



Bharat Heavy Electricals Limited
Industrial Valves Plant
Goindwal Sahib (Punjab)

Enquiry No.
2223-WC03

Date:
28.06.2022

NOTICE INVITING TENDER (NIT)

Dear Sir / Madam,

BHEL Goindwal Sahib (Punjab) invites offers from interested bidders / suppliers for submission of their offer through e-procurement mode at <https://eprocurebhel.co.in/>. Offers in any other mode will not be accepted. In case of any difficulty faced while registering on BHEL's e-Procurement portal developed by NIC, queries may be addressed to 0120-4001002, 0120-4001005 and 0120-6277787; email: support-eproc@nic.in. These details are also available on 'Contact Us' page of the portal.

Tender Enquiry No.	2223-WC-03
Tender Enquiry Date	28.06.2022
Form of Contract	Works
Type of Tender Enquiry	OPEN
Tender / Item Description/Scope of Work	Work includes carrying out calibration of furnace i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL
Estimated value of Work (in Rs)	Rs. 37500 [excluding tax] (Rupees Thirty Seven Thousand Five hundred only).
Validity of offer	45 days from the date of quotation
Delivery Schedule	30 days from the Work Order Date
Location(s) of Supply / Work	Industrial Valves Plant, Goindwal, BHEL Goindwal Sahib (Punjab), Pincode 143422, Distt-Taran tarn
Earnest Money Deposit (EMD)	Not Applicable
Security Deposit	Not Applicable
Reverse Auction	Not Applicable
Minimum Local content for Class I Supplier	Not Applicable
Minimum Local content for Class II Supplier	Not Applicable
Tender Download / Bid Submission Start Date	28.06.2022 (14:00 Hrs. IST)
Tender Download / Bid Submission End Date	11.07.2022 (15:00 Hrs. IST)
Tender / Bid Opening Date	11.07.2022 (15:30 Hrs. IST)
Quotation Parts	Two Part Bid
Integrity Pact (IP)	Not Applicable
Contact Person Details	Sh. Amit Kumar, Dy. Manager 01859-224 618, amit.garg@bhel.in OR Sh. Rakesh Kumar, SDGM 01859-224 615, Kumarrakesh@bhel.in



Bharat Heavy Electricals Limited
Industrial Valves Plant
Goindwal Sahib (Punjab)

Enquiry No.
2223-WC03

Date:
28.06.2022

SCOPE OF WORK

Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL

SPECIAL CONDITIONS OF CONTRACT

- 1) Complete calibration Work by finalised agency to be carried out at BHEL IVP Goindwal Factory, vendor shall arrange all equipment required for calibration work by themselves.
- 2) The thermocouples, temperature controllers & temperature recorders etc used for furnace qualification are to be ensured to have valid calibration as per API 6A
- 3) Calibration certificate shall have validity for 01 year from date of calibration.

Pre-Qualification

1. Only those bidders shall be considered who have carried out calibration / thermal mapping work of a Furnace. Bidders to submit PO/LOI/agreement copy of such work which are dated within 05-year period from opening date of tender enquiry.



Bharat Heavy Electricals Limited
Industrial Valves Plant
Goindwal Sahib (Punjab)

Enquiry No.
2223-WC03

Date:
28.06.2022

ON COMPANY LETTER HEAD

CERTIFICATE IN REGARD TO RESTRICTIONS UNDER RULE 144(XI)
OF THE GENERAL FINANCIAL RULES (GFRS), 2017

"I have read the clause regarding restrictions on procurement from a bidder of a country which shares a land border with India; I certify that bidder (.....Name of Bidder) is not from such a country or, if from such a country, has been registered with the Competent Authority. I hereby certify that bidder (.....Name of bidder) fulfils all requirements in this regard and is eligible to be considered"

Authorized Signatory of bidder

(Signature and Seal)

PART-I (TECHNO-COMMERCIAL BID)			
(To be filled by bidder & submit with offer as pdf file only)			
Tender Enquiry No. & Date		2122-WC03 dated 28.06.2022	
Tender Description		Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL	
Bidder must note following points: 1. This workbook is protected, except for cells where comments/confirmation is to be given by bidder. 2. Bidder is advised not to unprotect/tamper the sheet/ alter the terms mentioned in the sheet. 3. Any alteration to terms mentioned by BHEL will be considered as tampering and bidder's offer shall be liable for rejection. 4. Bidders are advised to only fill the unprotected cells (shaded cells) by dropdown or writing the comments as applicable as their confirmation . Failure on the part of bidder in not returning this duly filled-up techno-commercial bid and/or submitting incomplete replies may lead to rejection of bidder's quotation. 5. All the commercial terms and conditions shall be indicated by vendor in this format only and nowhere else in his quotation. However, in case the space for vendor's reply is not sufficient against a particular question, the vendor shall furnish same by way of separate annexure/sheet attached to this questionnaire, indicating cross-reference of respective clauses.			
BIDDER's DETAILS			
Sr. No.	Elements	Remarks	
1	Bidder's Name/Name of the Firm		
2	Quotation reference no. & date		
3	Contact Person Name/Number/DOB/Designation	Name: Contact No: DOB: Designation:	
4	Email ID (s)-(Can be provided more than one)		
5	Mobile No. (s)		
6	Tel. No. (s)		
7	Fax No.		
8	Registered Address		
9	Address for Correspondence		
10	Bidder Type (Indian / Foreign):		
11	Company's Establishment Year		
12	Company's Nature of Business		
13	Company's Legal Status (Limited Company / Undertaking / Joint venture / Partnership / Others):		
14	Company Category (Micro unit as per MSME / Small unit as per MSME / Medium unit as per MSME / Ancillary unit / Project affected person of		
15	Status of the Company / Firm * (Relevant documents must be enclosed) (Tick the relevant option)	☐ Public Limited; ☐ Private Limited ☐ Partnership Firm; ☐ Single Ownership	
16	Name of Owner / Partner's of Firm		
17	PF Registration No. (if any) ESI Registration No. (if any)	PF No: ESI No:	
18	GST No.		
19	PAN No.		
TECHNICAL CONDITION DETAIL			
Sr. No.	Elements	Response	Remarks
1	Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL	Select from the drop down list	
COMMERCIAL CONDITIONS & DETAILS			

Sr. No.	Elements	Response	Remarks (if any)
1	Delivery term: FOR Goindwal Sahib Basis (refer tender terms & conditions)	Select from the drop down list	
2	IGST supply (%)	Select from drop down list	
3	SGST supply (%)	Select from drop down list	
4	CGST supply (%)	Select from drop down list	
5	Payment term: Due payment against supplies received shall be due after 30 days of receipt and acceptance of material and shall be paid within next 15 days period. (refer tender terms & conditions)	Select from the drop down list	
6	Delivery period: Within 30 days from placement of WO / LOI. (refer tender terms & conditions)	Select from the drop down list	
7	Validity: 45 days from techno commercial bid opening. (refer tender terms & conditions)	Select from the drop down list	
8	LD clause: Penalty for late delivery will be applicable @ 0.5% per week or part thereof subject to a maximum of 10.0 %. (refer tender terms & conditions)	Select from the drop down list	
9	Risk purchase: If the supplier fails to deliver the goods within the delivery specified in the Purchase Order, BHEL will be entitled to terminate the contract and to Purchase elsewhere at the risk and cost of the seller either the whole of the goods or any part which the supplier has failed to deliver or despatch within the delivery period mentioned in the Purchase Order. (Refer tender terms & conditions)	Select from the drop down list	
10	Firm Price: The quoted / finalised rates shall be firm till execution of the supplies.	Select from the drop down list	
11	CERTIFICATE IN REGARD TO RESTRICTIONS UNDER RULE 144(XI) OF THE GENERAL FINANCIAL RULES (GFRS), 2017 as per format attached in NIT	Select from drop down list	
12	I have thoroughly gone through the attached tender terms & conditions and understood the above techno-commercial requirements	Select from the drop down list	
Item detail			
Item Sl. no.	Nature of Work	Description	Quoted / not quoted
1	calibration of furnace (Therelek-make Electric Furnace (36kW)	Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL	Select from the drop down list
We further, confirm that we have quoted the rates in the tender considering Inter-alia the 1. Tender Document(s) 2. Additional Document(s) (if any) 3. BOQ Document (Price Bid Format) 4. Corrigendum (if any) 5. Pre Bid Meeting Minutes (if any) We hereby certify that we have fully read and thoroughly understood the tender requirements and accept all terms and conditions of the tender including all corrigendum/addendum issued (if any). Our offer is in confirmation to all the terms and conditions of the tender including all corrigendum/addendum (if any) and minutes of the pre-bid meeting (if any). In the event our offer is found acceptable and Order is placed /Contract is awarded to us, the complete tender document shall be considered for constitution of Order / Contract Agreement.			

