

# TATA INSTITUTE OF FUNDAMENTAL RESEARCH

Autonomous Institution of the Department of Atomic Energy, Government of India  
HOMI BHABHA ROAD, NAVY NAGAR, COLABA, MUMBAI - 400 005.

Telephone : 022-2278 2890,2897, 2588, 2232

E-mail: deepak.baghele@tifr.res.in, madhura@tifr.res.in, dalvidd@tifr.res.in, sanju@tifr.res.in

Website www.tifr.res.in

**Ref.: TIFR/PD/CA18-25/180217**

**May 15, 2018**

NIT cum Tender Document (ONE PART LIMITED TENDER) for the following item:

1.	SAN Hybrid storage with attached specifications - Qty. 1 No.
----	---

Tender No.	<b>TIFR/PD/CA18-25/180217</b>
Estimate Cost	Rs. 20.00 Lakh
EMD	Rs. 40,000/-
Type of Tender	One Part Limited Tender
Date of Publishing	15.05.2018
Last Date for Submission of Tender	<b>01.06.2018 up to 17.30 hours</b>
Date of Opening Bids	<b>04.06.2018 at 15.00 Hours</b>

Tender should be submitted in sealed envelope superscribed with the Tender No.,  
Due Date in Bold Letters.

Please see attached sheet for conditions of tender.

# TATA INSTITUTE OF FUNDAMENTAL RESEARCH

Ref: TIFR/PD/CA18-25/180217

## Technical Specifications

SAN Hybrid storage with the following configuration

- 1-** a) SAN Dual controller SFF storage as per the base system configuration (Refer: Separately attached base system standard configuration).  
b) Ports Per Controller: Two 1/10 Gbps iSCSI Port and Two 8/16 Gbps FC Ports  
c) Deliver performance in excess 200k IOPS.  
d) All inclusive of software licensing in the system and ready to go out of the box.  
e) Storage should come standard with the Advanced Data Services (ADS) Software, which includes:
    - Performance Tiering and Archive Tiering Software
    - 512 Snapshots and Volume Copy Software
    - Remote Snap Software
  - f) Start with 1.6 TB of flash capacity included and scale as needed with any combination of solid state disks (SSD), high-performance enterprise, or lower-cost midline SAS-based drives.
  - g) Expected raw capacity would be 30 TB
- 2-** Hard Drive: 12G SAS 10K SFF (2.5in) Dual Port Enterprise as per the system configuration.
- 3-** Two Fibre Channel SFP+ 8Gb two port HBA compatible to Dell PowerEdge R910 and R715 as per the system configuration.
- 4-** Eight Fibre Channel SFP+ 8Gb Transceiver along with fibreoptic cable as per the system configuration.
- 5-** Four 1Gb RJ-45 iSCSI SFP+ Transceiver as per the system configuration.
- 6-** Four 10Gb SR iSCSI SFP+ Transceiver as per the system configuration.
- 7-** Rack mount kit.
- 8-** Five years warranty, parts exchange Next Business day delivery.
- 9-** Installation and configuration by the vendor. HBA should be compatible to RHEL.

<b>Base system standard configuration</b>	
<b>Array</b>	
Access Type	Block
Form Factor	2U, SFF
Number of controllers per array	2
Number of host ports per array	8
FC Host connectivity	8/16Gb
ISCSI host connectivity	1Gb or 10Gb
Cache, per array	
Max Read cache per array	8TB
Data (read/write) cache + system memory per array	16GB
Pool Capacity (with Large Pool Support)	562 TB (512TiB)
RAID Levels supported : Virtual mode	RAID 1,5,6,10
<b>Enclosures</b>	
Expansion Drive Enclosures	0-7 enclosures
LFF/SFF array/enclosure mixing	Supported
Maximum number of drives per array enclosure	24 SFF/12 LFF
Maximum number of drives per drive enclosure	24 SFF/12 LFF
Drive enclosure interface type	6Gb SAS
<b>Drives</b>	
Maximum total HDDs per array	192 SFF/96 LFF
Maximum total SSDs per array	192 SFF/96 LFF
Max raw capacity per array enclosure	76.8 TB SFF / 120 TB LFF
Max raw capacity per drive enclosure	76.8 TB SFF / 120 TB LFF
Max raw capacity per array	614.4TB SFF / 960TB LFF
Integrated SSDs	2x800GB Mixed Use SSDs
<b>Drive Capacities</b>	
SFF SSDs (Mixed Use)	400GB, 800GB, 1.6TB, 3.2TB
LFF SSDs (Mixed Use)	400GB, 800GB
SFF HDDs	15K: 300GB, 600GB, 900GB
	10K: 300GB, 600GB, 1.2TB, 1.8TB
	7.2K: 1.0TB, 2.0TB
LFF HDDs	7.2K: 2TB, 4TB, 6TB,8TB, 10TB
SEDs	Encryption not supported
<b>Software Features</b>	
Thin Technologies	Thin Provisioning, Space Reclamation, Thin Rebuild
Tiering	Performance Tier, standard Tier, Archive Tier
Replication	Snapshots (512), Volume Copy, Remote Snaps
Quality of Service	Virtual Tier Affinity
Bundled / Integrated Licenses	Advanced Data Services LTU standard
<b>Additional Features</b>	
Maximum number of volumes	512
Maximum number of snapshots	512
Maximum number of hosts	512
Maximum number of initiators	1024
Customer self-installable	Yes
Customer self-repairable	Yes
Customer self-upgradable	Yes

