| Pre-bid meeting que  | ies received through mail   |  |   |
|--|---|--|---|
| KFP Document<br>Reference(s)<br>(Section & Page                        |   |  |   |
| Number)  | Clause (in brief) of RFP requiring clarification(s)   | Brief details/ Query in reference to the clause  | LIC Response  |
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66 | <ol> <li>The proposed Storage Appliances for each site should be capable of<br/>being directly mounted (at each sites) as a partition on Exadata server by<br/>directly connecting Storage Appliance to Exadata Primary Database<br/>servers (Exadata X7-2servers) and Standby Database Servers(Exadata X9M-<br/>2 HC servers) through point-to-point fiber-channel network connection<br/>without connecting thru current Dell unified switch (Please see proposed<br/>network connection diagram under schedule-3)</li> </ol> | Oracle restricts direct connectivity of Exadata with other hardware,<br>systems or network. This clause favour single OEM and restricting<br>other industry leading data protection OEM's to participate in the<br>RFP   | Direct mounting thru point-to-point connectivity is required for following reasons :<br>- Not having additional space for placing extra switches<br>- Not having sufficient ports on existing switches.<br>- Not having Bandwidth available on existing Switch for NFS.<br>- for faster backup completion.<br>Please be guided by RFP and corrigendum issued. |
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66 | 9. The storage system should provide hybrid storage architecture -<br>combining Read and/or Write Flash Accelerators (SSDs) with SAS-3 HDD.   | PI suggest bidder can propose purpose built backup appliance for<br>backup? As traditional storage and backup appliance has<br>architecture level difference.<br>Traditional Storage Designed for a wide range of applications,<br>including file storage, databases, and virtual machines and<br>requires media server in data movement<br>Whereas PBBA specifically designed for data backup and recovery,<br>to deliver the performance             | The requirement as per this RFP is Backup Appliance/Storage .   |
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 67 | 5. The storage system must support 22TB SAS-3 7.2K RPM hard disk drive  | PI allow bidder to quote 4/8/22TB SAS 7.2K RPM hard disk drive   | The specification is modified as follows:<br>The storage system must support 22 TB or higher SAS-3 hard disk drive.<br>Please refer to the Corrigendum issued.  |
| 7. Performance and<br>Efficiency:<br>Page 72                           | 5. A backup speed of 12 TB / hour should be achieved .<br>( Please refer to Section B, Clause 6 – SLA requirements on Backup<br>performance requirements  | Achieving the desired backup throughput relies on the<br>performance capabilities of both the primary system and the<br>network infrastructure, in conjunction with the proposed backup<br>appliance. Based on our understanding, the primary system can<br>deliver the required throughput to meet the performance<br>demands of the backup appliance. Therefore, bidders can quote<br>an appliance that meets the performance requirements specified | Please refer to Corrigendum issued regarding change in backup speed   |
| 13. Backup Software-<br>Other Specifications<br>Page 74                | The proposed backup software should support data-masking strategies<br>for Oracle database table columns to hide sensitive data in a non-<br>production environment, such as a test or development system.  | This clause favour single OEM and restricting other industry<br>leading data protection OEM's to participate in the RFP. Request<br>to remove this clause  | Please refer to Corrigendum   |
| g) Other Features<br>Page # 70   | 3. Storage Capacity 340 TB Usable RAID(1/0) Or Mirror   | As the RFP requests backing up primary database servers on the<br>backup appliance using the native RMAN utility on a directly<br>mounted partition, and other Oracle database servers and staging<br>servers using backup software on the backup appliance, please<br>provide the capacity bifurcation for Production DB backups on<br>locally mounted disks and the backup capacity for other<br>DB/staging/media servers.                           | The current Database size of each database and size required for flat files from<br>staging server is published in RFP.<br>The expected Year on Year growth for Production database is also mentioned in<br>RFP   |
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66 | 4. Proposed backup appliance/storage should have scalability with respect<br>capacity expansion and proportional cache in future.   | Most of the industry standard storage platforms do support<br>scalability.<br>However, each platform will have a limit to scalability. Please<br>provide details about upper limit of scalability. Moreover cache<br>scalability is a function of required performance. Kindly provide<br>the performance scalability expected from the proposed storage   | Capacity should be scalable upto 1 PB.<br>Cache should be scalable up to 92 TB.   |
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66 | 5. It should be possible to configure and schedule backups of backup sets from Backup Appliance to LTO tapes  | While Backup to LTO tape is technically possible.<br>Disk-to-Disk backup solutions provide unmatched efficiency in<br>terms of performance, capacity utilization and restore operation.<br>These features/options may not be available with LTO (tape) based<br>backup. Request to remove this clause and standardize the backup<br>solution to be Disk-to-Disk  | The requirement specified in RFP is Disk-to-Disk-to-Tape.<br>Please be guided by RFP  |

| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66      | 14. The storage system can fully utilize the entire DRAM for IO activity by using technologies Adaptive I/O Staging.  | Storage system utilize DRAM cache for IO management and<br>performance. Data is written from host to storage cache and later<br>destagedfrom storage cache to SSD/HDD drives. Please elaborate<br>on this point if there is any specific functionality required from<br>storage array beyond this functionality.  | Storage System should use DRAM flash and discs to maximize performance.  |
|---|---|---|--|
| 1. Backup<br>Appliance/Storage<br>technical specifications<br>Page# 66 & 67 | 16. The storage system should be available as both an on-premises<br>appliance and a cloud image that can be installed on a compute instance<br>to provide storage in cloud environment with up to 1PB of Automated<br>capacity.                        | Please elaborate on the point of use case of deploying storage as<br>a cloud image on cloud environment.<br>Moreover, 1PB is a significant capacity and deploying it as a virtual<br>image may not be suitable from performance & data efficiency<br>perspective. Request to modify this clause to a lower capacity (say<br>128TB / 256 TB) or remove this clause altogether.                                       | Capability required for future need.<br>No change in requirement. Please be guided by RFP.                           |
| b) Reliability, Availability<br>and Serviceability<br>Page# 67              | 4. The storage system should support simple software upgrade<br>maintaining older copies of the operating system and can revert to them<br>should newer versions present a problem.   | Please elaborate on this point. Usually storage software upgrades<br>are performed after all necessary technical compatibility pre-check<br>are completed. Rolling back a storage software may be complex<br>and may be destructuve. Request to remove the "revert to older<br>version clause"  | This Technical specification is removed. Please refer to corrigendum issued.   |
