S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
1	Hybrid Storage enclosure (system), Sr. No. 3(i)	i) Offered Storage Array should be supplied with minimum 1 PB usable capacity, out of which 750TB usable capacity should be from 10K SAS HDD drives of not more than 2.4TB each and 250TB usable capacity should be from SAS SSD drives of not more than 15.36TB each. OR Offered Storage Array should be supplied with minimum 1 PB usable capacity using NVMe drives of at least 7.68TB each.	PGCIL has asked for storage with SSD and spinning drive. With Industry outlook of legacy spinning drives being phased out in near future many bidders would like to provide latest NVMe technology storage to PGCIL for longer lifecycle of the product. PGCIL has asked for 1PB usable storage. We understand by usable storage PGCIL meant functionality to store 1PB of data on the offered storage. Kindly clarify our understanding is aligned with PGCIL understanding of usable storage.	The provisions of the bidding document are amply clear.
2		v) Offered storage to be configured in such a way that only enclosures and necessary drives would be required to meet the capacity scalability mentioned above.	PGCIL has asked the storage with two controllers on day 1. Based on the OEM architectures there could be additional components required othe than enclosure and drives. We understand for the scalability any components required other than enclosure and drives to be provided at the time of required scalability. Kindly confirm.	The provisions of the bidding document are amply clear.
3	Hybrid Storage enclosure (system), Sr. No. 5	2 security requirements.	Different have different encryption architecture in storage. Some OEM does controller based encryptio which is old technology and it puts additional load on controller to handle encryption. In turn controller performacne is compromised. To solve this issue so that controller can focus on its core activities new technology of SED has been introduced. Request you to clarify we can offer SED technology which is latest one and better performacne storage can be offered ensuring encryption functionality asked in RFP. SED is latest technology and FIPS certificate on this technology is in process of getting acquired by respective OEM so it will be available in a year or two. Request you to allow the same solution of encryption with out FIPS without comprosing on performance and functionality of RFP.	The provisions of the bidding document are amply clear.
4	Hybrid Storage enclosure (system) for DR, Sr. No. 3(i)	1. Offered Storage Array should be supplied with minimum 650 TB usable capacity, out of which 250TB usable capacity should be from 10K SAS HDD drives of not more than 2.4TB each and 400TB usable capacity should be from SAS SSD drives of not more than 15.36 TB each. OR Offered Storage Array should be supplied with minimum 650 TB usable capacity using NVMe drives of at least 7.68TB each.	PGCIL has asked for storage with SSD and spinning drive. With Industry outlook of legacy spinning drives being phased out in near future many bidders would like to provide latest NVMe technology storage to PGCIL for longer lifecycle of the product. PGCIL has asked for 650TB usable storage. We understand by usable storage PGCIL meant functionality to store 650TB of data on the offered storage. Kindly clarify our understanding is aligned with PGCIL understanding of usable storage.	The provisions of the bidding document are amply clear.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
5	Hybrid Storage enclosure (system) for	v) Offered storage to be configured in such a way that only enclosures and necessary drives would be required to meet the capacity scalability mentioned above.	PGCIL has asked the storage with two controllers on day 1. Based on the OEM architectures there could be additional components required othe than enclosure and drives. We understand for the scalability any components required other than enclosure and drives to be provided at the time of required scalability. Kindly confirm.	Reference to "Existing Clause" quoted in the query does not exist.
6	Hybrid Storage enclosure (system) for DR, Sr. No. 5	2 security requirements. ii) Offered FIPS 140-2 encryption should support KMIP 1.3 or higher	Different have different encryption architecture in storage. Some OEM does controller based encryptio which is old technology and it puts additional load on controller to handle encryption. In turn controller performacne is compromised. To solve this issue so that controller can focus on its core activities new technology of SED has been introduced. Request you to clarify we can offer SED technology which is latest one and better performacne storage can be offered ensuring encryption functionality asked in RFP. SED is latest technology and FIPS certificate on this technology is in process of getting acquired by respective OEM so it will be available in a year or two. Request you to allow the same solution of encryption with out FIPS without comprosing on performance and functionality of RFP.	The provisions of the bidding document are amply clear.