Validate

Print

Help

Item Wise BoQ

Tender Inviting Authority: BHEL IVP Goindwal Sahib

Name of Work: Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL

Contract No: 2223-WC03 dated 28.06.2022

Name of the Bidder/
Bidding Firm /
Company :

PRICE SCHEDULE

(This BOQ template must not be modified/replaced by the bidder and the same should be uploaded after filling the relevent columns, else the bidder is liable to be rejected for this tender. Bidders are allowed to enter the Bidder Name and Values only)

NUMBER #	TEXT #	NUMBER #	TEXT #	NUMBER #	NUMBER	NUMBER	NUMBER #	NUMBER #	TEXT #
Sl. No.	Item Description	Quantity	Units	BASIC RATE In Figures To be entered by the Bidder in Rs. P	GST (If applicable in Percentage)	GST Amount in Rs. P	TOTAL AMOUNT excluding taxes in Rs. P	TOTAL AMOUNT including taxes Rs. P	TOTAL AMOUNT In Words
1	2	4.00	5	7	8	9	11.00	12.00	13
1	Work includes carrying out calibration of furnace (Therelek-make Electric Furnace (36kW) i.e. conducting temperature uniformity survey to qualify the electric furnace which is used for heat treatment process like stress relieving, normalizing, annealing, tempering etc. as per NABL	1.00	No			0.00	0.00	0.00	INR Zero Only
Total in Figures							0.00	0.00	INR Zero Only
Quoted Rate in Words		INR Zero Only							

	QUALIFICATION OF FURNACES	Rev No : 07
	Procedure No: MS:INST:PR:05	Date : 28-09-2020

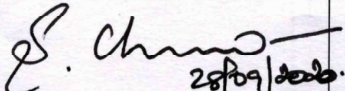
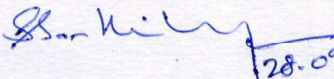
**BHARAT HEAVY ELECTRICALS LIMITED
TIRUCHIRAPPALLI**

**MAINTENANCE & SERVICES
INSTRUMENTATION SECTION**

MS:INST:PR:05/07

PAGE: 01 OF 05

QUALIFICATION OF FURNACES

REV	DATE	PREPARED BY	REVIEWED & APPROVED BY
06	28-09-2020	 S.CHANDRASEKAR SM/M&S	 SANTHI MARAGATHAMANI AGM/M&S

	QUALIFICATION OF FURNACES	Rev No : 07
	Procedure No: MS:INST:PR:05	Date : 28-09-2020

RECORD OF REVISION

REV. STATUS	DATE	REMARKS
Rev 01	31.07.1996	Clause No.1.2: Modified Clause No.2.1.2: Modified Clause No.2.2: Modified Clause No.3.4: Modified Clause No.3.5: Modified Clause No.4.1: Modified Page 01 of 03: Title Modified
Rev 02	02.02.1998	Page 01 of 03: Title Modified Page 02 of 03 and Page 03 of 03 : The term 'Calibration' modified as 'Qualification' in various clauses.
Rev 03	06.09.2000	No change in text. However format brought in line with other procedures and signatories updated to current Organization.
Rev 04	02.04.2010	Clause 1.3: Editorial correction Clause 3.6, 3.6.1, 3.6.2, 3.6.3 & 3.6.4: Added Clause 4.3: Added Clause 6.2: Modified in line with ERP system Clause 7.0: Added
Rev 05	01.08.2013	Clause 2.1, 2.2, 3.2, 4.2 & 4.3 Modified Clause 7.0 ASTM A991/A991M- 10 and API Specification 6A/ISO 10423 are added
Rev 06	14.01.2016	Clause 1.1 & 2.1 modified Clause 2.1.3 & 2.1.4 are deleted Clause 2.2 : completely revised to match API 6A and ASTM A991M specifications. Clause 2.3 edited Clause 2.4 added Clause 3.0 and its sub clauses – altered and renumbered Clause 4.1 edited – Clause 4.1.1 and 4.1.2 added Clause 5.2 deleted Clause 6.2 modified
Rev 06	28.09.2020	Clause 2.2.2.3 added Clause 2.3 edited

	QUALIFICATION OF FURNACES	Rev No : 07
	Procedure No: MS:INST:PR:05	Date : 28-09-2020

1.0 SCOPE

- 1.1 This procedure details out the method for conducting temperature uniformity survey to qualify the furnaces which are used for heat treatment process like stress relieving, normalizing, annealing, tempering etc.
- 1.2 The purpose of qualification is to ensure uniform temperature distribution inside the furnace during the soaking period.

2.0 PRE-REQUISITE

- 2.1 The furnace qualification shall be done either with or without job loaded in the furnace.
 - 2.1.1 If furnace qualification is to be done with job loaded, it shall be ensured that the furnace is loaded with job of typical or maximum production size and weight.
 - 2.1.2 If furnace qualification is to be done without job, then the thermocouples shall be placed at suitable points covering the proposed working zone of the furnace.
- 2.2 Thermocouple requirements:
 - 2.2.1 For those furnaces in which the job temperature is being measured & recorded during regular usage; then for temperature uniformity survey, the thermocouples shall be placed in the outer extremities, center portion of the working zone and in all the suspected locations.
 - 2.2.2 For those furnaces which are used for heat treatment of products falling under API specification then;
 - 2.2.2.1 For furnaces having working zone less than 0.3m³, a minimum of three thermocouples located at either at the front, centre and rear, or at the top, centre and bottom of the furnace working zone.
 - 2.2.2.2 For furnaces having working zone greater than 0.3m³, a minimum of nine shall be used. For each 3.5m³ of the furnace working zone surveyed, at least one thermocouple shall be used, up to a maximum of 40 thermocouples.
 - 2.2.2.3 The thermocouple location diagram for qualification of furnace shall be as mentioned in Annexure-A.
- 2.3 The thermocouples, temperature controllers & temperature recorders used for furnace qualification are to be ensured to have valid calibration.
 - 2.3.1 Field Instruments (thermocouples, temperature controllers & temperature recorders) used for furnace qualification with respect to API requirement will be calibrated once in 3 months with reference to master instrument having accuracy ± 0.25 % of full scale range.
- 2.4 Temperature setting:

Wherever different heat treatment cycles are to be performed on the batch type furnaces and if the operating range does not exceed a spread of 150°C, the midpoint temperature will be selected for furnace qualification. If the furnace operating range exceeds a spread of 150°C the qualification will be done on the lowest and highest heat treatment cycles.

	QUALIFICATION OF FURNACES	Rev No : 07
	Procedure No: MS:INST:PR:05	Date : 28-09-2020

3.0 PROCEDURE FOR TEMPERATURE UNIFORMITY TEST

3.1 Batch Type Furnace:-

- 3.1.1 The furnace shall be started and allowed to reach the set point temperature(i.e Soaking Temperature) with the specified Rate of heating.
- 3.1.2 When the thermocouple readings raises to within 100°C of the soaking temperature the thermocouple readings shall be recorded with an interval of 5 minutes till all the thermocouples reaches soaking temperature. From start of soaking temperature the thermocouple readings shall be recorded at an interval of 2 minutes for the first 10 minutes duration, after that the thermocouple readings shall be recorded with an interval of 5minutes till the end of soaking period.
- 3.1.3 The soaking temperature of the furnace shall be maintained for a minimum period of 30 minutes.
- 3.1.4 Where more than one operating temperature ranges are to be qualified, the qualification procedure shall be repeated as per clause 3.1.1 to 3.1.3
- 3.1.5 The temperature chart shall be verified and the difference between maximum and minimum temperature during soaking and total time of the soaking period are to be marked in the temperature chart.

3.2 Continuous Discharge Furnace:

- 3.2.1 For continuous discharge furnace the qualification will be done with a dummy water wall panel or the similar job used in the furnace. A minimum of four thermocouples shall be fitted in the job and the location of the thermocouples shall be ensured that it covers the entire job.
- 3.2.2 The furnace shall be started and allowed to reach the set point temperature(i.e Soaking Temperature). When the job temperature reaches 400 °C, the temperature readings of furnace and job thermocouples shall be recorded at an interval of 5 minutes.
- 3.2.3 From start of soaking temperature the job and furnace thermocouples readings shall be recorded at an interval of 2 minutes till the end of soaking period. The temperature readings shall be recorded at an interval of 5 minutes after the end of soaking period and till the job thermocouple readings reaches 400 °C.
- 3.2.4 The roller speed is monitored and recorded to attain the required soaking time. The temperature chart shall be verified and the difference between maximum and minimum temperature during soaking period and the soaking time are to be marked in the chart.
- 3.2.5 Program for heat treatment cycles shall be given by the quality control and production.