| b) Reliability, Availability<br>and Serviceability<br>Page# 67              | <ol> <li>The storage system must not have battery to reduce maintenance task<br/>and increase system reliability.</li> </ol>  | Please elaborate on the point "must not have battery".<br>Battery backed cache is used to prevent data loss in case of<br>unplanned power supply disruption to storage, with battery<br>providing power to cache for destaging the in-transit data to<br>persistent drives.   | No change in requirement.Please be guided by RFP   |
| c) Scalability and<br>Connectivity<br>Page# 67                              | <ol> <li>The storage system must be highly scalable to support rapid growth in<br/>storage capacity.</li> </ol>   | While the proposed storage will be scalable, there is a limit to max<br>capacity and performance that a particular storage model can<br>deliver. Kindly specify the upper limit for scalability.  | Storage system capacity should be scalable upto 1 PB.  |
| c) Scalability and<br>Connectivity<br>Page# 67                              | 3. The storage system should provide at least 24 CPU cores and 1 TB<br>DRAM per controller  | Request to allow OEM to size storage as per the capacity,<br>performance and scalability requirements. This clause restricts fair<br>competition  | No change in requirement. Please be guided by the RFP.   |
| c) Scalability and<br>Connectivity<br>Page# 67                              | 5. The storage system must support 22TB SAS-3 7.2K RPM hard disk drive.   | Request to allow OEM to size storage as per the capacity,<br>performance and scalability requirements.<br>Please remove this clause.<br>22TB 7.2K RPM drives are 3.5" form factor, these cannot be mixed<br>with 2.5" form factor drives within the same drive enclosure - a)<br>General Features:point # 15 (contradiction in specification asked in<br>RFP)   | Please be guided by the RFP.<br>Also , please refer to the Corrigendum issued for this specification .               |
| c) Scalability and<br>Connectivity<br>Page# 67                              | 6. The storage system should support 7.68TB SSD.  | Request to allow OEM to size storage as per the capacity,<br>performance and scalability requirements.<br>Please remove this clause.  | 7.68 TB ot higher SSDs can be proposed. Please refer to the corrigendum issued.                                      |
| c) Scalability and<br>Connectivity<br>Page# 67 & 68                         | 8. The storage system should support at least 20 10Gb/25Gb/40Gb/100Gb<br>Ethernet (twinax/optical) ports  | Request to allow OEM to size storage as per capacity, performance<br>and scalability requirements. As per Network Connectivity<br>Schedule 3 in RFP Page# 92 - we need 2 x 25G Ethernet for<br>existing Exadata connectivity, 4 x 10G Ethernet & 4 x32G FC<br>connectivity & 2 x 25G/100G Ethernet for future Exadata<br>connectivity.<br>total host connectivity required = 4 x 25G Eth, 4x 10G Eth, 4 x 32G<br>FC | No Change in requirement. Please be guided by RFP.<br>Requirements specified for future connectivity and scalability |
| c) Scalability and<br>Connectivity<br>Page# 68                              | 11. The storage system must have redundant HBA cards for tape backup<br>(each 16Gb/32Gb dual-port FC HBA).  | Request to allow OEM to size storage as per capacity, performance<br>and scalability requirements. Please remove this clause  | No Change in requirement. Please be guided by RFP.<br>This is required for future connectivity and scalability       |
| d) Software Features and<br>Backup Services<br>requirements<br>Page# 68     | <ol> <li>The storage system must support Hybrid Columnar Compression<br/>technology<br/>which enables end-to-end data reduction for Oracle Database.</li> </ol>   | TDE and Hybrid Columnar Compression are Oracle specific<br>technologies, storage device will publish file share / volume to<br>Oracle host for storing data or RMAN backups.<br>please elaborate what support is required from storage on these<br>capabilities.  | The requirement is that backup of HCC compressed tables should not get<br>impacted .                                 |
| d) Software Features and<br>Backup Services<br>requirements<br>Page# 68     | 20. The storage system should support 10x to 50x compression of static<br>Oracle Database data, resulting in a 3x to 5x reduction in storage footprint<br>for data<br>warehousing and long-term storage of information in Oracle Database<br>databases. | with host side data encryption (like TDE) enabled compression<br>/deduplication cannot be guaranteed. Kindly elaborate on the ask   | Please refer to the corrigendum issued   |

| f) Data Protection       | 2. The storage system must support RAID0 (Striping), RAID1 (2 and 3 ways     | Request to modify this clause to RAID 1 (mirror), RAID 5 (single       | No change in requirement. Please be guided by RFP.                                |
|--------------------------|--|--|---|
| Features                 | mirroring), Single parity RAID, Double parity RAID and Triple parity RAID.   | parity), RAID 6 (dual parity)  |   |
| Page# 69                 |  |  |   |
| f) Data Protection       | 10. The storage system should support ability to encrypt the replication     | Data in Flight Encryption (data replication) will require additional   | This Technical specification is removed.  |
| Features                 | data.  | components like FCIP routers. Kindly elaborate on the use case for     | Please refer to corrigendum issued.   |
| Page# 69                 |  | data replication at storage tier?                                      |   |
| c) Scalability and       | 7. The storage system should be mountable on existing Exadata X7-2 rack      | Kindly share rack dimensions and power/cooling available on the        | The Proposed storage system should be mountable on existing Non-Exadata racks     |
| Connectivity             | at Primary   | Exadata rack.  | at Primary site and at DR site.   |
| Page# 68                 | site and Exadata X9M-2-HC rack at DR site.                                   |  | The entire backup solution hardware including Backup Appliance , Media servers,   |
|                          |  |  | Tape Library should fit in within available rack space of 24 U .                  |
|                          |  |  | Please refer to the corrigendum issued.   |
| d) Software Features and | 11. The storage system must support file level protocols, like NFSv2,        | Unified storage supports Block (iSCSI, FC) and File (NFS, CIFS/SMB)    | Please refer to the corrigendum issued.   |
| Backup Services          | NFSv3, NFSv4, NFSv4.1, DNFS(Direct NFS), SMB1/2/2.1/3, HTTP, WebDAV,         | protocols. Object protocol (S3/CAS) support requires dedicated         |   |
| requirements             | FIP, SFIP, FIPS.   | object storage product. Kindly relax this clause to File and Block     |   |
| Page# 68                 | 12. The storage system must support Object protocol, Open Stack              | support.   |   |
|                          | 13. The storage system must support block level protocol like iSCSL EC       |  |   |
|                          |  |  |   |
| d) Software Features and | 19. The storage system should support direct communication between           | Recommended to use LAN/SAN switch for manageability,                   | No change in requirements.Please be guided by RFP and corrigendum                 |
| Backup Services          | storage  | resilience and performance optimization as per best practices for      |   |
| requirements             | system and Oracle database by reducing latency and improves I/O              | storage connectivity. Kindly modify this clause to enable              |   |