,	Enterprise Storage All Flash enclosure (system), Sr. No. 5	appropriate encryption licenses and shall be validated for FIPS 140-2 security requirements. ii) Offered FIPS 140-2 encryption should support KMIP 1.3 or higher	Different have different encryption architecture in storage. Some OEM does controller based encryptio which is old technology and it puts additional load on controller to handle encryption. In turn controller performacne is compromised. To solve this issue so that controller can focus on its core activities new technology of SED has been introduced. Request you to clarify we can offer SED technology which is latest one and better performacne storage can be offered ensuring encryption functionality asked in RFP. SED is latest technology and FIPS certificate on this technology is in process of getting acquired by respective OEM so it will be available in a year or two. Request you to allow the same solution of encryption with out FIPS without comprosing on performance and functionality of RFP.	The provisions of the bidding document are amply clear.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
	Volume II, Section-3, Clause-3.13 Enterprise Storage All Flash enclosure (system), Sr. No. 13	i) Offered Storage array should have minimum of 8x32Gbps Fiber Channel host ports, either 8x25Gbps iSCSI ports or 8x32Gbps NVMe-FC ports. All ports should have capability to work at line speed. ii) Offered Storage solution should be natively scalable to at-least 24x32Gbps Fiber channel ports and either 24x25Gbps iSCSI ports or 24x32Gbps NVMe-FC ports.	Each OEM has it's own architecture and approach for Host connectivity and in case of enterprise use case hosts are connected to SAN storage via SAN switch. Since connectivity is via SAN switch, host ports are limiting factor for host connectivity for OEM architecture like us. Port scalability limitation has been revised/addressed for Hybrid DC. However, It seems for Enterprise all flash system the port scalability clause is not addressed and moreover current clause is restrictive for us as our architecture does not have 48 ports also we do not need 48 ports to deliver asked storage functionality. Please amend clause as " i) Offered Storage array should have minimum of 8x32Gbps Fiber Channel host ports, either 4x25Gbps iSCSI ports or 8x32Gbps NVMe-FC ports. All ports should have capability to work at line speed. ii) Offered Storage solution should be natively scalable to at-least 16x32Gbps Fiber channel ports and either 8x25Gbps iSCSI ports or 24x32Gbps NVMe-FC ports.	The provisions of the Bidding Document shall remain unchanged.
	Volume II, Section-3, Clause-3.17 Purpose built backup appliance, Sr. No. 5(iv)	5. iv) In case redundant controller is not available then spare controller needs to be provided.	Each OEM has its own architecture for backup appliance. Our architecture does not offer redundant controller. Request you to please remove this clause as it is restricting OEM choices for bidder.	The provisions of the Bidding Document shall remain unchanged.
0	Volume II, Section-3, Clause-3.6.1 Blade Server, Sr. No. 6		PGCIL has given option of converge network or separate FC adapter and ethernet adapter. I understand optios are provided to accomodate all OEM offerings as per OEM design. In case of converge network redundant adapter is mentioned while in case of separate network redundant adapter is not asked. This is disparity in both the solution offering as per OEM architecture and offering. Please clarify if we have to offer redundant adaper in both the options.	The provisions of the bidding document are amp clear.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
11	Volume II, Appendix A Implementation Schedule	MeitY Empanelment # (Completion by 68 weeks) # In case, MeitY Empanelment is not completed within stipulated timeline mentioned above, then the defect liability period (DLP) of Lot I-Batch1 shall be extended for the duration of the delayed period in addition to the period specified in contract.	The mandatory pre-qualification criteria for MeitY empanelment, as outlined below, include achieving a revenue of ₹20 crore from Cloud/DC hosting services. Based on our assessment, meeting these criteria within 68 weeks is not feasible. Consequently, this delay would require an extension of the Defect Liability Period (DLP) for Lot I-Batch 1 by the duration of the delay, in addition to the period already specified in the contract. This extension would result in a significant financial impact on the bidder due to the additional warranty and resource costs incurred. We respectfully request a reconsideration of this clause and propose its amendment to eliminate the requirement for extending the DLP beyond the originally specified duration in the contract. '- Min. cumulative revenue of INR 20 Cr. from Cloud / Data Centre hosting services - Delivering laaS service offering either in India or Globally - Certified for ISO 27001: 2013 (Information Security Management System) - Certified for ISO 27001: 2015 (Information Security Management System) - Certified for ISO 27017: 2015 (Information Security Aspects) - Certified for ISO 27018: 2019 (Personal Identifiable Information) - Certified for ITA - 942 / UPTIME (Tier III or higher) - Adherence to IT Act 2000 including 43 (A), MHA, CERT-In & LEA Guidelines issued by Govt. reference url for above PQ criteria - https://www.meity.gov.in/writereaddata/files/Stepwise%20guide%20on%20empanelment%2 Oprocess.pdf	The provisions of the Bidding Document shall remain unchanged. Delay arising due to pre-requisite of MeitY empanelment i.e. "Min. cumulative revenue of INR 20 Cr. from Cloud / Data Centre hosting services" and "Certified for TIA - 942 / UPTIME (Tier III or higher)" is attributable to employer and will not be considered for extension of DLP for Lot Batch1.
