

Pre-Qualifying Criteria

The vendor should be a **manufacturer/trader** and should have completed supply of hardened rolls (not less than 50 HRC) to any of steel rolling mills in Central/State/Govt organisation/PSU Company/ Public Listed company.

The following documental evidences to be provided to qualify for the tender

SN	DOCUMENTAL EVIDENCE TO BE PROVIDED	Vendor's confirmation
1	For Manufacturer the required facilities at his works as per TDC requirement for carrying out the job	Submitted/Not Submitted
2	For Trader valid technical tie up with the facility owner and the required facilities as per TDC requirement for carrying out the job	Submitted/Not Submitted
3	Purchase order copy for Supply of hardened rolls (not less than 50 HRC) to any of Steel Rolling Mills in Central/State/Govt organisation/PSU Company/ Public Listed company after March 2017.	Submitted/Not Submitted
4	Supply completion proof (Delivery Challan/Tax Invoice/Payment Proof /Performance certificate) for the above Purchase order.	Submitted/Not Submitted
5	Test certificate of the hardened Rolls as per TDC Requirement from Central Govt/ State Govt/ NABL/ILAC accredited lab for the above Purchase order.	Submitted/Not Submitted

Without submission of Documental Evidence of the above, vendor offer shall be liable to rejection.

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Date: 2024.02.29 15:28:59 +05'30'

BHEL, Tiruchirapalli-620014		SSTP / Tool Engineering	Technical Delivery Conditions
Product : KR75 & KR150ROLL			
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Revision Record	01 - TDC reviewed and revised		

1.0 PRODUCT:

Sl.No.	Equipment / Product	Drg. No.	Drg. Rev. No.
1.	KR 75 Roll	20.ST.232.01.008	AS PER LATEST ENQUIRY / PURCHASE ORDER
2.	KR150 Roll	20.ST.231.01.149	

2.0 APPLICATION:

For straightening the finished tubes in cold condition.

3.0 MATERIAL:

- DIN 1.2601 – X165CrMoV12 (Rolled Steel)**
- Conduct Ultrasonic Test on Raw Material after proof machining in accordance with SA 388.
- Acceptance Standard in accordance with AM 203.2(c), ASME Sec VIII Div.2. Shall be certified by NDT Level II qualified personnel as per SNT-TC-1A (Society for Non destructive Testing)
- Chemistry** : As per drawing
Original mill test certificate shall be provided. Otherwise copy of original mill test certificate and test report from NABL accredited lab for chemical check on sample from the procured material shall be provided.

4.0 DIMENSIONS AND TOLERANCE:

As given in the drawing

5.0 HEAT TREATMENT:

Sl.No.	Process	Detail
1.	Stress Relieving	600 - 650 Deg.C ; Soaking 1 Hr. Furnace Cooling
2.	Hardening	980 - 1020 Deg.C Oil quenching
3.	Tempering	300 - 400°C

6.0 DIMENSIONAL INSPECTION:

Dimensional inspection shall be carried out by the supplier - Acceptance as per drawing.

7.0 NON DESTRUCTIVE TESTING :

1.LIQUID PENETRANT INSPECTION:

To be conducted on entire surface after finish machining as per **ASTM E165-02** and shall be certified by NDT Level II qualified personnel as per SNT-TC-1A

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8.0 MECHANICAL TESTING :

1. Hardness Test on job as per **DIN EN ISO 6508-1.** - Acceptance as per Drawing.

9.0 MARKING:

As given in the drawing.

10.0 TEST CERTIFICATE/REPORT:

Following test certificates shall be sent with materials. In all the TCs & reports BHEL PO No., component name, TDC NO. and drawing no. shall be mentioned where ever applicable: Traceability data like Heat / Melt No. & job Sl. No. shall be provided in all the reports.

1. Raw Material Chemistry (**Clause 3.0**)
2. Hardness Test (**Clause 8.0**)
3. Temperature-Time-Recorder Chart for the Heat Treatment Cycle followed
4. Ultrasonic Test Report for Raw Material (**Clause 3.0**)
5. Liquid Penetrant Test (**Clause 7.0**)
6. Dimension Report (**Clause 6.0**)

11.0 PRESERVATION & PACKING :

1. Supply with rust preventive coating which shall be dry after application and removable by common solvents.
2. Pack suitably to avoid transit & handling damages

Prepared By	Reviewed By	Approved By
 DM / TE	 DGM / QA&C	 AGM / TE