| Page# 68                 | performance for Oracle workload.   | connectivity via switch.   |   |
| d) Software Features and | 21. The storage should support object API for Oracle Cloud Infrastructure    | Proposed storage subsystem will provide APIs. Leveraging the APIs      | This Technical specification is removed. Please refer to corrigendum issued.      |
| Backup Services          | Object Storage that enables touse the same applications on both on-          | for integration will depend upon consuming application/platform        |   |
| requirements             | premises on the storage and in the cloud on Oracle Cloud Infrastructure      |  |   |
| Page# 68                 | Object Storage.  |  |   |
| d) Software Features and | 22. The storage should support data retention policy on Oracle Cloud         | Proposed storage will provide capability for file retention on         | Storage system should support object store in public cloud which will support     |
| Backup Services          | Infrastructure object, snapshot, and share/file retention policies for legal | premises. Data retention on OCI object storage will be part of OCI     | retention policies for legal hold , governance policies and regulatory compliance |
| requirements             | noid, data governance, or regulatory compliance.                             | capability. Request to remove this clause as this restricts            |   |
| e) Monitoring            | 9 The storage system must provide or support a single management             | Please elaborate on the use case and functionality required. The       | Required as future requirement when we move to cloud                              |
| Notification and         | console to manage both cloud and on-prem environments that allows            | understanding is that this is a on-prem deployment Kindly              | Required as future requirement when we move to cloud.                             |
| Management               | administrators to manage their Storage resources in the cloud along with     | remove this clause   |   |
| Page# 69                 | their on-premises resources, providing a unified management platform for     |  |   |
| l'age. os                | distributed cloud environments.  |  |   |
| Page 66 -                | The proposed Storage Appliances for each site should be capable of           | Kindly consider this as "The proposed Storage / Appliances "           | The requirement specified in RFP is Storage/Backup Appliance. Please be guided by |
|                          | being directly mounted (at each sites ) as a partition on Exadata server by  |  | RFP.  |
| Backup                   | directly connecting Storage Appliance to Exadata Primary Database            |  |   |
| Appliance/Storage        | servers (Exadata X7-2servers ) and Standby Database Servers(Exadata X9M      | -  |   |
| technical specifications | 2 HC servers) through point-to-point fiber-channel network connection        |  |   |
|                          | without connecting thru current Dell unified switch (Please see proposed     |  |   |
| 1                        | network connection diagram under schedule-3)                                 |  |   |
| 2 66                     |  |  | The requirement specified in REP is Storage/Backup Appliance. Please be guided by |
| Page 66                  | It should be possible for other Databases on Exadata server X5-2 server      |  | RFP.  |
| De eluve                 | VMs at primary site ( like UAT Database servers and SMS database) and        |  |   |
| Backup                   | other independent databases like catalog databases at both sites, to be      | Kindly consider this as "The proposed Storage / Appliances "           |   |
| Appliance/storage        | backed up through RMAN interfaced with proposed Backup software to           |  |   |
|                          | Backup/storage appliance(Please see proposed network connection              |  |   |
|                          | diagram under schedule-3)  |  |   |
| Backup                   | The storage system should provide hybrid storage architecture -              | Kindly clarify use case . Please clarify if you want to achive caching | No change in requirement.Please be guided by RFP.                                 |
| Appliance/Storage        | combining Read and/or Write Flash Accelerators (SSDs) with SAS-3 HDD.        |  | Hybrid storage architecture combining Read and/or Write Flash Accelerators (SSDs) |
| technical specifications |  |  | with SAS-3 HDD is required for high performance and large storage capacity        |
| 9                        |  |  |   |
| 1- 2                     | 1  |  |   |

| Backup<br>Appliance/Storage<br>technical specifications<br>- 9<br>Page 66<br>Backup<br>Appliance/Storage<br>technical specifications<br>- 11<br>Page - 67<br>Backup<br>Appliance/Storage | The storage system should provide hybrid storage architecture -<br>combining Read and/or Write Flash Accelerators (SSDs) with SAS-3 HDD.<br>The storage system must be able to provide optimized storage caching<br>hierarchy with hybrid storage pools containing DRAM, SSD and SAS-3<br>hard disk drives.<br>The proposed Storage system should be certified by Oracle to work with<br>Oracle Exadata systems | for the 12TB per Hour kind of backupspeed we will recommend<br>end to end NVME systems as the hybrid stroage systems will take<br>higher footprint.Current generation of NVME stoage built for<br>backup use cases are perofrmance intensive and cost effective, LIC<br>should do away with Hybrid system as this infr is going to be used<br>for next 6-7 years and the hybrid systems are going to be obsolute<br>in near future due to higher demand of NVME attributed to<br>affordibility, lesser footprint and performance of the NVME<br>systems<br>As we understand, required backup solution should be compatible<br>& working as per requirement.<br>Kindly remove certification Oracle. | Please refer to corrigendum pertaining to Backup speed specifications. No change in requirements. Please be guided by RFP. The proposed Storage system should be compatible to work with Oracle Exadata systems. Please refer to the corrigendum issued   |
|--|---|--|---|
| technical specifications<br>Page 66  | Proposed backup appliance/storage should have scalability with respect<br>capacity expansion and proportional cache in future.  | Kindly clarify if it intends to say that cache should be expandable for the strenge system 2   | No change in requirement.   |
| Page 67  | The storage system must not have battery to reduce maintenance task and increase system reliability.  | Majority of the storage vendors use battery-backed NVRAM (non-<br>volatile RAM) for write caching, and also has a real-time clock<br>battery to preserve system date and time information during<br>power outages. Requesting LIC to change this point as this could<br>lead to dataloss during outages and this point is specific to single<br>OFEM   | No change in requirement. Please be guided by the RFP   |
| Page 67  | The storage system should be mountable on existing Exadata X7-2 rack at Primary site and Exadata X9M-2-HC rack at DR site.  | Please advice on space avaialble in those rack   | The Requirement is motimed as below:<br>The storage system should be mountable on existing non-Exadata racks at Primary<br>site and at DR site.<br>The entire backup solution hardware including Backup Appliance, Media servers,<br>Tape Library should fit in within available rack space of 24 U.<br>Please refer to the corrigendum issued. |