12	Volume II, Appendix A Implementation Schedule	MeitY Empanelment # (Completion by 68 weeks)	Could you please confirm if MeitY empanelment is also required for the DR site?	Kindly refer Volume II, Section-1, Clause 1.4.1, Sr. No. 13 for details.
13	Volume II, Section 2(B), Clause 2.9	BCP - 1.a. Replication of files/ VM/ physical server/ DBs/	Since no single OEM can fully meet all BCP technical compliance	The provisions of the bidding document
10	Business Continuity Planning (BCP), Sr. No. 1(a)	Application data from DC to DR	requirements, we kindly request an amendment to the clause as follows: Replication of files/ VM/ physical server/ DBs/ Application data from DC to DR	shall remain unchanged. Replication of physical servers must be provided either natively or by leveraging APIs, scripting, backups, etc.
14	Volume II, Section 2(B), Clause 2.9 Business Continuity Planning (BCP), Sr. No. 1(a)	BCP - 1.a. Replication of files/ VM/ physical server/ DBs/ Application data from DC to DR	Kindly provide the quantities for all use cases, as these details are crucial for provisioning additional tools with the necessary capabilities and for accurately estimating the associated costs. The required information includes: a. Files (Data size) b. Virtual Machines (Quantity along with virtual platform details) c. Physical Servers (Quantity along with OS details) d. Databases (Quantity along with database details) e. Applications (Quantity along with the type of applications)	Requested details for each replication type will be shared with the successful bidder during detailed engineering.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
15	Volume II, Section-5, Clause 5.4 Functional Tests	These functional tests should be carried out at the original equipment manufacturer (OEM) or bidder's premises/lab to provide tangible proof of the system's capabilities. The bidder will submit, along with the bid, a comprehensive list of the tests that will be conducted on the offered equipment, components, and software during the functional testing phase.	Based on our discussions with the respective OEMs, conducting these functional tests within a single test lab poses several challenges and is not practically feasible. Therefore, we request your consideration to allow bidders to demonstrate the required functionalities from multiple or different test labs of the OEMs We also kindly request the initiation of functional tests during the technical evaluation phase of the bids, as the given timeframe of 8 weeks is insufficient to establish and effectively demonstrate these tests.	The provisions of the bidding document shall remain unchanged. Functional Tests are to be carried out to prove the design and functions/ features of the equipment/ component offered conforming to the functional requirement specified in the technical specification.
16	Volume II, Appendix H BoQ, Section Services: Monthly rate for licenses for enterprise applications on the Marketplace	Services: Monthly rate for licenses for enterprise applications on the Marketplace	Problem Statement: We would like to highlight that many Software OEMs follow varying licensing models and may not be able to directly align with the 2vCPU/monthly subscription requirement specified. Resolution: To address the RFP requirements, OEMs will provide the closest possible match to meet the specified vCPU configuration. The subscription will be quoted on a monthly cost basis, with a yearly billing commitment starting from the date of activation. We kindly request your acceptance of the above approach.	Bidders need to quote as per the unit and quantity mentioned in the price schedule. Bidder may size their solution accordingly. The provisions of the bidding documents shall remain unchanged.
