7	12 8
25			3 2	5 3	8 7	9 7
35				3 2	6 5	8 6
50					5 3	6 5
70					4 3	5 4

Page **76** of **90**



NOTE:

- I. The above table shows the max. capacity of conduits for a simultaneous drawing of cables.
- 2 The columns headed '5' applies to runs of conduit which have distance not exceeding 4.25mbetween draw in boxes and which do not deflect from the straight by an angle of more than 15 The columns headed 'B' apply to runs of conduit which deflect from the straight by an angle of more than 15.

18.0 CABLES

18.1 Cables shall be supplied by Electrical Contractor,

18.2 Cable Specifications:

All cables shall be as per latest IS 1554 Part I PVC insulated heavy duty electric cables Part I for working Voltages up to and including 1100 V.

All power cables shall be PVC insulated, arm cured, inner sheathed, PVC insulated aluminium conductor. Control cables shall be of copper conductor.

The core insulation and inner sheath shall confirm to the requirement of Type A IS 5831 STI IS respectively. Similarity for outer sheath, Cables shall have amour of steel wire upto 0 D of 18 mm and flat steel strip for higher OD.

Cables shall be supplied in drums of 1000 mts. for and upto 6 sq mm and 10 sqmm and above in 500 mts,

18.3 Cabling

Cabling shall be done with help of jack and rollers, Cable shall be passed through RCC Hume Pipe wherever road crossing or pathway crossing is there, All cables shall rise form cable trenches in GI Pipes. Cable shall be tagged as per cable schedule at every 30 mts. by Aluminium tags of minimum 2mm thick securely fastened, They shall also be identified near the terminations

Above the cable trenches cable route markers shall be installed as per rules and regulations at every 30 mts and at every turnings of the cables or branching of cables

All cables shall be laid in trenches •at a depth of 750mm and as shown in drawings. Before laying of cables sand shall be spread then the cable shall be laid which shall again be covered with sand minimum 150mm from the top of the largest dia of the cable, Then second class bricks shall be laid across the trench completely covering the trench, lastly excavated soil shall be back filled and compacted by watering intermittently

All cables after laid shall be checked for insulation level and meggered before back filling. Cable entries in Cl pipes or Hume pipes shall be seated by cable compound or putty for smaller dia of pipes. If required for the- cable- to run on cable trays then the cable shall be clamped by 16 SWG Ct saddles and damps All works should be done to the satisfaction of the Engg - in Charge.

18.4 Terminations

Cable shall be terminated by means of single compression glands and terminated by solderless crimped type tugs. All should be done to the satisfaction of the Engg.-in-Charge, If the cores do not have any colour identification, then they should be identified by insulation tape of various phases. Cable shall enter any termination point by means of double compression glands, using reducers if required or drill of holes in gland plates. IF panel installed on a cable trench which does not have any bottom excess then holes shall be drifted in one tine for the cables then the gland plates is cut into two halves from the centre of the hole, Cables inserted and seated and the armour in the bottom should open and earthed to the earth bus. Crimping of tugs shall be done by hand crimping tool or hydraulic crimping



tool with conducting jetty applied to conductors, Insulation shall be cut immediately after the tugs and care should be taken that the conductor is not left open. Alt jointing and crimping shall be carried cut by licensed and experienced jointers approved Etc. and termination and straight joint shall be of 'Taped' or heat shrinkable type as specified.

18.5 Testing

Before energizing, the megger test shall be carried out for insulation resistance between phase to phase and phase to earth.

For cable up to 1,1 KV grade 1000 KV magger shall be used.

DC. High Voltage test shall be conducted after installation on the following and test results are recorded as per format furnished by the Engineer-in-charge,

- a) Alt 1000 Volts grade cables in which straight through joints have been made.
- b) Alt cables above 1100 V grade.

For record purposes test data shall include the measure values of leakage current verses time.

The DC High voltage test shall be performed as detailed below in the presence of the EtC or his authorised representative only.