| Page 70  | Storage Capacity 340 TB Usable RAID(1/0) Or Mirror  | RAID 0/1 is inefficient way of configurating the solution in cunnret<br>times where efficient perforamnce systems are avaialble with the<br>help of RAID5 /RAID 6 or equivalent raid protection . Due to<br>mirroring there is wastage of 50% of the capacity and increase<br>footprint and overall opex . We will recommend LIC to use latest<br>NVME based storage solution wit RAID 6/ DP or equivalent   | No change in requirements. Please be guided by the specifications and requirements mentioned in RFP   |
| Page 68  | The storage should support data retention policy on Oracle Cloud<br>Infrastructure object, snapshot, and share/file retention policies for legal<br>hold, data governance, or regulatory compliance.  | this point looks OEM specific , requesting LIC to change this , LIC<br>can mention it as Staroge should support S3 connectivity to public<br>cloud.  | Storage system should support object store in public cloud which will support<br>retention policies for legal hold , governance policies and regulatory compliance  |
| Page 68  | The storage should support object API for Oracle Cloud Infrastructure<br>Object Storage that enables touse the same applications on both on-<br>premises on the storage and in the cloud on Oracle Cloud Infrastructure<br>Object Storage.  | this point looks OEM specific , requesting LIC to cahnge this , LIC<br>can mention it as Staroge should support S3 connectivity to public<br>cloud.  | This requirement is removed.<br>Please refer to the Corrigendum issued.   |
| Page 68  | Oracle<br>Page 69<br>LIC-RFP for procurement of Backup solution for ODS project of LIC of<br>India.<br>Database data, resulting in a 3x to 5x reduction in storage footprint for<br>data warehousing and long-term storage of informationin Oracle<br>Database databases.   | Compression and deduplicatiion will be done by backup software ,<br>requesting LIC to change this point . If the data is already<br>compressed and deduplicated it can not be guranteed again.   | Please referto the corrigendum issued.  |
| Additional Queries   | While gartners Leaders quadrant has been considered for Backup , LIC should consider same for Staoge as well.   |  | No change in requirement. Please be guided by RFP.  |
| Additional Queries   | Anitranswomware protection is not mentioned in KFP, as futurestic<br>solutuon LIC should ask fro Ransomware protection capabilities in Backup<br>storage.   |  | Anti-ransomware protection has been specified as part of Backup software<br>requirement   |

| Page 8, 9                 | The brief scope of work is as below:                                       | Clarification sought: Based on the clause, we understand that the      | There is no Migration of old backups required from old backup system to new          |
|---------------------------|--|--|--|
| 4. Present Technical      | Supply, installation, configuration, commissioning and maintenance of      | scope is for new backup setup.   | system   |
| environment & Scope of    | Backup Software  | And there is no migration of backup data / Restore and backup          |  |
| Work                      |  | again etc  |  |
|                           |  | -9   |  |
|                           |  | Kindly confirm or provide inputs.                                      |  |
| Page 9                    | Supply and installation of required latest version of OS on Media servers  | Query: Operating system is not mentioned in the technical              | Yes. The proposed Media servers at both sites shall be loaded with required          |
| 4. Present Technical      |  | specification.   | compatible latest version of operating system with support for 5 years.              |
| environment & Scope of    |  | Does the bidder have to add O.S.                                       | Please refer to corrigendum issued   |
| Work                      | B. Media Server Configuration and Components ( One server each for         |  |  |
|                           | Primary and DR site)   |  |  |
| Page 90                   |  |  |  |
| Page 9                    | Provide ATS support for a period of One year for Backup Appliance          | Change Request: All leading hardware providers bundle 3 years          | No change in requirement. Please be guided by RFP.                                   |
| 4. Present Technical      |  | support with hardware.   |  |
| environment & Scope of    |  | We request LIC to change the clause to:                                |  |
| Work                      |  | Provide ATS support for a period of <b>One three</b> years for Backup  |  |
|                           |  | Appliance  |  |
| Page 38                   | Go-Live will be reckoned as the production implementation date backup      | Clarification Sought:  | Dismantling has to be done prior to new installation as there is rack space and port |
| 4. Payment Terms:         | solution after successful Installation and integration, acceptance testing | We understand, dismantling of the existing setup can happen after      | constraints.   |
|                           | and documentation of entire solution at the locations specified as per the | Go Live and project completion.  |  |
|                           | scope of work.   |  |  |
|                           |  | Kindly confirm or provide inputs.                                      |  |
|                           | Project Completion period at DC, Mumbai. installation, commissioning,      |  |  |
| Page 44                   | integration, testing of backup solution                                    |  |  |
| 7. Project schedule       | 6 to 10 weeks  |  |  |
| Page 42                   | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be       | Clarification Sought:  | Please refer to corrigendum regarding modifications in Backup speed                  |
| 6.5 SLAs for Backups from | achieved   | We understand, the Exadata devices, network and other setup is         |  |
| Database Servers to       |  | configured to write data at 12 TB/Hr. If any changes are required      |  |
| Backup Appliance (Disk to |  | on Exadata to achive this throughput, it will be effected by LIC.      |  |
| Disk) and Disk to tapes   |  |  |  |
|                           |  | Kindly confirm or provide inputs.                                      |  |
|                           |  |  |  |
| Page 52                   | 3 Backup Software Qty=2  | <b>Query:</b> We request LIC to clarify if backup at primary and at DR | Both sites backups are to be taken independently. Replication between storages of    |
| Annexure-VI: Commercial   |  | will be taken independently  | both sites is not in scope of this RFP   |
| Bid (indicative prices)   |  | OR   |  |
| Format                    |  | Backup will be taken at primary and same will be replicated to DR      |  |
|                           |  | backup appliance.  |  |
| Page 52                   | 6 Any Other Hardware Items   | Query: We request LIC to clarify if SAN switches, LAN switches will    |  |
| Annexure-VI: Commercial   |  | be provided by LIC or the bidder has to factor the same.               | At present there are Dell Unified switches available. Please refer to Schedule-3     |
| Bid (indicative prices)   |  |  | proposed connection and layout diagram   |
| Format                    |  |  |  |
| Page 52                   | 6 Any Other Hardware Items   | Clarification Sought:  | Please refer to schedule-3 proposed connection diagram and Schedule-2 -              |
| Annexure-VI: Commercial   | o The storage system should support at least 20 10Gb/25Gb/40Gb/100Gb       | In case, the existing LAN and SAN switches are to be used,             | Indicative Bill of quantity .  |