17	Volume II, Appendix H BoQ, Section Services: Monthly rate for licenses for enterprise applications on the Marketplace, Sr. No. 2	Services: Monthly rate for licenses for enterprise applications on the Marketplace e.g. SQL Server	Additionally, for cases where PGCIL has requested upgrades, we will need to include Software Assurance for Microsoft products, which is only available with a 3-year commitment. We kindly request your acceptance of the above approach.	Bidders need to quote as per the unit and quantity mentioned in the price schedule. Bidder may size their solution accordingly. The provisions of the bidding documents shall remain unchanged.
18	Price_Schedule_rev01.xlsx, Amend-5 and Clari-2 dtd. 03.10.2024	Price_Schedule_rev01 at item no. 77 - TLS/SSL Certificate Management - qty. are mentioned 5 nos. SET	Please clarify how is SET defined for this line item, and does bidder need to quote 5 SETs? What is the quantity to be quoted for?	A set of TLS/SSL certificate management shall be used for different group of customers. Bidders need to quote as per the unit and quantity mentioned in the price schedule.
19	Volume II, Section 2(B), Clause 2.8 TLS/SSL certificate Management, Sr. No. 17	Volume 2 - Section 2B - sub section 2.8 - page 38 - Point 17 - The Proposed solution shall be able to operate in multi tenancy mode for all features with support for minimum 15 tenants	As per specs, it looks PGCIL is asking for single solution to accommodate multiple tenant however as per commercial BoQ Price_Schedule_rev01 at item no. 77 - qty. are mentioned 5 SETs - hence kindly suggest do we need to consider five nos. TLS/SSL solution or single solution and what is the quantity to be quoted here in commercial template	Bidders need to quote as per the unit and quantity mentioned in the price schedule.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
20		· ·	Price schedule is having separate Rows for Server , RAM , GPU, SSD, Nvme, these are to be considered in the Base server pricing or not. Pls do clarify. Pls do Clarify, the Pricing for the Server in the Price schdule is to be submitted considering RAM inside the Server or without any RAM, as in the Price schedule price for the RAM 64GB is asked separately. The specification is asking min. 512GB RAM with the server and Point ii) Memory module provided as per BOQ line 1.a These are contradicting, pls do clarify.	Bidder need to quote for sub-component against each line item separately. Sub-component prices should not be considered in base price of respective items. Reference calculation: for line item no. 1 of BoQ (1U 2P rack server) requiring 512GB RAM will have 8 RAM sticks of 64GB each. Accordingly, for 20 servers, 20*8=160 RAM sticks are requested. Price schedule to be read along with Technical specifications and Vol-II Appendix-H.
21	Price_Schedule_rev01.xlsx, Amend-5 and Clari-2 dtd. 03.10.2024	Hybrid Storage DC - Offered Storage array should be supplied with minimum 1 PB usable Capacity and Offered Storage should be supplied with at-least Dual controller.	Price schedule is having separate line items for "Hybrid Storage enclosure with Dual Controller" and "250TB SAS HDD/ NVMe drives for hybrid storage system". Please confirm if pricing for these 250 TB drives are to be considered along with pricing of enclosure and Dual controller in the Base Storage system and as well as separate pricing in the respective line items. Or alternatively we need to add the drive pricing once in the respective line item only and put the rest of the pricing of storage system in enclosure and controller base system.	Bidder need to quote for sub-component against each line item separately. Sub-component prices should not be considered in base price of respective items. Price schedule to be read along with Technical specifications and Vol-II Appendix-H.
22	Price_Schedule_rev01.xlsx, Amend-5 and Clari-2 dtd. 03.10.2024	Hybrid StorageDR- Offered Storage array should be supplied with minimum 650 TB usable Capacity and Offered Storage should be supplied with at-least Dual controller.	Price schedule is having separate line items for "Hybrid Storage enclosure with Dual Controller" and "250TB SAS HDD/ NVMe drives for hybrid storage system". Please confirm if pricing for these 250 TB drives are to be considered along with pricing of enclosure and Dual controller in the Base Storage system and as well as separate pricing in the respective line items. Or alternatively we need to add the drive pricing once in the respective line item only and put the rest of the pricing of storage system in enclosure and controller base system.	Bidder need to quote for sub-component against each line item separately. Sub-component prices should not be considered in base price of respective items. Price schedule to be read along with Technical specifications and Vol-II Appendix-H.
