## e-Tender document

Department of Mechanical Engineering Indian Institute of Technology Kanpur Kanpur (UP) 208016 India

Enquiry date: August 03, 2018

Enquiry No: IITK/ME/AKS/2018/01

e-tenders are invited for purchase of HPC Cluster through e-procurement module of CPP Portal. The detailed specification of the cluster is described below. The e-bids should reach the undersigned by the date and time mentioned below.

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## **Terms and Conditions:**

- 1. The OEM Submitting the proposal should be in the Top 500 list since last 3 years, they should have 3 or more clusters Installed in India out of which at least one cluster should be minimum of 100 Tera Flop rating. Details of these installations must be provided.
- 2. The OEM must have min 03 HPC installations within India in the Top Indian Supercomputing sites (<a href="http://topsupercomputers-india.iisc.ernet.in/jsps/july2017/index.html">http://topsupercomputers-india.iisc.ernet.in/jsps/july2017/index.html</a>.) maintained by the IISc, Bangalore. Details of these installations must be provided.
- 3. The OEM should have direct support center in India to provide Support for critical IIT Kanpur cluster infrastructure.
- All equipment must be compatible with Indian electrical standards and codes. Engineering documentation on the physical sizes and weights of all major and minor components must be submitted.
- 5. Warranty & Support: Three years comprehensive on-site for both Hardware from OEM directly.
- 6. All quotations must reach the undersigned by 5 P.M., August 27, 2018.
- 7. Quotations must be valid till November 17, 2018.
- 8. Quotations shall be submitted in two parts.
  - Part-I (Technical) should contain all the technical details cum specifications of the offered solutions.

- Part-II (Financial) should contain the prices of the offered solutions along with commercial terms and conditions. The prices should be quoted separately for each item.
- 9. Delivery period will be 8 weeks.
- 10. We have standard 42U server rack of dimension 2006 mm × 598 mm × 1125 mm (H×W×D) with PDU in our Data Centre. Cluster should be installed in this rack. If offered solution does not fit in this Rack, then vendor should provide the Rack according to the solution.
- 11. Heat load of per rack should be 12KW maximum. Details of heat load and power consumption including cooling requirement for the above system in the rack should be provided.
- 12. InfiniBand FDR (56 Gbps, Mellanox, Model: SX6025) switch with 22 ports are available. Hardware should be compatible to this switch.
- 13. 48-port network switch (Make: HP, Model: 2530-48G). Hardware should be compatible to this switch.
- 14. IIT Kanpur is fully exempted from payment of GST on Imported Goods against our DSIR certificate.
- 15. IIT Kanpur is partially exempted from payment of Customs Duty (We will provide Custom Duty Exemption Certificate, CD applicable is 5.5%).
- 16. TENDER Specific Manufacturer Authorization Form from OEM Required.
- 17. The price should be quoted per node basis. Number of nodes may vary depending on the financial status at the time of ordering.
- 18. The Institute reserves the right of accepting or rejecting any quotations without assigning any reason thereof.
- 19. All prices should be F.O.B.
- 20. Installation by OEM is preferred.

## **Specifications of the HPC Cluster:**

- **1. Master Node (Quantity 1):** 2×Intel Xeon Gold 6142 @ 2.6 GHz or higher with 22 MB L3 Cache, Intel C620 Series chipset or better, 96GB 2666 MHz or higher ECC RAM, dual gigabit NIC, Management port, dual FDR InfiniBand ports, 4 × 2TB 7.2K RPM hot swap MDLSAS Disk DVDROM, OS: Cent OS latest version.
- **2.** Compute Nodes (Quantity 12): 2×Intel Xeon Gold 6142 @ 2.6 GHz or higher with 22 MB L3 Cache, Intel C610 Series chipset or better, 96GB 2666 MHz or higher dual gigabit NIC, Management port, dual FDR InfiniBand ports, 4× 1TB SATA Disk, OS: Cent OS latest version.

<b>3. Software:</b> Cluster monitoring and management software. Compilers: Free compilers, MPI, MKL node level deployment tools etc. Open domain free software, if any must be specified. Intel compilers and any other software's if provided by IIT Kanpur needs to be integrated by the vendor in the HPC cluster.	