	QUALIFICATION OF FURNACES	Rev No : 07
	Procedure No: MS:INST:PR:05	Date : 28-09-2020

4.0 ACCEPTANCE NORMS

- 4.1 This exercise qualifies the furnace, if the difference between the maximum & minimum temperature of all the thermocouple readings during soaking period does not exceed the temperature tolerance stated as below;
- 4.1.1 $\pm 8^{\circ}\text{C}$ for furnaces intended for Heat Treatment of products falling under API specification.
- 4.1.2 $\pm 15^{\circ}\text{C}$ for all other furnaces
- 4.2 The furnace qualification is valid for one year. A requalification shall be carried out whenever any major overhauling of furnace is done.
- 4.3 Production will ensure that each furnace is qualified with the help of M&S. Verification activities and certification will be carried out by Quality control.

5.0 EXEMPTION

- 5.1 This procedure doesn't represent for heating furnaces/ovens like swaging, squeezing, salt bath, electrode rod heating, flux baking oven which are intended for pre heating of jobs. However the temperature measuring & controlling instruments in these furnaces shall be periodically calibrated

6.0 RECORDS

- 6.1 The records of qualification shall include the following:
1. Furnace identity/work center number
 2. Location
 3. Furnace working zone dimensions
 4. Operating ranges
 5. Permissible error
 6. Date of Qualification
 7. Qualification results
 8. Location of thermocouples layout
 9. Variation in temperature ranges (calculated from chart)
 10. Limitation of use
 11. Recorder chart
- 6.2 The furnace qualification records are retained for a period of 5 years. In case of furnaces intended for API specification products the records are retained for a period of 10 years.

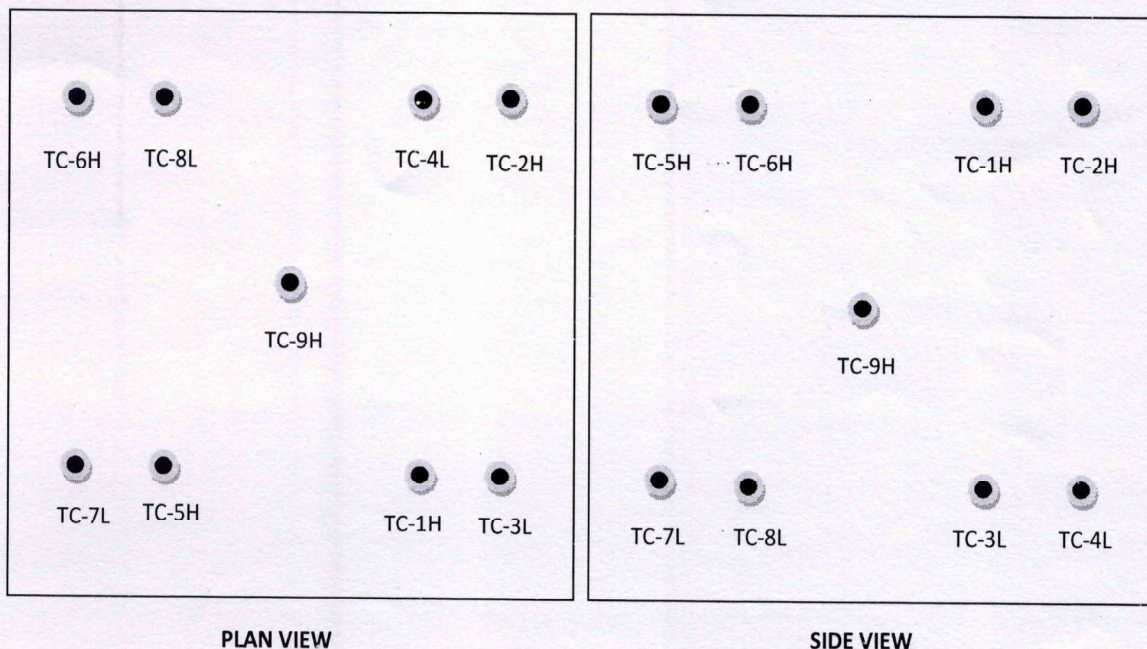
7.0 REFERENCES

1. API Specification 6A/Annex M
2. ASTM A991/A991M-10

Annexure A:**Thermocouples location diagram for furnaces used for API products**

1. For the Rectangular type furnaces listed below the thermocouple locations shall be as per Fig.A

S.N	Furnace No	Furnace Name	Location	Furnace Working Zone
1	1615-2115	ELHEAT ELECTRICAL FURNACE	Bldg-5 / Bay-B	$L \times B \times H = 1.2m \times 1.5m \times 1.2m = 2.16m^3$
2	1616-0225	BAGSVIG ELECTRICAL FURNACE	Bldg-6 / Bay-5	$L \times B \times H = 2.1m \times 2.1m \times 1.9m = 8.379m^3$
3	1615-2627	THERELEK ELECTRICAL FURNACE	Bldg-6 / Bay-5	$L \times B \times H = 1.3m \times 1.6m \times 1.3m = 2.704m^3$
4	1548-4122	10T THERELEK ELECTRICAL FURNACE	Bldg-6 / Bay-5	$L \times B \times H = 2m \times 1.5m \times 1.5m = 4.5m^3$
5	1615-1944	PRECON ELECTRICAL FURNACE	Bldg-6 / Bay-5	$L \times B \times H = 1.3m \times 1.6m \times 1.2m = 2.496m^3$

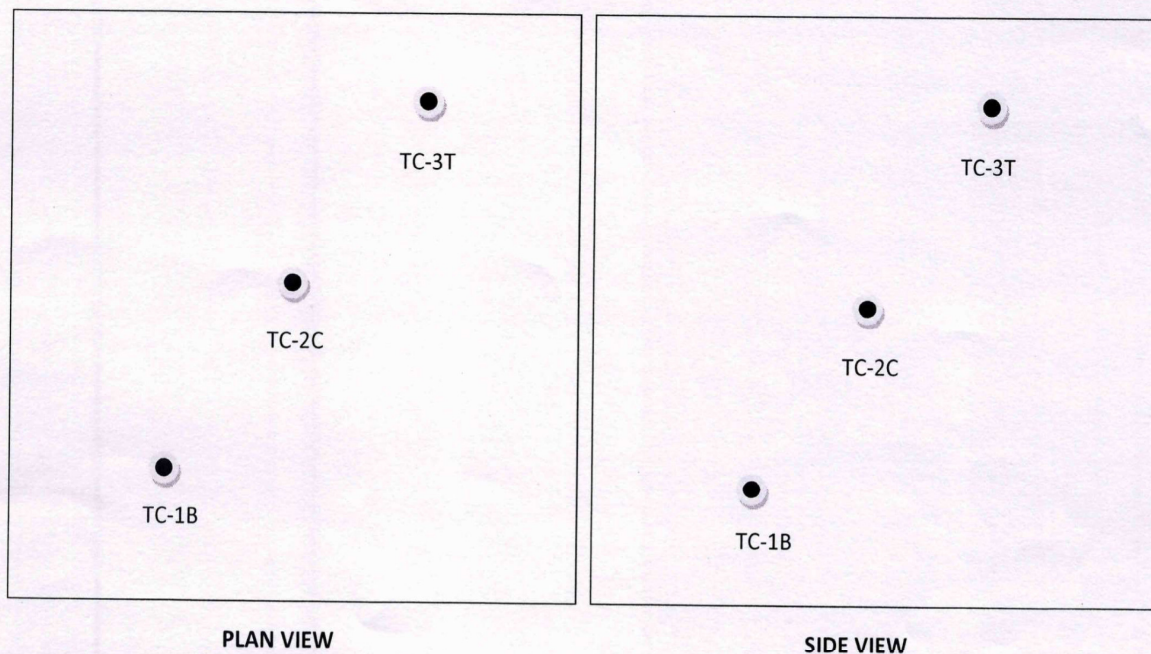


Note: L-low position, H-high position of Thermocouples

Fig.A

2. For the Rectangular type furnaces listed below the thermocouple locations shall be as per Fig.B

S.N	Furnace No	Furnace Name	Location	Furnace Working Zone
1	1615-0224	THERELEK ELECTRICAL FURNACE	Bldg-6 / Bay-0	L x B x H =1.1mx0.45mx0.55m=0.272m ³