Cables shall be installed in final position with alt the straight through joints complete. Termination shall be kept on unfinished so that the motors, switchgears, t transformers, etc.. are not subjected to test Voltages

The Test Voltage shall be asunder:

i) for cabbie 3.3 XV Grade 5.4 XV DC ii) for cable 66 XV Grade 10.8 KV DC iii) for cable 11 KV Grade 18 XV DC

Cable schedule and layout drawings must be marked for AS BUILT conditions during the installations work and shall be approved by the Site Engg.

IDENTIFICATION OF EARTHED AND EARTHED NEUTRAL CONDUCTORS AND POSITION OF SWITCHES AND CUTOUTS THEREIN:

Where the conductors include an earthed conductor of two-wire system or an earthed neutral conductor of a multi-wire system or a conductor, which is to be connected thereto, the following conditions shall be compiled with

- 1. An indication of a permanent nature shall be provided by the owner of the earthed or earthed neutral conductor, or the conductor, which is to be connected thereto, to enable such conductor to be distinguished from any live conductor, Such indication shall be provided.
- a) Where the earthed or earthed neutral conductor is the property of the bidder, at or near the point of commencement of the supply.
- b) Where a conductor forming part of a consumer's system is to be connected to the bidder's earthed or earthed neutral conductor, at the point where such connection is to be made.
- c) In all other cases, at a point corresponding to the point of commencement of supply or at such other point as may be approved by an inspector.
- 2. No cut-out, link or switch other than a linked-switch arranged to operate simultaneously on the earthed or earthed neutral conductor and live conductor shall be inserted or remain inserted in any earthed or earthed neutral conductor of a two-wire system or in any earthed or earthed neutral conductor of a multi-wire system or in any conductor connected thereto with the following exceptions
- a) A link for testing purposes OR -
- b) A switch for use in controlling a generator or transformer.



SPECIFICATION FOR PAINTING WORKS

General

All paints are to be best manufacture and to be delivered on the site in the makers original packages and tins and the makers guarantee to be provided if called for by the Consultant, The paints shall be of the quality suitable for use in the local climatic conditions, Thinners must be those recommended by the manufacturers and used only as directed by them,

Sample tint of alt finishing coats shall be prepared and submitted to the Consultant for his approval. The priming, undercoating and finishing coats shall be of different tints, the finishing coat shall be semi-gloss or matte finished as directed by the Consultant, All the materials shall be kept properly protected when not in use. Lids of containers shall be kept closed and in surface of paint in open or partially open containers shall be covered with a thin layer of turpentine to prevent the formation of skin. Materials, which in the opinion of the Consultant have become stale or flat, shall not be used on the works and shall be removed from the site of the work.

The paint shall be put on with approved brushes, kept well bound and well worked during its application. For ironwork, fairly stiff brushes shall be used. The painting to be carried out in such order as directed, by the Consultant, The brushes shall be thoroughly cleaned out before being used for a different type or class of material.

The paint shall generally conform to the chemical composition and other characteristics to the relevant IS specifications

The contents of the drum or tin shall be stirred well before use; Thinning of paint shall not be permitted without the specific permission of the Consultant.

Each coat of paint shall be thoroughly dry before the next coat is laid on, All surfaces shall be adequately prepared before the application of each coat, The surfaces shall be rubbed down with an abrasive material appropriate to the surface under treatment.

All painting work shall be in strict conformity to the sample panels approved by the Consultant. All floors to be twice washed, all marks on paint to be sponged off, the work generally to be touched up after all other workmen have left, the whole of the buildings left clean, perfect and water-tight on completion to the satisfaction of the Consultant, The rate shall include the cost of the following:

- Supply and mixing the paint as specified.
- Preparing the surfaces to be painted.
- Providing and erecting necessary scaffolding if necessary and removing the same after the work is completed.
- Lifting of materials to any height.
- Curing and protecting the painted surfaces.