| Bid (indicative prices)   | Etnernet (twinax/optical) ports  | we request LIC to confirm that required, active ports with             | The available ports have shown in the connection diagram.                            |
| Format                    | 9 The storage system should be able to seamlessly connect to Exadata X5    | necessary transceivers are available on the LAN and SAN switches.      | Based on the available ports and transceivers , the indicative Bill of quantity has  |
|                           | and X7 with 10Gb/40Gb Ethernet (twinax/optical) ports.                     | We will factor cables accordingly.                                     | been listed.   |
|                           | 10 The storage system should be able to seamlessly connect to Exadata      |  |  |
| Page 67,68                | X9 with 25Gb/100Gb Ethernet (twinax/optical) ports                         |  |  |
| 1. Backup                 |  |  |  |
| Appliance/Storage         |  |  |  |
| technical specifications  |  |  |  |
| c) Scalability and        |  |  |  |
| Connectivity              |  |  |  |
| Page 66                   |  | Query: We request LIC to provide the required backup and               | The requirement of storage capacity is 340 TB usable space as specified in RFP.      |
| 1. Backup                 |  | retention policy to size the appliance capacity                        | Please be guided by the RFP.   |
| Appliance/Storage         |  |  |  |
| technical specifications  |  |  |  |

| Page 68                    | 7   | Query: We request LIC to provide details of the Exadata racks so      | The storage system should be mountable on existing non-Exadata racks at Primary          |
|----------------------------|---|---|--|
| 1. Backup                  | The storage system should be mountable on existing Exadata X7-2 rack at       | we can confirm against this clause.                                   | site and at DR site.   |
| Appliance/Storage          | Primary site and Exadata X9M-2-HC rack at DR site.                            | -   | The entire backup solution hardware including Backup Appliance, Media servers,           |
| technical specifications   |   |   | Tape Library should fit in within available rack space of 24 U.                          |
| c) Scalability and         |   |   | Please refer to the Corrigendum issued.  |
| Connectivity               |   |   |  |
| Page 72                    | The backup software must support Virtual Tape Libraries (VTL) for both        | Clarification Sought:   | VTL is a Storage related feature. The technical specification asked for in this RFP is - |
| 1. Backup                  | disk-to-disk backups and restorations.  | We understand, VTL licences are not to be provided.                   | "The proposed backup software shall support Virtual Tape Library (VTL)                   |
| Appliance/Storage          | Proposed Backup software shall support Virtual Tape Library for backups       |   | functionality for both backup to disk and restoration from disk". Vendor is free to      |
| technical specifications   | to disk as well as for restorations.  | Kindly confirm or provide inputs                                      | propose VTL licenses , if they feel the same is required for their proposed solution.    |
| 9. Backup to Virtual Tape  |   |   |  |
| Library (VTL):             |   |   |  |
| Page 84                    | 28. The expected database size growth of Main database is 15% year-on-        | Query: Please mention number of years for growth to be factored       | Number of years to be factored in - is next 5 years                                      |
| Schedule-1- Functional     | year. For the current size of Database please see Table -A, Section -B        | while sizing the solution   |  |
| requirements and Scope     | below.  |   |  |
| of Work                    |   |   |  |
| Page 10                    | 3.  | Change Request:   | Please refer to the Corrigendum  |
| Section-B: Minimum         | Bidder must have supplied and configured Backup solutions involving           | We request LIC to exclude the Tape libraries from the eligibility     |  |
| Eligibility Criteria       | Backup Storage (Appliance), Backup software and LTO Tape libraries to at      | requirement. For a few years, most customers either do not use        |  |
|                            | least 5 customers, In the last 5 financial years preceding the date of this   | tapes or use existing tapes for many years across different           |  |
|                            | RFP. At least three among these should be provided to Government              | environments. The POs hence do not include LTO Tape libraries         |  |
|                            | Departments/PSU/BFSI sector companies   |   |  |
|                            |   | Bidder must have supplied and configured Backup solutions             |  |
|                            |   | involving Backup Storage (Appliance), Backup software and LTO         |  |
|                            |   | Tape libraries to at least 5 customers                                |  |
|                            |   |   |  |
| Minimum Eligibility        | Bidder must have supplied and configured Backup solutions involving           | Bidder/any of sister entities of Bidder's parent organization must    | Please be guided by RFP and Corrigendum  |
| Criteria (MEC) [Stage I    | Backup Storage (Appliance), Backup software and LTO Tape libraries to at      | have supplied and configured Backup solutions involving Backup        |  |
| Evaluation]                | least 5 customers, In the last 5 financial years preceding the date of this   | Storage (Appliance), Backup software and LTO Tape libraries to at     |  |
| Page No.10                 | RFP. At least three among these should be provided to Government              | least 5 customers, In the last 5 financial years preceding the date   |  |
|                            | Departments/PSU/BFSI sector companies.  | of this RFP. At least three among these should be provided to         |  |
|                            |   | Government Departments/PSU/BFSI sector companies.                     |  |
|                            |   |   |  |
|                            |   |   |  |
|                            |   |   |  |
| Minimum Eligibility        | Bidder must have experience in maintaining the backup solution for 3          | Request to change it to - Bidder must have experience in              | Please be guided by RFP  |
| Criteria (MEC) [Stage I    | different entities in the last three years. All should be from Govt Dept /PSU | maintaining the backup solution for 3 different entities in the last  |  |
| Evaluation]                | / BFSI Sector.  | Five years. All should be from Govt Dept /PSU / BFSI Sector.          |  |
| Page No.10                 |   |   |  |
| Minimum Eligibility        | Bidder must have supplied and configured Backup solutions involving           | Bidder must have supplied and configured Backup solutions             | Please be guided by RFP and Corrigendum  |
| Criteria (MEC) [Stage I    | Backup Storage (Appliance), Backup software and LTO Tape libraries to at      | involving Backup Storage (Appliance), Backup software and LTO         |  |
| Evaluation]                | least 5 customers, In the last 5 financial years preceding the date of this   | Tape libraries to at least 3 customers, In the last 5 financial years |  |
| Page No.10                 | RFP. At least three among these should be provided to Government              | preceding the date of this RFP. At least three among these should     |  |
| 5                          | Departments/PSU/BFSI sector companies.  | be provided to Government Departments/PSU/BFSI sector                 |  |