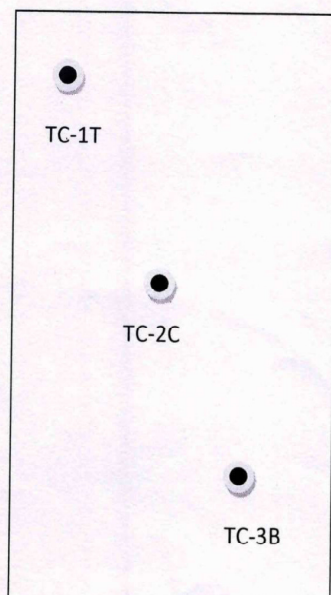


Note : T-Top, C-Centre, B-Bottom position of Thermocouples

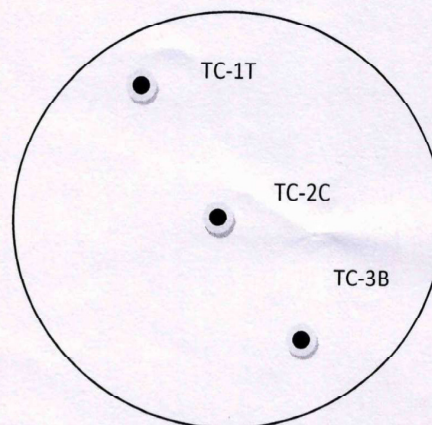
Fig.B

3. For the Cylindrical type furnace listed below the thermocouple locations shall be as per Fig.C

S.N	Furnace No	Furnace Name	Location	Furnace Working Zone
1	1743-1838	PRECON PIT FURNACE	Bldg-63	Dia - 0.6m x Height – 0.8m, Volume=0.22m ³
2	1735-2634	TEMPERING FURNACE	Bldg-63	Dia- 0.6m x Height – 0.8m,Volume=0.22m ³
3	1743-2644	PIT TYPE FURNACE	Bldg-63	Dia - 0.6m x Height - 1m, Volume=0.28m ³



SIDE VIEW



TOP VIEW

Note : T-Top, C-Centre, B-Bottom position of Thermocouples

Fig.C

Basic detail of 36kW Electric Furnace: -

Si. No.	Particulars of Items
1	Calibration of Electric Furnace: Power Rating/Wattage: 36 kW Make: Therelek Furnaces Private Limited, Thane Furnace: Machine Sl. No. 132 / Equipment ID-16171300 Type: Annealing Muffle Furnace Working Zone Dimension: 72cm x 61cm x 67cm Working Zone Volume: 0.29 cubic meter Soaking Temperature: (03-Ranges) • 615± 8 Degree Celsius, • 690 ± 8 Degree Celsius, • 760 ± 8 Degree Celsius Allowed Tolerance- ± 8 Degree Celsius Soaking Time Period- 30 minutes Certification Type: NABL accepted by NPCIL Reference Standard- as per API 6A Operating Temperature Range- 500 to 780 degree Celsius

Furnace Qualification procedure-BHEL IVP Goindwal

1. Scope: -

This procedure details out the method for conducting temperature uniformity survey to qualify the furnaces which are used for heat treatment process like stress relieving, normalizing, annealing, tempering etc.

The purpose of qualification is to ensure uniform temperature distribution inside the furnace during the soaking period.

2. PRE-REQUISITE: -

2.2.1 For those furnaces in which the job temperature is being measured & recorded during regular usage; then for temperature uniformity survey, the thermocouples shall be placed in the outer extremities, center portion of the working zone and in all the suspected locations.

2.2.2 For those furnaces which are used for heat treatment of products falling under API specification then;

2.2.2.1 For furnaces having working zone less than 0.3m³, a minimum of three thermocouples located at either at the front, centre and rear, or at the top, centre and bottom of the furnace working zone.

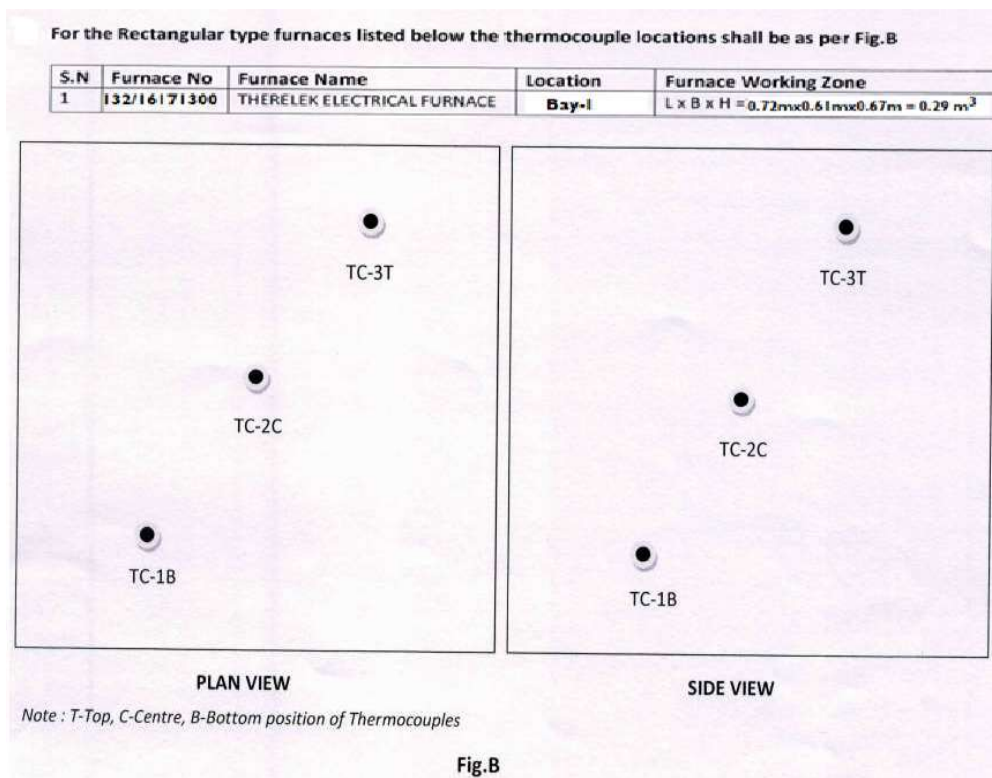
2.2.2.2 For furnaces having working zone greater than 0.3m³, a minimum of nine shall be used. For each 3.5m³ of the furnace working zone surveyed, at least one thermocouple shall be used, up to a maximum of 40 thermocouples.

2.2.2.3 The thermocouple location diagram for qualification of furnace shall be as mentioned in Fig-B below.

2.3 The thermocouples, temperature controllers & temperature recorders used for furnace qualification are to be ensured to have valid calibration.

2.3.1 Field Instruments (thermocouples, temperature controllers & temperature recorders) used for furnace qualification with respect to API requirement will be calibrated once in 3 months with reference to master instrument having accuracy ± 0.25 % of full-scale range.

2.4 Temperature setting: Wherever different heat treatment cycles are to be performed on the batch type furnaces and if the operating range does not exceed a spread of 150°C, the midpoint temperature will be selected for furnace qualification. If the furnace operating range exceeds a spread of 150°C the qualification will be done on the lowest and highest heat treatment cycles.

Thermocouple location diagram: -

The thermocouples, temperature controllers & temperature recorders used for furnace qualification are to be ensured to have valid NABL calibration.

3. PROCEDURE FOR TEMPERATURE UNIFORMITY TEST: -

Batch Type Furnace: -

3.1.1 The furnace shall be started and allowed to reach the set point temperature (i.e. Soaking Temperature) with the specified Rate of heating.

3.1.2 When the thermocouple readings raises to within 100°C of the soaking temperature the thermocouple readings shall be recorded with an interval of 5 minutes till all the thermocouples reaches soaking temperature. From start of soaking temperature the thermocouple readings shall be recorded at an interval of 2 minutes for the first 10 minutes duration, after that the thermocouple readings shall be recorded with an interval of 5 minutes till the end of soaking period.

3.1.3 The soaking temperature of the furnace shall be maintained for a minimum period of 30 minutes.

3.1.4 Where more than one operating temperature ranges are to be qualified, the qualification procedure shall be repeated as per clause 3.1.1 to 3.1.3, 3.1.5 The

temperature chart shall be verified and the difference between maximum and minimum temperature during soaking and total time of the soaking period are to be marked in the temperature chart.

4. ACCEPTANCE NORMS

- This exercise qualifies the furnace, if the difference between the maximum & minimum temperature of all the thermocouple readings during soaking period does not exceed the temperature tolerance stated as below;
 1. $\pm 8^{\circ}\text{C}$ for furnaces intended for Heat Treatment of products falling under API specification.
 2. $\pm 15^{\circ}\text{C}$ for all other furnaces
- The furnace qualification is valid for one year. A re-qualification shall be carried out whenever any major overhauling of furnace is done.