Acrylic Emulsion Paint

a) Material

Material for Acrylic Emulsion Paint shall be of Asian Paints make or approved manufacturer. A sealed tin ready mixed distemper or selected make shall be opened in presence of Consultant.



b) Surface Preparation

This includes scraping uneven surface, damaged plaster, etc., with carborundum papers of suitable number until hard, clean surface is obtained. This is to be repeated until the work is approved by the Consultant, Putty shall be used to cover holes and unevenness on the surface as described in preparation and application of putty.

c) Primer application

Primer should be a cement primer, or as per manufacturer's (of acrylic emulsion) specification, These tins should be opened in presence of the Consultant, Before applying primer on the surface its consistency must be approved by the Consultant and shall be same as specified by the manufacturer. Primer should be applied with smooth brushes on surface to cover entire surface properly. There should be no brush marks, strips, etc. when applied on the surface. This surface should be allowed to dry at least for 24 hours before next application.

d) Preparation & Application of Putty

Putty wilt be prepared as under. It shall be prepared from English whiting chalk, linseed oil (Swastik), white zinc, and plaster of Paris in the proportion of 7: 1: 2: 1. However, exact proportion shall be decided as per site condition, If required or instructed respective colour be mixed in presence of the Consultant, Water, if required, can be added as per the instructions and requirements to have proper consistency and stickiness. Putty should be smooth and free from any coarse ingredient, etc.

Application of putty should be started only after approval of the area by the Consultant. It should be applied on the whole surface to make the surface smooth, No lumps should be seen on the surface. After application, it should be allowed to dry completely.

After drying, the surface should be scraped with sand/emery paper tilt smooth surface is obtained.

If no proper smoothness is obtained, again apply primer, putty, etc. and repeat the processes as mentioned above, till the surface is perfect smooth as per instructions.

After application of first coat of putty, the surface shall be allowed to dry for 24 hours, Sand papering shall then be done to give smooth surface, Subsequent applications of putty and sand papering shall be done till the Consultant is satisfied about final surface, which should be absolutely even, levelled and smooth.

e) On the surface so prepared, three coats of acrylic emulsion paint of selected shade shall be applied only after inspection of Consultant. A horizontal and vertical travel of brush / roller together will be considered as one coat of paint. Each coat of paint shall be applied only after inspection of Consultant, No brush / roller marks shall be visible on the surface at the end of final coat, Final surface shall be smooth, even or roller finish and uniform in colour and texture.

Mode of Measurement

The payment shall be on Sq.Ft. basis of finished area and deduction for openings shall be made, The rate shall include all materials, surface preparations, labour, tools and tackles, scaffolding, cleaning etc. complete as specified and as per relevant IS codes.