|                            |   | companies.  |  |
|                            |   |   |  |
| Minimum Eligibility        | Bidder must have minimum turnover of Rs.100 Crores in each of the             | Bidder must have minimum turnover of Rs.100 Crores in each of         | Please be guided by RFP  |
| Criteria (MEC) [Stage I    | following three financial years i.e. 2021 2022, 2022 2023, 2023 2024. Bidder  | the following three financial years i.e. 2021 2022, 2022 2023, 2023   |  |
| Evaluation]                | should have made profit (before tax) in each of the following three           | 2024. Bidder should have made profit (before tax) in any of 2 years   |  |
| Page No.9                  | financial year's i.e. 2021 2022 and 2022 2023, 2023 2024.                     | of the following three financial year's i.e. 2021 2022 and 2022 2023, |  |
|                            |   | 2023 2024   |  |
| Clause 7. Project schedule | 1 Delivery of hardware, software, licenses etc. 4 to 6 weeks                  | 1 Delivery of hardware, software, licenses etc. 8 to 10 weeks         | Please refer to corrigendum issued.  |
| Page No.44                 | 2 Project Completion period at DC, Mumbai. installation,                      | 2 Project Completion period at DC, Mumbai. installation,              |  |
|                            | commissioning, integration, testing of backup solution                        | commissioning, integration, testing of backup solution                |  |
|                            | 6 to 10 weeks   | 10 to 14 weeks  |  |
|                            | 3 Project Completion period at DR Site, Bangalore Colo i.e.                   | 3 Project Completion period at DR Site, Bangalore Colo i.e.           |  |
|                            | installation, commissioning, integration, testing of                          | installation, commissioning, integration, testing of                  |  |
|                            | backup and sync solution.   | backup and sync solution.   |  |
|                            | 6 to 14 weeks   | 10 to 24 weeks  |  |

| Clause 4, Payment Terms | 60% of the cost of Hardware items and 80% of Software items of the         | 80% of the cost of Hardware items and 80% of Software items of     | Please refer to corrigendum issued.   |
|-------------------------|--|--|---------------------------------------|
| Page No.38              | Commercial Bid Format at Annexure-VI shall be paid after delivery of       | the Commercial Bid Format at Annexure-VI shall be paid after       |                                       |
|                         | entire solution (software, hardware, warranty & maintenance with OEM       | delivery of entire solution (software, hardware, warranty &        |                                       |
|                         | and peripherals as per scope) at the specified locations mentioned in      | maintenance with OEM and peripherals as per scope) at the          |                                       |
|                         | the PO   | specified locations mentioned in the PO                            |                                       |
| 4. Payment Terms        | 30% of the cost of Hardware items and 20% of the cost of software items    | 20% of the cost of Hardware items and 20% of the cost of software  | Please refer corrigendum              |
| Page No.44              | in Annexure-VICommercial Bid shall be paid on Go-Live date                 | items in Annexure-VICommercial Bid shall be paid on Go-Live date   | · · · · · · · · · · · · · · · · · · · |
| lagentern               |  |  |                                       |
| 7. Project schedule     | Delivery of hardware, software, licenses etc. 4-6 Week                     | Request to change 8-10 weeks                                       | Please refer corrigendum              |
| Page No.44              |  |  | <u>-</u>                              |
| 7. Project schedule     | Project Completion period at DC, Mumbai. installation, commissioning,      | Request to change 10-18 Weeks                                      | Please refer corrigendum              |
| Page No.45              | integration, testing of backup solution 6 to 10 weeks                      | -  |                                       |
| 7. Project schedule     | Project Completion period at DR Site, Bangalore Colo i.e. installation,    | Request to change 10-24 Weeks                                      | Please refer corrigendum              |
| Page No.46              | commissioning, integration, testing of backup and sync solution.6 to 14    |  | 5                                     |
| 5                       | weeks  |  |                                       |
| Clause 6, Sectionn 6.3  | Required System-Uptime and Penalties applicable - if the desired system    | Request to Penalty cap for a guarter shall be a maximum of 5% of   | Please refer corrigendum              |
| System Uptime required  | uptimes are not met 99.5% - nil. <99.50% up to 99% Penalty 3 % of          | the Total AMC Bill for a quarter.                                  | 5                                     |
| and its applicable      | Quarterly AMC amount <99% up to 98% Penalty 4 % of Quarterly AMC           |  |                                       |
| penalties               | amount < 98% up to 97% Penalty 5 % of Quarterly AMC amount and <           |  |                                       |
| Page No.41              | 97% Penalty 5 % of Quarterly AMC bill + 0.10% of AMC amount . for every    |  |                                       |
| lagentern               | additional hour of downtime thereo Penalty can for a quarter shall be a    |  |                                       |
|                         | maximum of 15% of the Total AMC Bill for a quarter                         |  |                                       |
| 8. Liquidated damages   | If Service Provider fails to deliver product and/or perform any or all the | Pls, request to change liquidated damages a sum equivalent to      | Please refer corrigendum              |
| Page No.41              | Services within the stipulated time, schedule as specified in this         | 0.5 % of total Project Cost for delay of each week or part thereof |                                       |
|                         | Agreement LIC may without prejudice to its other remedies under the        | maximum up to 5 % of total Project Cost                            |                                       |
|                         | Agreement, and unless otherwise extension of time is agreed upon           |  |                                       |
|                         | without the application of liquidated damages deduct from the Project      |  |                                       |
|                         | Cost as liquidated damages a sum equivalent to 12 % of total Project Cost  |  |                                       |
|                         | for delay of each week or part thereof maximum up to 100 % of total        |  |                                       |
|                         | Project Cost. Once the maximum deduction is reached LIC may consider       |  |                                       |
|                         | termination of the Agroement   |  |                                       |
|                         |  |  |                                       |
| Clause 4, Payment Terms | 60% of the cost of Hardware items and 80% of Software items of the         | 80% of the cost of Hardware items and 80% of Software items of     | Please refer corrigendum              |