5. RECORDS

5.1 The records of qualification shall include the following:

1. Furnace identity/work center number
2. Location
3. Furnace working zone dimensions
4. Operating ranges
5. Permissible error
6. Date of Qualification
7. Qualification results
8. Location of thermocouples layout
9. Variation in temperature ranges (calculated from chart)
10. Limitation of use
11. Recorder chart

6. REFERENCES

1. API Specification 6A/Annex M
2. ASTM A991/A991M-10



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GENERAL CONDITIONS OF CONTRACT (GCC)

- 1) **DEFINITION:** - In these General Conditions of Contract, the following terms shall have the meaning hereby assigned to them, except where the context otherwise requires: -
 - a) **"Contract"** means, the documents forming the Tender and acceptance thereof, together with all the documents referred to therein including general and special conditions to Contract. All these documents as applicable taken together shall be deemed to form one Contract and shall be complementary to one another. **"Work"** means, the work described in the Tender documents in individual work-orders as may be issued from time to time to the Contractor by the Officer-In-charge within the power conferred upon him including all notified or additional items of works and obligations to be carried out as required for the performance of Contract.
 - b) **"Contractor"** means, the individual Firm or Company whether incorporated or not, undertaking the work and shall include the legal personal representatives of such individuals or the persons composing the firm or Company or the successors of the firm or company and the permitted assigns of such individual or firm or Company.
 - c) **"Officer-In charge"** means, the Officer deputed by BHEL, IVP Goindwal, to supervise the work or part of the work.
 - d) **"Approved" and "Directed"** means, the approval or direction of BHEL, IVP Goindwal official, or person deputed by him for the particular purposes.
 - e) **"BHARAT HEAVY ELECTRICALS LIMITED" (herein after referred to as BHEL)** shall mean the Board of Directors, Chairman, Executive Director, General Manager or other Administrative Officer of the said Company authorized to invite Tenders and enter into Contract for works on behalf of the Company.
 - f) **"Contract sum"** means, the sum accepted or the sum calculated in accordance with the prices accepted in Tender and / or the Contract rates as payable to the Contractor for the execution of the work during the currency of the Contract.
 - g) **"Week"** means, Seven Days, without regard to the number of hours worked or not worked in any day in that week. **"Day"** means, the day of 24 hours (TWENTY-FOUR) irrespective of the number of hours worked or not worked in that day.
 - h) **"Working day"** means, any day other than that prescribed by the NEGOTIABLE INSTRUMENTS ACT as being a Holiday, and consists of the number of hours of labor as commonly recognized by good employers in the trade in the district where the work is carried out or as laid down in the BHEL regulations.
- 2) BHEL reserves the right to negotiate with L1 bidder/s.
- 3) Should a Tenderer or a Contractor has a dependent/relative or in the case of a partnership firm, any of its partners or dependents of partners employed in BHEL, the authority inviting Tenders should be informed of this fact at the time of submission of the Tender failing which Tender may be disqualified or if such fact subsequently come to light, the Contract may be cancelled.
- 4) No BHEL employee and their dependents are eligible to submit their offer against this Tender.
- 5) **HEADING TO THE CONTRACT CONDITIONS:** - The heading to these conditions shall not affect the interpretations thereof.
- 6) **DEVIATIONS:** - The Contractor shall not carry out any work not covered by schedule except in pursuance of the written instructions of BHEL, IVP Goindwal official, no such work shall be valid unless the same has been specifically confirmed and accepted by BHEL in writing and incorporated in the Contract.
- 7) **ASSIGNMENT OF TRANSFER OF CONTRACT:** - The Contractor shall not without the prior written approval of the BHEL, assign or transfer the Contract or any part thereof, or any share, or interest thereon to any other persons. No sum of money which may become payable under the Contract shall be payable to any person, other than the Contractor unless the prior written approval of the BHEL to the assignment or transfer of such money is given.
- 8) **SUB-CONTRACT:** - The Contractor shall not sub-let any portion of the Contract without the prior written approval of the BHEL.
- 9) **EARNEST MONEY DEPOSIT (EMD):**



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- a) Tender must be accompanied by Earnest Money for the amount mentioned in tender notice, pledged to BHEL, IVP Goindwal in any of the forms mentioned below.
- b) **Modes of Deposit** - The EMD shall be accepted only in the following forms:
 - i) Cash deposit as permissible under the extant Income Tax Act (before tender opening)
 - ii) Electronic Fund Transfer credited in BHEL account (before tender opening)
 - iii) Banker's Cheque/ Pay order/ Demand draft, in favor of BHEL (along with offer)
 - iv) Fixed Deposit Receipt (FDR) issued by Scheduled Banks / Public financial institutions as defined in the Companies Act (FDR should be in the name of the contractor, a/c BHEL)
- c) In addition to above, the EMD amount in excess of Rs. Two lakh may also be accepted in the form of Bank Guarantee from scheduled bank. The Bank Guarantee in such cases shall be valid for at least six months.
- d) **Forfeiture of EMD:**
 - i) EMD by the tenderer will be forfeited as per tender documents if
 - ii) After opening the Tender, the Tenderer revokes his Tender within the validity period or increase his earlier quoted rates.
 - iii) If only, a part of the work included in the tender has been awarded to the tenderer and the tenderer refuses to take up the work the amount of Earnest Money to be forfeited will be based on the value of the contract so awarded.
 - iv) The Tenderer does not commence the work within the period as per LOI / Contract. In case the LOI / Contract is silent in this regard then within 15 days after award of Contract.
- e) **General Terms related to EMD:**
 - i) Earnest Money Deposit (EMD) will not carry any interest.
 - ii) Earnest Money Deposit (EMD) of the successful tenderer will be retained as part of Security deposit.
 - iii) The Earnest Money Deposit (EMD) will be refunded to the unsuccessful tenderers within 15 days of acceptance of the award of work by successful tenderer / expiry of offer validity period.

10) SECURITY DEPOSIT (SD):

- a) The total amount of Security Deposit will be 5% of the contract value. EMD of the successful tenderers shall be converted and adjusted towards the required amount of Security Deposit.
- b) At least 50% of the required Security Deposit (Including EMD amount) will be collected before start of the work. Balance of the Security Deposit will be collected by deducting 10% of the gross amount progressively from each of the running bills of the Contractor till the total amount of the required Security Deposit is collected.
- c) EMD of the successful tenderers shall be converted and adjusted towards the required amount of Security deposit:
- d) **Modes of Deposit:**
 - i) The balance amount to make up the required Security Deposit of 5% of the contract value may be accepted in the following forms:
 - ii) Cash (as permissible under the extant Income Tax Act)
 - iii) Local Cheque of Scheduled Banks (subject to realization)/ Pay Order/ Demand Draft/ Electronic Fund Transfer in favor of BHEL
 - iv) Bank Guarantee from Scheduled Banks/ Public Financial Institutions as defined in the Companies Act. The Bank Guarantee format should have the approval of BHEL
 - v) Fixed Deposit Receipt issued by Scheduled Banks/ Public Financial Institutions as defined in the Companies Act (FDR should be in the name of the Contractor, a/c BHEL)



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- vi) Securities available from Indian Post offices such as National Savings Certificates, Kisan Vikas Patras etc. (held in the name of Contractor furnishing the security and duly endorsed/ hypothecated/ pledged, as applicable, in favor of BHEL)
- e) **General Terms related to SD:**
 - i) The security Deposit will not carry any interest.
 - ii) Security Deposit shall be released to the contractor upon fulfilment of Contractual obligations as per terms of contract. BHEL, shall not be responsible for any loss of securities due to liquidation or any other reason whatsoever or any depreciation in the value of the Securities while in their charge or for any loss of interest thereon.
 - iii) NOTE: Acceptance of Security Deposit against Sl. No. (iii), (iv) and (v) above will be subject to hypothecation or endorsement on the documents (Signature of the Branch Manager must be present) in favor of BHEL. However, BHEL will not be liable or responsible in any manner for the collection of interest or renewal of the documents or in any other matter connected therewith.
 - iv) All compensation or other sums of money payable by the contractor to BHEL under the terms of this contract or under any other contract with BHEL, may be deducted from the Security Deposit or realized by the sale of the securities or from the interest arising therefrom or from any sums which may be due or may become due to the contractor payable by BHEL, on any account whatsoever against this contract or any other contract with BHEL and in the event of his Security Deposit being reduced by reason of such deductions or sale as aforesaid, the Contractor shall within seven days thereafter make good in cash or in securities endorsed as aforesaid, any sum or sums by which the security Deposit has been so reduced.
 - v) In case of an Award of a Contract and if the Contractor fails to perform or does not comply with the Performance Evaluation Criteria, the Security Deposit will not be refunded / Bank Guarantee encashed.

11) TENDER EVALUATION CRITERIA

- a) Tender evaluation shall be carried out on the basis of technical specifications and commercial terms & conditions specified in the tender documents and changes thereof, if any, shall be communicated to all the bidders before price bid opening.
- b) Cost evaluation shall be on the basis of delivered cost (i.e. "total cost to BHEL").
- c) In case prices comes out be same for two or more vendors, ranking (L1, L2...) tie shall be broken based on date time of receipt of bid, if there is still a tie revised bids in sealed covers may be invited from tied bidders with specified limits on prices as per context.