# TATA INSTITUTE OF FUNDAMENTAL RESEARCH

Autonomous Institution of the Department of Atomic Energy, Government of India (A Deemed University)

HOMI BHABHA ROAD, COLABA, MUMBAI – 400 005  
(PURCHASE SECTION)

## **Terms and Conditions**

1. The quotation shall be submitted in a sealed envelope duly superscribed with the tender enquiry number, and the due date in bold letters, addressed to the Admn. Officer (Purchase), Tata Institute of Fundamental Research, Homi Bhabha Road, Colaba, Mumbai – 400005. The envelopes should be clearly marked on top as the Tender Enquiry No., Due Date in bold letters. The sealed envelope has to be delivered by hand/courier at the Security Gate Officer of TIFR on or before on the due date specified. Tenders submitted after last date will not be considered.
2. After downloading the documents please inform your company details such as name, address, telephone nos., contact person and email address etc. by email to us. (deepak.baghele@tifr.res.in, madhuram@tifr.res.in, sanju@tifr.res.in, dalvidd@tifr.res.in) to enable us to inform prospective bidder for any corrigendum/changes if any; in the Tender document before due date.
3. In case the quotation is not sealed in the envelope the tender will be rejected.
4. Quotation must be valid for a period of 90 days from the due date.
5. Tenders containing correction, overwriting will not be considered. Late or delayed/Unsolicited quotations/offers shall not be considered at all. These will be returned to the firms as it is. Post tender revisions/corrections shall also not be considered.
6. Tenderer should sign on all the pages of the bid
7. If equipment offered is to be imported, arrangements for import will be made by us.
8. Tenders who do not comply with any of the conditions are liable to be rejected.
9. In case of any interpretational issues in this tender, the interpretational decision of the TIFR shall be Final binding on the bidder.
10. TIFR reserve the right to ask for or to provide any clarification, changes after the release of this tender.
11. TIFR reserve the right to cancel the tender even after the receipt of tender.
12. TIFR reserve the right to cancel the tender even after the receipt of tender, and in such case the EMD would be refunded without any interest to the bidding parties.
13. The Institute shall be under no obligation to accept the lowest or any other tender received in response to this tender notice and shall be entitled to reject any tender without assigning any reason whatsoever.

14. TIFR reserves the right to place the order for part/reduced quantity than what is specified in the tender

15. An earnest money for **Rs. 40,000/-** (i.e. 2% of the total estimated cost) has to be deposited in the form of Demand Draft, Fixed Deposit Receipt, Bankers cheque or Bank Guarantee from any commercial Banks or through online transfer through bank (Bank details to be provided on demand) in favour of **Registrar, Tata Institute of Fundamental Research, Mumbai** along with the quotation.

Also, in lieu of above, the bidder can submit the EMD in the form of "Bid Securing Declaration" as per the attached format. The declaration also should be submitted on the company letter head duly signed by officer authorized to submit the bid.

The earnest money will be refunded to the unsuccessful bidders on finalization of the contract.

**16. Suspension of Business dealing with bidder:**

In case the bidder who submits a "Bid Securing Declaration" fails to abide with the terms and conditions of the declaration or withdraw its bid before the award of the contract then TIFR reserve the right to suspend business dealings with such supplier for a period of three years. The above suspension shall be without prejudice to other remedies or action that may be initiated against the bidder as deemed fit by the competent authority.

17. Successful bidders will have to deposit **Performance Bank Guarantee @ ie.10 % of the purchase order value** in the form of Bank Guarantee valid for a period of 60 days beyond the date of contractual obligations. PBG amount will be forfeited if the Firm /Supplier fail to perform any of the terms & conditions of our Tender enquiry/ document.

- Bank Guarantee(BG) will not be accepted directly from Supplier, it should be received through the banker of supplier.

- In exception case, BG will be accepted directly from the party/supplier provided a covering letter with xerox copy of BG is received directly from banker of supplier.

- Without the receipt of BG along with the letter from Bank, the payment will not be released.