| Page No.38              | Commercial Bid Format at Annexure-VI shall be paid after delivery of       | the Commercial Bid Format at Annexure-VI shall be paid after       |                                       |
|                         | entire solution (software, hardware, warranty & maintenance with OEM       | delivery of entire solution (software, hardware, warranty &        |                                       |
|                         | and peripherals as per scope) at the specified locations mentioned in the  | maintenance with OEM and peripherals as per scope) at the          |                                       |
|                         | PO.  | specified locations mentioned in the PO.                           |                                       |
|                         | 30% of the cost of Hardware items and 20% of the cost of software items    | 20% of the cost of Hardware items and 20% of the cost of software  |                                       |
|                         | in Annexure-VI- Commercial Bid shall be paid on Go-Live date.              | items in Annexure-VI- Commercial Bid shall be paid on Go-Live      |                                       |
|                         | Go-Live will be reckoned as the production implementation date backup      | date.  |                                       |
|                         | solution after successful Installation and integration, acceptance testing | Go-Live will be reckoned as the production implementation date     |                                       |
|                         | and documentation of entire solution at the locations specified as per the | backup solution after successful Installation and integration,     |                                       |
|                         | scope of work.   | acceptance testing and documentation of entire solution at the     |                                       |
|                         | 10% of the cost of Hardware items of the Commercial Bid Form at            | locations specified as per the scope of work.                      |                                       |
|                         | Annexure-VI shall be paid after 3 months of Go-Live date and after         | Since there is already a Bank Guarantee there is no need of 10%    |                                       |
|                         | submitting documentation on any Configuration changes/ modifications       | retention after Go-Live.   |                                       |
|                         | done after Go-Live and after completion of training.                       |  |                                       |
| Clause 6.5              | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be       | Request this to be amended as follows: Backup speed of 10 TB per   | Please refer corrigendum              |
| Page No.42              | achieved.  | hour ( for uncompressed backups ) is to be achieved.               |                                       |
| Clause 6.5              | Table 3  | Request the Table 3 be modified accordingly as per Backup speed    | Please refer corrigendum              |
| Page No.42              |  | of 10 TB per hour  |                                       |
| Annexure 4              | Annexure-IV: Manufacturer's authorization letter (i.e. MAF) from           | Request LIC to accept OEM Standard MAF Format rather than the      | Please refer corrigendum              |
| Page No.49              | respective OEMs**  | one specified in the RFP. Format can be provided by each OEM       |                                       |
| 1                       |  |  |                                       |

| Annexure – XII            | Sr No 1   | Request to please change "point-to-point fiber-channel network"      | Please refer corrigendum             |
|---------------------------|---|--|--------------------------------------|
| Page No.66                | The proposed Storage Appliances for each site should be capable of          | to "point-to-point optical fiber network" Or "QSFP28 Copper          | 5                                    |
| 5                         | being directly mounted (at each sites ) as a partition on Exadata server by | cables" in place of  |                                      |
|                           | directly connecting Storage Appliance to Exadata Primary Database           |  |                                      |
|                           | servers (Exadata X7-2servers ) and Standby Database Servers(Exadata X9M     | -  |                                      |
|                           | 2 HC servers) through point-to-point fiber-channel network connection       |  |                                      |
|                           | without connecting thru current Dell unified switch (Please see proposed    |  |                                      |
|                           | network connection diagram under schedule-3)                                |  |                                      |
|                           |   |  |                                      |
| Clause 6, Sectionn 6.3    | Required Uptime of solution/service on Quarterly basis 99.50%               | Required Uptime of solution/service on Quarterly basis 99.50%        | Please refer corrigendum             |
| System Uptime required    | Percentage System-up time(rounded to nearest )                              | Percentage System-up time(rounded to nearest )                       |                                      |
| and its applicable        |   |  |                                      |
| penalties                 | <99.50% up to 99% - Penalty of 3 % of Quarterly AMC amount                  | <99.50% up to 99% - Penalty of 0.5 % of Quarterly AMC amount         |                                      |
| Page No.41                | < 99% up to 98% - Penalty of 4 % of Quarterly AMC amount                    | < 99% up to 98% - Penalty of 1 % of Quarterly AMC amount             |                                      |
|                           | < 98% up to 97% - Penalty of 5 % of Quarterly AMC amount                    | < 98% up to 97% - Penalty of 1.5 % of Quarterly AMC amount           |                                      |
|                           | < 97% - Penalty of 5 % of Quarterly AMC bill + 0.10% of AMC                 | < 97% - Penalty of 2 % of Quarterly AMC bill + 0.10%                 |                                      |
|                           | amount , for every additional hour of downtime                              | of AMC   |                                      |
|                           | thereof   | amount , for every additional hour of downtime                       |                                      |
|                           |   | thereof  |                                      |
|                           |   |  |                                      |
| Clause 6 Sections 6 6     | 100% Successful Backup Pate No popalty                                      | 100% Successful Rackup Pate No pepalty                               | Please refer corrigendum             |
| SI As for Backup failures | 100% Successful Backup Rate - No penalty of 1% of Ouarterly convice         | 08% 09.00% Successful Backup Rate - No penalty of 0.5% of            |                                      |
| Page No 42                | charge  | Ouarterly convice charge   |                                      |
| rage NO.45                | 05% 07.00% Successful Rackup Pate - Penalty of 2% of Ouarterly service      | 05% 07.00% Successful Rackup Pate - Penalty of 1% of Quarterly       |                                      |