12) COMPLIANCE TO STATUTORY PROVISIONS AND RULES:

- a) The Contractor shall confirm to the provisions of any statute relating to the work and regulations and Bye-Laws of any local authority. The Contractor shall be bound to give all notices required by statute regulations or By-Laws as aforesaid and to pay all fees and taxes payable to any authority in respect thereof.
- b) The Contractor shall in respect of Personnel employed by him either directly or through sub-Contractors, comply with or cause to be complied with all statutory provisions and rules as per applicable laws specifically labor laws such as PF, ESI, Minimum wages Act.
- c) Bids are liable to be rejected if bid prices comes out be lower than minimum prices calculated for the workforce deployment as per above laws.

13) PAYMENT TERMS: -

- a) Payment shall be due after 30 days of completion of work and shall be paid within next 15 days' subject to fulfillment of all terms and conditions and receipt of proper invoices.
- b) 100% payment will be made after satisfactory completion of work and receipt of GST Invoice complete in all respect along with supporting documents as per following details:
 - i) GST Compliant Invoices Verified by BHEL Engineer
 - ii) Test-Certificates, Warranty Certificates as required by contract.
 - iii) Any other relevant document which is required from time to time as per BHEL requirement.



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- c) All payments shall be made through NEFT (National Electronic Fund Transfer / RTGS (Real Time Gross Settlement)). Necessary details shall be furnished by bidder in BHEL format.
- d) Conditions relating to release of GST portion:
Payment of GST portion will be released to vendor only upon completion of statutory requirement and further subject to following:
 - i) vendor declaring such invoice in his GSTR-1 and
 - ii) receipt of goods and Tax invoice by BHEL and
 - iii) Confirmation of payment of GST thereon by vendor on GSTN portal.
 - iv) Above is subject to receipt of goods/service and tax invoice thereof along with vendor declaring invoice in his return and paying GST within timeline prescribed for availing ITC by BHEL.
 - In case GST credit is delayed/denied to BHEL due to non/delayed receipt of goods and/or tax invoice or expiry of timeline prescribed in GST law for availing such ITC, or any other reasons not attributable to BHEL, GST amount shall be recoverable from vendor along with interest levied / leviable on BHEL.
 - In case vendor delays declaring such invoice in his return and GST credit availed by BHEL is denied or reversed subsequently as per GST law, GST amount paid by BHEL towards such ITC reversal as per GST law shall be recoverable from vendor/contractor along with interest levied / leviable on BHEL.

14) INCOME TAX: -

- a) Income Tax shall be deducted at the applicable rate in respect of the service Contract including supply of labor for any work as follows:
- b) Xerox copy of PAN card shall be submitted to Account Dept. along with original for verification.
- c) TDS Certificate will be issued to vendors for each quarter ending as on 30th June, 30th Sept, 31st Dec and 31st Mar during the following quarter.

15) SAFETY CONDITIONS & GUIDELINES

- a) **The Factories Act, 1948:**
 - i) **Section 32:** Floors, stairs and means of access shall be properly maintained to ensure safety. Every place of working should have safe access. When any person has to work at a height from which he is likely to fall, provision shall be made, so far as is reasonably practicable, by fencing or otherwise, to ensure the safety of person so working.
- b) All safety procedures and guidelines as established by applicable laws and framed by BHEL shall mandatorily be followed by all personnel of contractor at BHEL IVP Goindwal.
- c) All PPE/safety equipment etc. shall be provided by contractor to its personnel

16) NOTICES OF ACCIDENTS

- a) In the event of an accident the Contractor shall be required to fill injury report and submit to the Engineer-in-charge immediately and ensure compliance of ESI / Workmen's Compensation of accident as per the Act.
- b) The Contractor shall get the Contract personnel engaged by him insured under workmen's compensation policy from any Insurance company in India before actually starting the work. The Insurance Coverage should be for the entire period of Contract. The Contractor shall comply with the provisions of the Workmen's Compensation Act 1923. (This should be read in connection with the provisions of ESI Act.)

17) RISK PURCHASE

- a) In the event of any successful Tenderer's failure to fulfil any of the Tender / Contract obligations as per Contract / Agreement BHEL may entrust the job to alternate source and get it completed to meet BHEL requirement and additional expenditure, if any, including consequential cost viz., demurrage etc., will be fully recovered from the Tenderer Contractor who failed to complete the job in line with Contract.
- b) The decision of BHEL with regard to the actual losses / consequential expenditures incurred by BHEL shall be final and binding on the Tenderer / Contractor.
- c) The value under Risk purchase clause shall be calculated as follows:
$$\text{Risk \& Cost Amount} = [(A-B) + (A \times H/100)]$$

Where, A= Value of Balance scope of Work/ Supply (*) as per rates of new contract



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B= Value of Balance scope of Work/ Supply (*) as per rates of old contract being paid to the contractor/ supplier at the time of termination of contract i.e. inclusive of PVC & ORC, if any.

H = Overhead Factor shall be taken as 5

In case (A-B) is less than 0 (zero), value of (A-B) shall be taken as 0 (zero).

*(Balance scope of work/ supply) Difference of Tendered/Contract Quantities and Executed Quantities as on the date of issue of Letter for 'Termination of PO/Contract', shall be taken as balance scope of Supply for calculating risk & cost amount.

18) LIQUIDATED DAMAGES (LD) / PENALTY:

- a) If the contractor fails to complete the service/work as per terms & conditions of the order within the delivery schedule, a) LD shall be levied @ 0.5 % of the order value per week of delay or part thereof subject to a maximum of 10% of the full order value.
- b) In case of any change to the order value, the LD shall be @ 0.5 % of the revised order value per week of delay or part thereof subject to a maximum of 10% of the revised order value.

19) INDEMNITY:

- a) The Contractor shall have to indemnify BHEL against all claims for injury or damage to any person or property caused by his negligence or negligence of his employees whilst in BHEL premises / sites.
- b) The Contractor shall indemnify the company against all payments by way of compensation or otherwise which the company may be called upon to make under the provisions of the applicable Acts to any Contract employee as aforesaid, and any cost incurred by the company in connection with any claim preferred by such Contract employee and or against all actions, claims and demands whatsoever in respect thereof or in respect of any loss, injury or damages whatsoever to any third person arising out of or occasioned by the negligent, imperfect or improper performance of this Contract by the Contractor, their employee servants or agents.
- c) The Contractor approved and operating under the Tender, Works Contracts shall further indemnify BHEL against:
 - i) Observance of Labor & Industrial Laws.
 - ii) All claims by way of compensation and all other types of unforeseen claims, which may arise in the course of Contract.
 - iii) Documentary compliance relating to billing.

20) RIGHTS

- a) BHEL may enter into parallel Contract simultaneously with any number of Contractor as may be deemed fit at any time during the period of Contract in the Interest of the work for any or all the stations and for any or all the schedules.
- b) In case of breach of any of the terms and conditions of the Contract, BHEL will entrust the work to any other Contractor at the risk and cost of the Contract and the Contractor shall be liable to pay the extra expenditure, damages, loss suffered on account of the cancellation of the Contract.
- c) All amounts including the losses / damages / penalties / compensations etc., resulting from non-compliance with the terms of Contract, payable by the Contractor to BHEL under the Terms of the Contract will be recovered from the outstanding payments to Contractor either under this Contract or any other Contracts or from Security Deposit or from both. In case this amount is insufficient for such recoveries, the Contractor shall make good the balance amount by actual payment. In addition, BHEL, IVP Goindwal will recover the said amounts through its sister concerns, from the payments due to the Contractor in any of the units of BHEL located in any part of India.
- d) The Contractor is not allowed to pass the responsibilities connected with the Contract to other agencies / Contractors, the Contractors shall not sublet or transfer the Contract or any part thereof, which tantamount to termination of the Contract and thereby attracting the penalty or forfeiture of security deposit.
- e) The Contractor shall have no right to demand at any time during the currency of this Contract any minimum quantity of Work for this Contract.