23	Price_Schedule_rev01.xlsx, Amend-5 and Clari-2 dtd. 03.10.2024	Enterprise Storage-Offered Storage array should be supplied minimum with 250 TB usable and Offered Storage should be supplied with at-least Dual controller	Price schedule is having separate line items for "Enterprise Storage All Flash enclosure, Controller pair" and 250TB NVMe drives". Please confirm if pricing for these 250 TB drives, Controller pair are to be considered along with pricing of All Flash enclosure in the Base Storage system and as well as separate pricing in the respective line items. Or alternatively we need to add the drives and controller pair pricing once in the respective line item only and put the rest of the pricing of storage system in enclosure.	Bidder need to quote for sub-component against each line item separately. Sub-component prices should not be considered in base price of respective items. Price schedule to be read along with Technical specifications and Vol-II Appendix-H.

Clarific	cation-VI to Bidding Documents for	Package DC-IT-1 for Supply, Installation & Maintenance of I	T/Cloud Infrastructure of Data Centre at Manesar , Specification No	s).: CC/NT/W-IT/DOM/A06/24/08843
S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
24	Price_Schedule_rev01.xlsx, Amend-5	Object storage -offered with minimum of 6 nodes as	Price schedule is having separate Rows for Object Storage system with	Bidder need to quote for sub-component against
	and Clari-2 dtd. 03.10.2024	compute/access nodes and 500TB of usable capacity	File storage and NL-SAS/SATA drives(250 TB) Capacity, Please confirm	each line item separately. Sub-component prices
			if these drives (250 TB) Capacity are to be considered within the Base File	should not be considered in base price of
			Storage system pricing and as well as separate pricing in the respective	respective items.
			line items. Or alternatively we need to add the drives pricing once in the	
			respective line item only and put the rest of the pricing of Object Storage	Price schedule to be read along with Technical
			system with File storage	specifications and Vol-II Appendix-H.
25	Price_Schedule_rev01.xlsx, Amend-5	3.30 Link Load Balancer-HW solution - point 15 - The LLB should	Price schedule is having separate rows for pricing under LLB as item	Price schedule to be read along with Technical
	and Clari-2 dtd. 03.10.2024	have a minimum L4 throughput of 40 Gbps	64,65, 66 - We request to clarify as below :	specifications and Vol-II, Appendix-H.
		and	a) This LLB is asked as 2 quantity as hardware appliance as per section 3-	
		Price Schedule - Item 64, 65,66 - Sch 1a	3.30 - In this appliance Day 1 throughput asked is 40 Gbps which product	Bidder need to quote for sub-components (price
		Link Load Balancer - 2 qty EA	will already include on Day 1 to comply with specifications. Thus, second	schedule 1a, 1b, 2: line item 65 & 66) separately.
		LLB:10Gbps L4 Throughput license - 4 qty EA	line item price for item 65 and 66 are already included in day 1 in LLB HW	Sub-component prices should not be considered
		LLB:Virtual instance license - 10 qty EA	first line item in item 64. Hence, bidder requests to clarify if complete	in base component (price schedule 1a, 1b, 2: line
			price can be included in line item 64 itself?	item 64).
			The line item '65 and 66 become additional .	