BILL OF QUANTITIES - PREAMBLE

- 1. The Bill of Quantities shall be read in conjunction with the drawings, the Conditions of Contract and the specifications, as these documents are jointly explanatory and descriptive of the works included in the Contract.
- 2. The Quantities of work and the material in the Bill of Quantities are not to be considered as limiting or extending the amount of work to be done and materials to be supplied by the Contractor, The Quantities in the Bill of Quantities are an estimate of the amount of work, but work will be measured on completion and the Contractor will be paid on the actual measurements of work agreed by the Consultant,
- 3. Any special methods of measurements used are stated at the head of or in the text of the Bill of Quantities for the trades or items affected. Alt other items are measured net in accordance with the drawings and no allowance has been made for waste. The units quoted are based on English units that is one feet equals 12 inches,
- 4. General directions and descriptions of work and materials given elsewhere in the Contract documents are not necessarily repeated in the Bill of Quantities, Reference is to be made to the other documents for the information,
- 5. The Contractor shall be deemed to have visited the Site before submitting his Tender and to have examined for himself the Conditions under which the work wilt be priced and all other matters affecting the execution of the work and the cost thereof.
- 6. A price or rate in figures is to be entered against each item in the Bill of Quantities, whether Quantities are stated or not.
- 7. The prices and the rates inserted in the Bill of Quantities are to be the full inclusive value of the work described under the various items, including all cost and expenses which may be required for preliminary and for the completion of the work described, together with alt costs and obligations set forth or implied in the Conditions of Contract, the specifications and the drawings, where special risk liabilities and obligations cannot be dealt with as above, then the price thereof is to be separately stated in the item provided for the purpose.
- 8. Items on painting and other finishes may be Quantity wise completely altered (either added or omitted) and the same shall not affect any rates quoted.
- 9. Where prices have been entered against Lump sum Items in the Bill of Quantities, payment for such affected items shall be made in <u>equal</u> installments (subject to the provision of the relevant clause of the Conditions of the Contract) in proportion to the extent of which at the end of the month the relevant works have been done at the discretion of the Consultant,
- 10. The provisional Sums, included in the Bill of Quantities to cover for Contingencies and additional works are to be expanded as occasion arises under the direction of the Consultant and any reduction or additional work executed will be measured and valued at the rates inserted in the Bills of Quantities or where such rates are not applicable then as provided for in relevant Clauses of the Conditions of the Contract, All other provisional and prime cost sums entered in the Bills of Quantities shall be dealt with in accordance with relevant Clause of the Conditions of the Contract,



- 11. If the accepted tendered rates for items in the Bill of Quantities 'cover a number of operations, the Consultant may at his discretion, allow part rates in 'interim bills' against such items of which only one of the operations are completed. The quantum of part- rate shall be decided by the Consultant.
- 12. Only figured dimensions on drawings shall be followed. If any dimension is not available on the drawing, it shall be obtained from the Consultant.
- 13. Wherever a reference is made to any Indian standard code of Practice, it shall mean the latest version of the relevant standard in use:
- 14. Before the commencement of the work, accurate surveys and levels of the ground, whether proposed to be excavated or filled up or not, shall be taken jointly by the Consultant and Contractor or his agent, and drawings of the levels so taken shall be prepared from such surveys and levels. These shall be signed by the Contractor and the Consultant and the levels so taken and recorded shall be final and binding on the Contractor,
- 15. Every portion of the work shall be kept clear of accumulations from time to time and delivered up clean and free from all defects or every at the conclusion of the works. As the work gets completed in any particular portion of the work area, the Contractor shall clear the portion so completed and make the same available for further activities, The Contractor shall give full cooperation and facilities to other Contractor(s).
- 16. The Contractor shall be responsible for the true and proper setting out of the works, for the correctness of position, levels, dimensions and alignment, of all necessary instruments, appliances and labour in connection therewith, If at any time during the progress of the works any error shall appear in the position, levels, dimensions or alignment of any line or level by the Consultant shall not in any way relieve the Contractor of his responsibility for the correctness thereof, and the Contractor shall carefully protect and preserve all Bench marks, site-rails, pegs and other survey pedestals in setting out works.
- 17. The plea of Custom Prevailing "will not on any account be permitted as an excuse for infringement on any of the specifications.
- 18. Materials and workmanship for the civil works in this Contract shall be as per the given Technical Specifications, Items for which specifications are not available, will be executed as per latest IS code or P.W.D handbooks Part I & It of State Government,
- 19. **NOTATIONS:** In the column "UNIT" of the Bill of Quantities:

SFT. - Represents - Square Feet

RFT - Represents - Running Feet

L.S - Represents - Lump Sum,

NO - Represents - Number

PT - Represents - Point



List of Materials of Approved Brand and / or Manufacture Civil & Carpentry:

1	Cement	1. Ultra Tech	
	33333	2. Coromandel	
		3. ACC	
		4. Dalmia or approved equivalent.	
2	Steel	1. Sail	
	XT' 'C' 1 HT'1	2. Tisco or approved equivalent.	
3	Vitrified Tile	1. RAK	
		Kajaria Jhonson	
		4. Euro	
4	Ceramic Tile	1. Kajaria	
·	Germine The	2. RAK	
		3. Nitco	
		4. Jhonson	
5	Tile fixing Adhesive	1. Sika	
		2. Pidilite	
		3. Bal Endura	
		4. Fosroc	
6	Marine	5. BASF or approved equivalent.	
0		1. Century 2. Greenply	
	Plywood(IS	3. Mayur or approved equivalent	
7	303)		
7	BWR grade	1. Century 2. Greenply	
	phenolbonded	3. Sharon Ply	
	plywood (IS 303)	4. Mayur or approved equivalent.	
		4. Mayur or approved equivalent.	
8	Particle Board	1. Century	
		2. Greenply	
		3. Merino	
0	D1 1 D 1	Duro or approved equivalent	
9	Block Board	1. Century 2. Greenply	
		3. Swastik or approved equivalent	
10	Flush doors	1. Century	
		2. Kutty	
		3. Green ply or approved equivalent	
11	Fibre Board	1. Century	
11	(MDF,LDF)	2. Novapan	
	(1111)1,111)	3. Swastik or approved equivalent	
12	P.O.P.	Gyproc India	
		2. India Gypsum	
		3. Saint Gobain or approved equivalent	
13	Putty	1. Birla Wall Care	
		2.JK Wall	
		Putty3.Asian	
14	Laminates	1. Greenlam	
		2. AICA	
		3. Euro lam	
15	Handles	4. Merino or approved equivalent.	
15	Handles	1. Godrej 2. Hafele	
		3. Dorset or approved equivalent.	
1		o. Dorset or approved equivalent.	



1.6	Class	1 Saint Cabain	
16	Glass	1. Saint Gobain	
		2. Float Glass India (Asahi)	
		3. Modigaurd or approved equivalent.	
17	Screws	1. GKW	
		2. Ebco	
		3. Oxidised or approved equivalent.	
18	Hardware (Hinges	1. EBCO	
	&others)	2. Godrej	
	ecouncis)	3. Haffele	
		4. Dorset or approved equivalent.	
19	Adhesive for	1. Fevicol SH	
	fixinglaminate	2. Araldite of Ciba Geigy	
		3. Bal Endura	
		4. Pidilite or approved equivalent.	
20	Locks	1. Godrej	
		2. Ebco	
		3. Harrison	
		4. Dorset or approved equivalent.	
21	Wood preservative	1. Bison by British paints or approved equivalent.	
22	Cement Primer	1. Berger	
		2. Asian	
		3. ICI Dulux	
		4. Nerolac paints or approved equivalent	
22	A 11	A D	
23	Acrylic	1. Berger	
	Emulsionpaints	2. Asian	
		3. ICI Dulux	
		4. Nerolac or approved equivalent	
24	Enamel paints	1. Berger	
	1	2. Asian	
		3. ICI Dulux	
		4. Nerolac or approved equivalent	
25	W/ 1 '	A D	
25	Wood primer	1. Berger	
		2. Asian	
		3. ICI Dulux or approved equivalent	
26	Aluminium sections	1. Hindalco	
	30000110	2. Jindal	
		3. Nelco or approved equivalent	
07	C D . 1		
27	Curtain Rods	1.Vista.	
		2.Trac	
		3.MAC or approved equivalent	
28	Drawer – telescopic	1.EBCO	
	111111111111111111111111111111111111111	2. Efficient or approved equivalent.	
00	0 0 7		
29	Gypsum Ceiling	Saint	
		gobian	
		Gyproc	
		Diamond	
30	Grid Ceiling	Armstrong	
		Diamond	



Plumbing:

4	C I D' 1	A NECO	
1	Cast Iron Pipes and	1. NECO	
	fittings (ISI approved)	2. Raj iron Foundry	
		3. Kapilansh	
2	CDVC -i1	4. Kajeco 1. Ashirwad	
2	CPVC pipes and		
	Fittings	2. Flowguard – Astral3. Ajay or approved equivalent	
	CW/D DV/C / LIDV/C	Finolex	
3	SWR PVC/ UPVC		
	Pipes and Fittings	2. Supreme3. Prince	
		4. Polypack	
		5. Jindal or approved equivalent	
4	CP Brass Fittings	Jindar of approved equivalent Jaguar	
	Cr Drass rittings	2. Parryware	
		3. Ess-Ess	
		4. Metro or approved equivalent.	
5	Floor Drain Fixture,	1. Supreme	
	Rain Water Outlets &	2. ACO	
	Channel Gratings	3. GMGR	
	Grainier Gracings	4. Neer or approved equivalent.	
6	C.P. Grating for Floor	1. GMGR	
	Trap	2. Chilly	
		3. Viking or approved equivalent.	
7	GI / M.S Pipes (IS:	1. Jindal	
	1239 and IS: 3589)	2. Swastik	
	ĺ	3. Surya	
		4. Tata or approved equivalent	
8	Pipe clamp	1. Chilly	
	&supports	2. Supreme	
		3. Euroclamp or approved equivalent.	
9	HDPE Pipe	1. Duraline	
	1 '	2. Kimplas	
		3. Reliance or approved equivalent.	
10	Butterfly Valve	1. Audco	
	,	2. Danfoss	
		3. Honeywell	
		4. Sant or approved equivalent.	
11	Check Valve – Wafer	1. Advance	
	Туре	2. Danfoss	
		3. Sant	
		4. Kirlosker or approved equivalent.	
12	Anchor bolts	1. Fischer	
		2. Hitli or approved equivalent.	

Note: a. Materials mentioned in the specification shall be used for the work. If specified material isnot available prior approval of the Employer shall be taken to use other brands.

b. Preference of makes, supply of items should be consulted with client/consultant beforeeffecting of supply.

NAME AND ADDRESS OF THE CONTRACTOR:

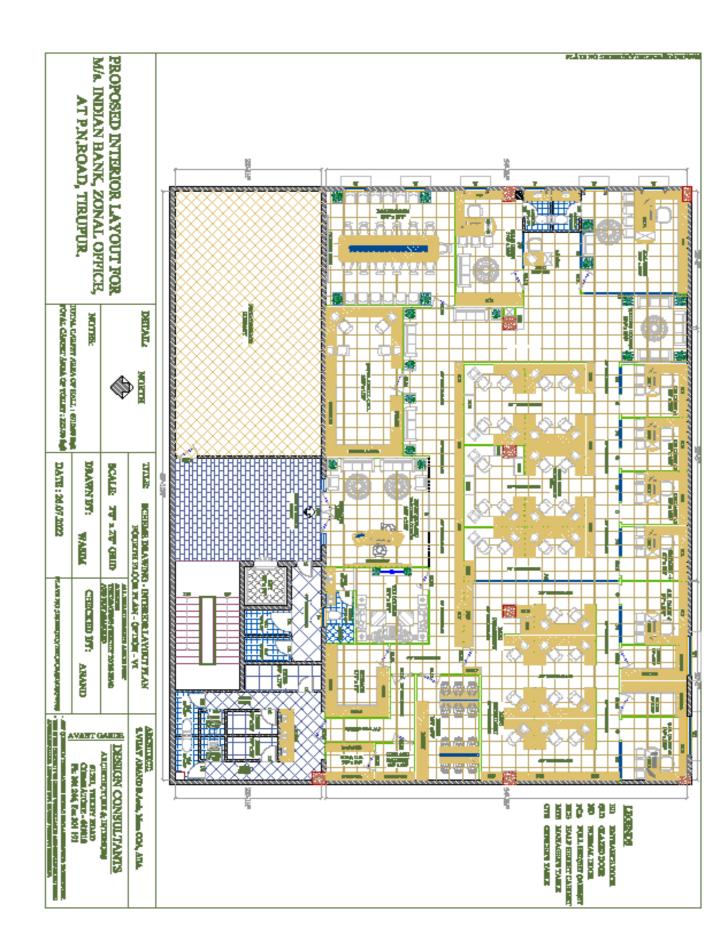
SIGN & SEAL OF THE CONTRACTOR:

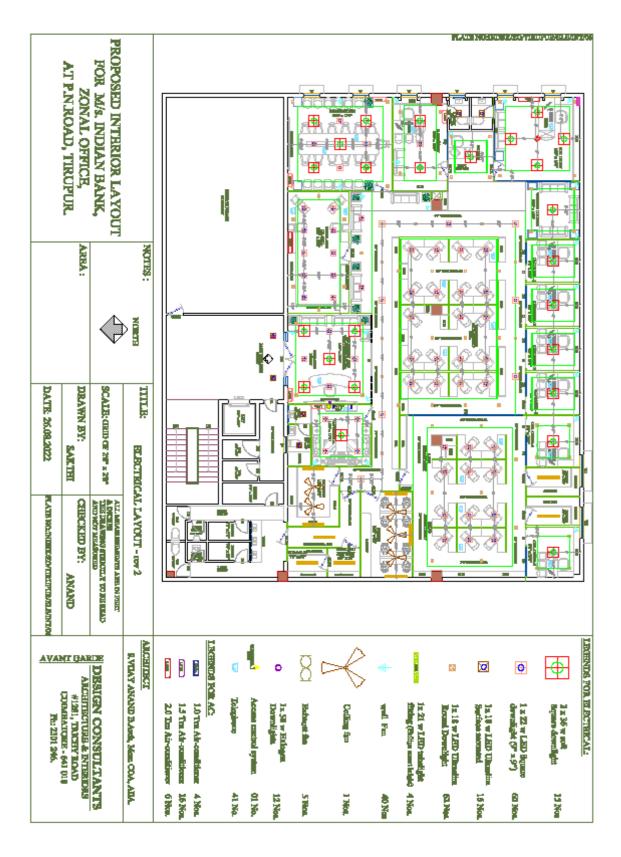
Date:

Place:

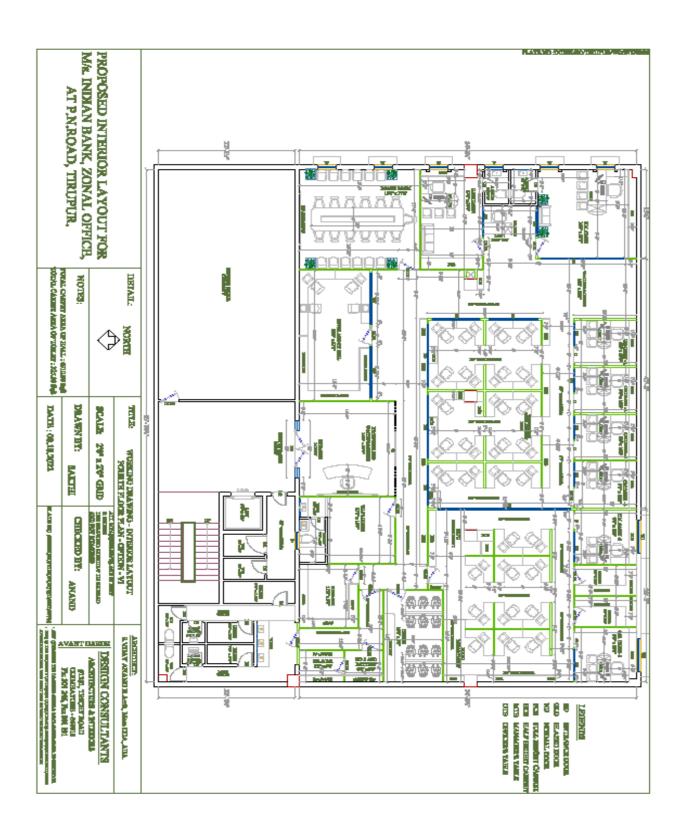


DRAWINGS











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