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- 21) PRECAUTIONS AGAINST RISK:** The Contractor shall be responsible for providing at his own expense for all precautions to prevent loss or damage from any and all risks and to minimize the amount of any such loss or damage and for the necessary steps to be taken for the said purpose.
- 22) DAMAGE & LOSS TO PRIVATE PROPERTY & INJURY TO CONTRACT EMPLOYEE:** The Contractor shall at his own expense reinstate and make good to the satisfaction of BHEL and pay compensation for any injury, loss or damage occurred to any property or rights whatever including property and rights of BHEL (or agents) servants or employee of BHEL, the injury loss or damage arising out of or in any way in connection with the execution or purported execution of the Contract and further the Contractor shall indemnify, the BHEL against all claims enforceable against BHEL (or any agent, servant or employee of BHEL) or which would be so enforceable against BHEL where BHEL is a private person, in respect of any such injury (including injury resulting in death) loss or damage to any person whomsoever or property including all claims which may arise under the Workmen's Compensation Act or otherwise.
- 23) LAWS GOVERNING THE CONTRACT:** The Contract shall be governed by the Indian Laws for time being in force.
- 24) PUBLIC PROCUREMENT POLICY:** For this procurement, Public Procurement (Preference to Make in India), Order 2017 dated 15.06.2017 & 28.05.2018 and subsequent Orders issued by the respective Nodal Ministry shall be applicable even if issued after issue of this NIT but before finalization of contract/PO/WO against this NIT.
- 25) CANCELLATION OF CONTRACT FOR CORRUPT ACTS: -**
- a) BHEL, whose decision shall be final and conclusive, shall without prejudice to any other right or remedy which shall have accrued shall accrue thereafter to BHEL cancel the Contract in any of the following cases and the Contractor shall be liable to make payment to BHEL for any loss or damage resulting from any such cancellation to the same extent as provided in the case of cancellation for default.
 - b) If the Contractor shall: -
 - c) Offer or give or agree to give to any person in BHEL service any gift or consideration of any kind, as an inducement or reward for doing or for bearing to do or for having done or for borne to do any act, in relation to the obtaining or execution of this or any other Contract for BHEL service, OR
 - d) Enter in to a Contract with BHEL in connection with which commission has been paid or agreed to be paid by him or with his knowledge, unless the particulars of any such commission and the terms of payment thereof have previously been disclosed in writing to BHEL. OR
 - e) Obtain a Contract with BHEL as a result of ring Tendering or by non-bonafide methods of competitive Tendering, without first disclosing the fact in writing to BHEL.
- 26) CANCELLATION OF CONTRACT FOR INSOLVENCY ASSIGNMENT OF TRANSFER OR SUB-LETTING OF CONTRACT: -**
- a) BHEL, without prejudice to any other right or remedy which shall have accrued or shall accrue thereafter to BHEL shall cancel the Contract in any of the following cases:
 - b) If the Contractor, being an individual or if a firm any partner thereof shall at any time be adjudged bankrupt or have a receiving order for administration of his estate, made against him or shall take any proceedings for liquidation or composition under any bankruptcy Act or assignment of his effects of composition or arrangement for the benefit of his creditors or purport to do so, or if any application made under any:
 - c) Bankruptcy Act for the time being in force for the sequestration of his estate or if a trust deed be granted by him on behalf of his creditors OR
 - d) being a Company, shall pass a resolution or the Court shall make an order for the liquidation of its affairs, or a receiver or Manager on-behalf of the debenture holders shall be appointed or circumstances shall arise which entitle the Court or debenture holders to appoint a receiver or Manager, OR



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- e) Assigns, Transfers, Sub-lets or attempts to assign, transfer or sub-let any portion of the work without the prior written approval of the BHEL.
- f) Whenever BHEL exercise the authority to cancel the Contract under this conditions, BHEL may have the work done by any means at the Contractor's risks and expenses provided always that in the event of the cost of the work so done (as certified by BHEL, IVP Goindwal which is final and conclusive) being less than the Contract cost, the advantage shall accrue to the BHEL and if the cost exceeds the money due to Contractor under the Contract, the Contractor shall either pay the excess amount ordered by BHEL, IVP Goindwal, or the same shall be recovered from the Contractor by other means.
- g) In case the BHEL carries-out the work under the provisions of this condition the cost to be taken into account in determining the excess cost to be charged to the Contractor under this condition shall consist of the cost of the materials, hire charges of tools and plants and/or labor provided by the BHEL with an addition of such percentage to cover superintendence and establishment charges as may be decided by the BHEL, IVP Goindwal, whose decision shall be final and conclusive.

27) CANCELLATION OF CONTRACT IN PART OR FULL FOR CONTRACATOR'S DEFAULT:

If the Contractor:

- a) makes default in carrying out the work as directed and continues in that state after a reasonable notice from BHEL, IVP Goindwal, or his authorized representative;
- b) fails to comply with any of the Terms and Conditions of the Contract or after reasonable notice in writing with orders properly issued there under;
- c) BHEL, may without prejudice to any other right or remedy which shall have accrued or shall accrue thereafter to BHEL CANCEL the Contract as whole or in part thereof or only such work order or items of work in default from the Contract. Whenever BHEL exercise the authority to cancel the Contract as whole or part under this condition BHEL may complete the work at the Contractor's risk and cost (as certified by BHEL, IVP Goindwal official, which is final and conclusive) being less than the Contract cost, the advantage shall accrue to the BHEL. If the cost exceeds the moneys due to the Contractor under this Contract the Contractor shall either pay the excess amount ordered by BHEL, IVP Goindwal or the same shall be recovered from the Contractor by other means. In case the BHEL carries out the work or any part thereof under the provisions of the conditions the cost to be taken into account in determining the excess cost to be charged to the Contractor under this condition shall consist of the cost of the materials, hire charges of tools and plant and/or labor provided by the BHEL with an addition of such percentage to cover the superintendence and establishment charges as may be decided by the BHEL, IVP Goindwal, whose decision shall be final and conclusive.

28) TERMINATION OF CONTRACT ON DEATH OF CONTRACTOR: Without prejudice to any of the rights or remedies under this Contract, if the Contractor dies, or if the firm is dissolved or the company is liquidated BHEL shall have the option of terminating the Contract without compensation to the Contractor.

29) SPECIAL POWER TO TERMINATION: If at any time after the award of Contract, BHEL shall for any reason whatsoever not require whole or any part of the work to be carried out the BHEL, IVP Goindwal, shall give notice in writing of the fact to the Contractor who shall have no claim to any payment of compensation or otherwise howsoever on account of any profit or advantage which he might have derived from the execution of the work in full but which he did not derive in consequence of the fore-closing of the work.

30) RECOVERY FROM CONTRACTOR: Whenever under the Contract, any sum of money, shall be recoverable from or payable by the Contractors, the same may be deducted from or any sum. then due or which at any time thereafter may become due to Contractor under the Contract or under any other Contract with BHEL or from his Security Deposit or he shall pay the claim on demand.



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- 31) POST TECHNICAL AUDIT OF WORK AND BILLS:** BHEL reserves the right to carry out the post-payment Audit and technical examination of the work and final bill including all supporting vouchers, abstracts etc., and enforce recovery of any sum becoming due as a result thereof in the manner provided in the presiding sub-paragraphs. However, no such recovery shall be enforced after three years of passing the final bill.
- 32) PREFERENCES FOR MSE's & Start –ups :**
- a) Preferences as mentioned in “Public Procurement Policy for Micro and Small Enterprises (MSEs) Order, 2012” shall be given to Micro and Small enterprises.
 - b) Main points which are mentioned in the above order as applicable to this tender are as follows:
 - i) EMD shall be exempted for MSE's. All these benefits are subject to production of all statutory documents
 - c) *“MSE suppliers can avail the intended benefits only if they submit along with the offer, attested copies of either EM II certificate having deemed validity (five years from the date of issue of acknowledgement in EM II) or valid NSIC certificate or EM II certificate along with attested copy of a CA certificate (Format enclosed at Annexure -1 where deemed validity of EM II certificate of five years has expired) applicable for the relevant financial year (latest audited). Date to be reckoned for determining the deemed validity will be the date of bid opening (Part 1 in case of two part bid). Non submission of such documents will lead to consideration of their bid at par with other bidders. No benefit shall be applicable for this enquiry if any deficiency in the above required documents is not submitted before price bid opening. If the tender is to be submitted through e-procurement portal, then the above required documents are to be uploaded on the portal. Documents should be notarized or attested by a Gazetted officer.”*
 - d) This EMD Exemption and any other benefit is not applicable for “Work Contracts”. Type of Contract is mentioned in NIT.
 - e) The Pre-Qualification terms (if any) shall not be applicable to Start-Up Firms. These relaxations and exemptions are in line with D.O. No. 5(4)/2016-BE-I dated 15.02.2017 & Office Memorandum issued by DPE vide F. No. DPE/7(04)/2007-Fin dated 24.08.2017 forwarding the clarification issued by Department of Expenditure, Ministry of Finance vide No. F.20-2/2014-PPD(Pt.) dated 27.07.2017 and DO letter vide D.O. No. 12(11)/2017-SI by Secretary DIPP, Ministry of Commerce and Industry. For claiming Start-Up exemption, vendors have to give documentary evidence or undertaking. For Claiming MSE benefits, vendor have to give documentary evidence like NSIC, UAN, etc.
- 33) SUB-CONTRACT:** The purchase order or any part thereof shall not be sub-contracted, assigned or otherwise transferred without previously obtaining the BHEL's consent in writing.
- 34) FORCE MAJEURE:** If at any time during the continuance of the contract, the performance in which or in any part by either party of any obligations under the contract are prevented or delayed by reason of any war, hostilities, acts of public enemy, civil commotion, sabotage, fires, explosions, epidemics, quarantine restrictions, or acts of God (hereinafter referred to “an events” then provided the notice of happening of any such event is given by either party to the other within 21 days of the occurrence thereof, neither party shall by reason of such event be entitled to terminate the contract nor shall either party have any claim for damages against the other in respect of such non-performance and delay in performance and delivery under the contract shall be resumed as soon as practicable after such event has come to an end or ceased to exist. If the performance in whole or part of any obligation under the contract is prevented or delayed by reason of any such event, claims of extension of time shall be granted for periods considered reasonable by BHEL subject to prior notification by the vendor to BHEL of the particulars of the event and supply to BHEL, if required, of any supporting evidence. Any waiver of time in respect of partial installment shall not be deemed a waiver of time in respect of remaining deliveries.
- 35) DISPUTES:** In the event of any dispute and/or difference arising between the Vendor and BHEL as to interpretation and/or execution of the contract and/or the respective rights and liabilities of the parties, such disputes and/or differences shall be referred to the sole arbitrator nominated by BHEL. The



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provisions of the Indian Arbitration Act and the rules there under shall apply to such arbitration. The award passed by the arbitrator shall be final and conclusively binding on all the parties.