18. The Supplier shall arrange to deliver the ordered materials within the mutually agreed delivery period mentioned in the order unless extended with / without penalty.

a) In case of delay in supply on the part of the supplier, a penalty @ 0.5% per week of order value will be charged for delayed period subject to maximum of 10% of order value.

b) The same rate of penalty shall be applicable for late installation of the equipment / instrument also.

**19. Our standard Payment terms are as follows:**

The payment will be made only after delivery of the supply, satisfactory installation, commissioning and performance of the item/equipment at TIFR and after certification by our technical expert/ Authorized officer.

20. No Advance payment will be made to any local supplier except in case of furnishing valid Bank Guarantee from any nationalized / scheduled bank and the B.G. shall be valid till the complete delivery is made at the site.

21. For Import cases: **No Agency commission will be paid as per Govt. of India rules.**

22. The delivery period should be specifically stated and earlier delivery may be preferred.
23. TIFR is exempted from paying of Custom Duty under the notification No.51/96 dated 23.07.1996, for all procurements/supply meant exclusively for Educational, scientific and research purpose. Whenever the exemption certificate not honored by the authorities, the applicable duty will have to be paid. Hence Custom duties, if any, should be shown separately. TIFR is a public funded research institute and is entitled to concessional rate of GST @ 5% for certain items supplied for research purpose vide notification no. 47/2017 and 45/2017 dated 14th Nov, 2017. The offer should be submitted after fully considering the above notification.
24. COMMENCEMENT OF WARRANTY PERIOD: The warranty period of an item shall commence from the date of receipt of the item in good working condition and satisfactory installation/commissioning/demonstration at the project site. The warranty period and validity of Performance Guarantee shall be extended for the period of delay in satisfactory installation and delay in warranty services
25. Specifications are basic essence of the product. It must be ensured that the offers must be strictly as per our specifications. At the same time it must be kept in mind that merely copying our specifications in the quotation shall not make the parties eligible for consideration of the quotation. A quotation has to be supported with the printed technical leaflet/literature of the quoted model of the item by the quoting party/manufacturer.
26. **Price must be quoted in the "Price Bid" format attached herewith.**
27. Bidder who have not accepted the order / job awarded to them or withdrawn from the tender process OR whose EMD / Security Deposit has been forfeited in the past, their bid will not be considered and treated as ineligible/disqualified.
28. This invitation for bids is open to Original Manufacturers (OEM) / Authorized Dealers / Authorized Distributors / Subsidiary Indian Company of the OEM/ Indian Agent on behalf of the Foreign Manufacturer or Principals of the tendered equipment as given in the bid document. The bidder must be legal entity having a Permanent Account Number (PAN), Certificate of Incorporation, and Valid GST Registration Certificate. Copy of PAN, Certificate of Incorporation, and GST Registration Certificate is to be submitted.

ADMINISTRATIVE OFFICER  
(PURCHASE SECTION)  
TIFR, MUMBAI

**TIFR Enquiry No & Date:** \_\_\_\_\_

**Due date:** \_\_\_\_\_

**Bidder's Quotation Ref No. & Date:** \_\_\_\_\_

**Bidder's GST Registration No.:** \_\_\_\_\_

**Price / Financial Bid ( Bidders must quote their rates using this Format )**

Sr. No.	Item Description	Make/Brand/Type	HSN Code	Qty.	Rate per unit	Item wise GST %	Cost (In INR)
	Freight/Transportation charges, if any						
	Service/Labour charges, if any						
	Any Other charges						
	Less : Buyback, if any						
	<b>Total landed cost in Figures &amp; words</b>						
	Delivery Period						
	Warranty Period						
	Validity of Quote						
	Payment Terms						

**Note:**

1. All the column should be appropriately filled and not left blank, any duty/tax/charges

not applicable, then please specify as " Not Applicable"

2. Do not include any other charges, taxes, duties etc. in the Basic Cost of the item,

3. Any accessories, optional items should be shown separately.

4. Other Technical & Commercial details shall be furnished in a separate sheet.

5. Use separate sheet for detail description ,specification of the item, but prices should be quoted in same format.

**Signature of the Bidder**

Name, Address, Contact No. \_\_\_\_\_  
& Email id of the Bidder/Company \_\_\_\_\_  
with company's stamp or seal \_\_\_\_\_

**Date:** \_\_\_\_\_

**Place:** \_\_\_\_\_

**Bid Securing Declaration**

**(to be submitted on company's letter head)**

I/We the undersigned hereby declare that if we withdraw or modify the bids during the period of its validity, or if we are awarded the contract and fail to sign the contract, or to submit a performance security before the deadline defined in the request for bids document or fail to execute the contract, we will be suspended for the period of time specified in the request for bids document from being eligible to submit bids for contracts with the entity that invited the bids.

Name and Signature  
of Authorized Signatory  
and Company Seal