			b) Also, in L4 10 Gbps throughput license - item 65 - 4 qty is asked to	Solution is designed to work in high availability
			achieve 40 Gbps throughput; however HW appliance asked is 2 qty, so	(HA), accordingly, single license is considered for
			please review if this quantity is sufficient for 2 appliance. Kindly clarify.	each HA unit. In case, the proposed solution
			c) Sly. in line item 66 for LLB - LLB:Virtual instance license - qty asked is	requires separate license for each appliance in
				HA, bidder need to consider the licenses
			item 66.	accordingly.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
26			Price schedule is having separate rows for pricing under SLB as item 67,68,69 - We request to clarify as below: a) This SLB is asked as 2 quantity as hardware appliance as per section 3-3.32 - In this appliance Day 1 throughput asked is 10 Gbps which product will already include on Day 1 to comply with specifications. Thus, second line item price for item 68 and 69 are already included in day 1 in HW SLB line item 67. Hence, bidder requests to clarify if complete price can be included in line item 67 itself? The line item '68 and 69 become additional. b) Also, in L4 10 Gbps throughput license line item 68 - 1 qty is asked to achieve 10 Gbps throughput; however HW appliance asked is 2 qty, so please review if this quantity is sufficient for 2 appliance. Kindly clarify. c) Sly. in line item 69 for HW SLB: Virtual instance license - qty asked is 10. Is this 10 per appliance? Kindly pls help clarify and review quantity for item 69.	Price schedule to be read along with Technical specifications and Vol-II Appendix-H. Bidder need to quote for sub-components (price schedule 1a, 1b, 2: line item 68 & 69) separately. Sub-component prices should not be considered in base component (price schedule 1a, 1b, 2: line item 67). Solution is designed to work in high availability (HA), accordingly, single license is considered for each HA unit. In case, the proposed solution requires separate license for each appliance in HA, bidder need to consider the licenses accordingly.
27	Price_Schedule_rev01.xlsx, Amend-5 and Clari-2 dtd. 03.10.2024, and Volume II, Section 2(B), Clause 2.5 Virtual Web Application Firewall (WAF), Sr. No. 8,9	Sch 1a - Item No. 63 - Virtual WAF - 10 nos. and Spec - point 8,9 - The solution should deliver minimum L7 throughput of 200 Mbps per instance which should be scalable to 1 Gbps. The throughput and performance of solution should scale by adding only underlying hardware resources to software solution.	be scalable to 1 Gbps; The throughput and performance of solution should scale by adding only underlying hardware resources to software solution. Kindly pls advice the Mbps for which virtual WAF - 10 nos. has to be quoted. To comply with above tech spec point, we understand that 10 qty of 1Gbps L7 throughput is required from day 1 itself . Kindly clarify the understanding. This 1 Gbps WAF may be on a higher side for Day 1	Bidder need to quote for 10 no. of Virtual WAF, each supplied with 200Mbps of L7 throughput licenses from Day-1.
28	Volume II, Section-2(B), Clause 2.4 Virtual SLB+SSL offloader, Sl. No. 1	The "Link Load balancer with GSLB", "Hardware Server load balancer+Reverse proxy+WAF+SSL offloader" and "Virtual Server load balancer+SSL offloader" should be of same OEM.	requirement, kindly review. We request clarification on the rationale behind mandating all components—Link Load Balancer with GSLB, Hardware Server Load Balancer + Reverse Proxy + WAF + SSL Offloader, and Virtual Server Load Balancer + SSL Offloader—to be from the same OEM. This condition limits flexibility and could restrict participation from vendors offering best-of-breed solutions in individual components. Furthermore, interoperability between different OEM solutions is standard in the industry, allowing customers to leverage specific strengths of each solution. Proposed Revision: "The Link Load Balancer with GSLB, Hardware Server Load Balancer + Reverse Proxy + WAF + SSL Offloader, and Virtual Server Load Balancer + SSL Offloader may be from different OEMs/Same OEM.	The provisions of the bidding document are amply clear. The provisions of the bidding documents shall remain unchanged.

S.No.	Clause ref. No.	Provision of the Bidding Document	Query/Clarification sought by bidders	POWERGRID Clarification
29	Volume I, Section-IV -General	(b) the aggregate liability of the Contractor to the Employer,	We request you to limit the value as 10% of the total contract value	The provision of the Bidding Documents shall
	Conditions of Contract (GCC) -S&I	whether under the Contract, in tort or otherwise, shall not exceed		remain unchanged.
	Rev 3-GCB	the total Contract Price, provided that this limitation shall not		
		apply to the cost of repairing or replacing defective equipment, or		
		to any obligation of the Contractor to indemnify the Employer with		
		respect to patent infringement.		