- 36) JURISDICTION:** The court of the place from where the work order is issued during the contractual period shall alone have jurisdiction to decide any dispute arising out of or in connection with the purchase order.
- 37) CLARIFICATIONS:** The correspondence exchanged against the tender from both tenderer and BHEL through email/e-procurement are considered as valid document legally though it is not signed. It is treated as valid confirmations made on behalf of the respective company and very much comes under the legal ambit of the business transaction and hence it is binding on both the parties to the business. Any transaction pertaining to the tender from both the parties of business done round the clock irrespective of the office or business hours of the companies, are valid legally and binding on both the parties. This applies to the extent only in such cases where deadline time for transaction is not specifically declared by either or both the parties to the business.
- 38) BANNED FIRMS:** The offers of the bidders who are on the banned list as also the offer of the bidders, who engage in the services of the banned firms, shall be rejected. The list of banned firms is available on BHEL website www.bhel.com.
- 39) DISCLAIMER CLAUSE (Only for E procurement):** Neither the Organization (Bharat Heavy Electricals Ltd.) nor the service provider (Mjunction Services Ltd.) is responsible for any failure of submission of bids due to failure of internet or other connectivity problems or reasons thereof.
- 40) FRAUD PREVENTION POLICY:** The Bidder along with its associate / collaborators / sub-contractors / sub-vendors / consultants / service providers shall strictly adhere to BHEL Fraud Prevention Policy displayed on BHEL website <http://www.bhel.com> and shall immediately bring to the notice of BHEL management about any fraud or suspected fraud as soon as it comes to their notice.
- 41) REVERSE AUCTION**
- BHEL reserves the right to go for Reverse Auction (RA) (Guidelines as available on www.bhel.com) instead of opening the sealed envelope price bid, submitted by the bidder. This will be decided after techno-commercial evaluation. Bidders to give their acceptance with the offer for participation in RA. Non-acceptance to participate in RA may result in non-consideration of their bids, in case BHEL decides to go for RA.
 - Those bidders who have given their acceptance to participate in Reverse Auction will have to necessarily submit 'Process compliance form' (to the designated service provider) as well as 'Online sealed bid' in the Reverse Auction. Non-submission of 'Process compliance form' or 'Online sealed bid' by the agreed bidder(s) will be considered as tampering of the tender process and will invite action by BHEL as per extant guidelines for suspension of business dealings with suppliers/ contractors (as available on www.bhel.com).
 - The bidders have to necessarily submit online sealed bid less than or equal to their envelope sealed price bid already submitted to BHEL along with the offer. The envelope sealed price bid of successful L1 bidder in RA, if conducted, shall also be opened after RA and the order will be placed on lower of the two bids (RA closing price & envelope sealed price) thus obtained. The bidder having submitted this offer specifically agrees to this condition and undertakes to execute the contract on thus awarded rates.
 - If it is found that L1 bidder has quoted higher in online sealed bid in comparison to envelope sealed bid for any item(s), the bidder will be issued a warning letter to this effect. However, if the same bidder again defaults on this count in any subsequent tender in the unit, it will be considered as fraud and will invite action by BHEL as per extant guidelines for suspension of business dealings with suppliers/ contractors (as available on www.bhel.com).

42) EVALUATION IN CASE OF MORE THAN ONE L-1 BIDDER



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In the course of evaluation, if more than one bidder happens to occupy L1 status, effective L1 will be decided by soliciting discounts from the respective L1 bidders.

In case more than one bidder happens to occupy the L1 status even after soliciting discounts, the L1 bidder shall be decided by a toss / draw of lots, in the presence of the respective L1 bidder(s) or their representative(s).

Ranking will be done accordingly. BHEL's decision in such situations shall be final and binding

43) PREFERENCE TO MAKE IN INDIA: For this procurement, the local content to categorize a supplier as a Class-I local supplier / Class-II local supplier / Non-local supplier and purchase preference to Class I local supplier, is as defined in Public Procurement (Preference to Make in India), Order 2017 dated 04.06.2020 issued by DPIT. In case of subsequent orders issued by the nodal ministry, changing the definition of local content for the items of the NIT, the same shall be applicable even if issued after issue of this NIT, but before opening of Part-II bids against this NIT.

44) SUSPENSION OF BUSINESS DEALINGS WITH DEFAULTERS

The offers of the bidders who are under suspension as also the offers of the bidders, who engage the services of the banned firms, shall be rejected. The list of banned firms is available on BHEL web site www.bhel.com.

1.0 Integrity commitment, performance of the contract and punitive action thereof:

1.1. Commitment by BHEL:

BHEL commits to take all measures necessary to prevent corruption in connection with the tender process and execution of the contract. BHEL will during the tender process treat all Bidder(s) in a transparent and fair manner, and with equity.

1.2. Commitment by Bidder/ Supplier/ Contractor:

1.2.1. The bidder/ supplier/ contractor commit to take all measures to prevent corruption and will not directly or indirectly influence any decision or benefit which he is not legally entitled to nor will act or omit in any manner which tantamount to an offence punishable under any provision of the Indian Penal Code, 1860 or any other law in force in India.

1.2.2. The bidder/ supplier/ contractor will, when presenting his bid, disclose any and all payments he has made, and is committed to or intends to make to agents, brokers or any other intermediaries in connection with the award of the contract and shall adhere to relevant guidelines issued from time to time by Govt. of India/ BHEL.

1.2.3. The bidder/ supplier/ contractor will perform/ execute the contract as per the contract terms & conditions and will not default without any reasonable cause, which causes loss of business/ money/ reputation, to BHEL.

If any bidder/ supplier/ contractor during pre-tendering/ tendering/ post tendering/ award/ execution/ post-execution stage indulges in mal-practices, cheating, bribery, fraud or and other misconduct or formation of cartel so as to influence the bidding process or influence the price or acts or omits in any manner which tantamount to an offence punishable under any provision of the Indian Penal Code, 1860 or any other law in force in India, then, action may be taken against such bidder/ supplier/ contractor as per extant guidelines of the company available on www.bhel.com and/or under applicable legal provisions



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45) RESTRICTIONS UNDER RULE 144(XI) OF THE GENERAL FINANCIAL RULES (GFRs), 2017

All provisions of Order No. F.No.6/18/2019-PPD of Department of Expenditure (DoE) shall be applicable for this tender enquiry (Order copy is available at <https://doe.gov.in/procurementpolicy-divisions>). Accordingly, any bidder from a country which shares a land border with India (except the countries to which the Govt. of India has extended lines of credit or in which the Govt. of India is engaged in development projects for which list is available at <https://www.mea.gov.in/>) will be eligible to bid in this tender only if the bidder is registered with the Competent Authority as specified in Annex I of the said Order of DoE.

Updated list of the countries to which lines of credit have been extended or in which development projects are undertaken are available on the Ministry of External affairs website (<https://www.mea.gov.in/>)

For the purpose of this order, definition of Bidder from a country which shares a land border with India shall be same as defined in the Annex III of the said order.

Registration with the competent authority as stipulated in the said order is responsibility of bidder. Bidder has to submit a certificate certifying following along with offer:

"I have read the clause regarding restrictions on procurement from a bidder of a country which shares a land border with India; I certify that bidder (... Name of Bidder) is not from such a country or, if from such a country, has been registered with the Competent Authority. I hereby certify that bidder (.....Name of bidder) fulfils all requirements in this regard and is eligible to be considered"

If the bidder is from such country which shares a land border with India evidence of valid registration by the Competent Authority shall also be attached along with offer."

46) Special terms and conditions shall supersede the GCC, if conflicting.