|                           | charge  | sonico chargo  |                                      |
|                           | 00% - 94.99% Successful Backup Rate - Penalty of 3% of Ouarterly service    | 90% - 94 99% Successful Backup Rate - Penalty of 1.5% of             |                                      |
|                           | charge  | Ouarterly service charge   |                                      |
|                           | < 90% Successful Backup Rate - Penalty of 5% of Ouarterly service charge    | < 90% Successful Backup Bate - Penalty of 2% of Ouarterly service    |                                      |
|                           | < 50% Succession backup hate - renaity of 5% of Quarterly service charge    | charge   |                                      |
|                           | Bidder must have supplied and configured Backup solutions involving         | Request to consider 3 Customers in last 5 financial yrs including    | Please be guided by the terms in RFP |
|                           | Backup Storage (Appliance), Backup software and LTO Tape libraries to at    | the current Year i.e 2024-2025 . ( The bid is also getting submitted |                                      |
|                           | least 5 customers, In the last 5 financial years preceding the date of this | April 25.  |                                      |
|                           | RFP. At least three among these should be provided to Government            |  |                                      |
|                           | Departments/PSU/BFSI sector companies.Copy of the concerned Purchase        |  |                                      |
|                           | to be submitted and details to be submitted as per Annexure-VII.            |  |                                      |
| Continue D. Clauser No. 2 | Multiple PO will be considered of that same entity.                         |  |                                      |
| Section B Clause No :3    |   |  |                                      |
|                           | Bidder must have experience in maintaining the backup solution for <b>3</b> | Request to consider 3 different entities in last 5 yrs including     | Please be guided by the terms in RFP |
| Section B Clause No :3    | different entities in the last three years. All should be from Govt Dept    | current year .   |                                      |
|                           | /PSU / BFSI Sector  |  |                                      |
|                           | Approving VI shall be paid after 2 months of Go. Live data and after        | mequest to consider 10% cost of Hardware to be paid after 1          |                                      |
|                           | cubmitting documentation on any Configuration changes (modifications        |  |                                      |
| Page 38 -payment terms    | done after Ge Live and after completion of training                         |  |                                      |
|                           | Liquidated damages- a sum equivalent to 12 % of total Project Cost for      | Request to have all penalties including delivery. SLA should be      | Please refer to Corrigendum          |
|                           | delay of each week or part thereof maximum up to 100 % of total Project     | capped at 10% and remove 100% total Project cost                     |                                      |
| Page 44 -8                | Cost.   |  |                                      |
| Delivery page 44 6.7      | Delivery of hardware, software, licenses etc -4 to 6Weeks.                  | Request to consider Delivery to 10 Weeks .                           | Please refer to Corrigendum          |
|                           | Project Completion period at DC, Mumbai. installation, commissioning,       | Request to consider Project Completion Period at DC to 14-16         | Please refer to Corrigendum          |
| Page 44 -7                | integration, testing of backup solution-6 to 10weeks                        | Weeks  |                                      |
|                           | Project Completion period at DR Site, Bangalore Colo i.e. installation,     | Request to consider Project Completion Period at DR to 18-20         | Please refer to Corrigendum          |
| Page 44 - /               | commissioning, integration, testing of backup and sync solution.            | weeks  |                                      |
|                           | Quarterly AMC amount  | 1% of Quarterly AMC amount   | Please refer to corrigendum          |
|                           | A % of Quarterly AMC amount   | 2 % of Quarterly AIVIC amount  |                                      |
|                           | 5% of Quarterly AMC amount  | 2 % of Quarterly AIVIC amount  |                                      |
|                           | of Quaterly AMC bill+0.10% of AMC Amount for over additional barrent        | 2% of Quarterly AIVIC difformation                                   |                                      |
|                           | or quatery Aivic bill+0.10% of Aivic Amount for every additional hour of    | 5% of Quarterry AIVIC DIII+0.2% OF AIVIC amount for additional       |                                      |
| page 41 0.5               | uownume thereor   | nour or downtime thereor.  |                                      |

| 6.5 SLA                                    | SLAs for Backups from Database Servers to Backup Appliance (Disk to Disk) and Disk to tapes   | Kindly alter this point to D2D2T   | Disk to Disk Backups and Disk to Tape backups will be scheduled at different points<br>in time. The SLAs mentioned are applicable to each type of backup separately   |
|--|---|--|---|
| SEC F A.3                                  | The penalty will be applied at the end of each calendar month based on reported performance   | In case, bidder need to procure any additional license for any replication other than oracle, kindly help us to mention  | Bidder has to procure all licenses required for the scope of work mentioned in the RFP. For backup software licenses , Please refer to Page -77 under heading Backup software-other specifications- which states "Must be provided with perpetual licenses for unlimited number of hosts and must be configured with 75 TB of Front End capacity based license at each site with 5 years AMC support ". As per the scope of work Backups are to be configured at both DC and DR sites to Backup Appliance and Tape libraries installed in each location. Backup Storage to Storage replication between DC and DR storages is not to be configured under the current scope of work.      |
| SEC F A.4                                  | There is one RMAN catalog database server at each site. The catalog<br>database should be backed up<br>daily.   | Kindly help us to understand the existing mode/tool of taking<br>RMAN backups.   | Dell NetWorker is the existing backup software. The existing backup appliance is<br>Dell NetWorker is the existing backups are scheduled through Dell NetWorker<br>software. Oracle RMAN scripts are integrated with Dell NetWorker to take Oracle<br>RMAN backups and store them on the Dell Data Domain DD6800 backup<br>appliance. Both DC and DR site Databases and Staging servers have their own<br>independent Backups scheduled through Backup software (interfaced with RMAN )<br>to take backups to DD6800 in respective locations. Disk to Tape library backups are<br>currently stopped due to very high backup time( running to more than 24 hours)<br>and backup failures |
| SEC F A.5                                  | There are 2 staging servers at each site. The staging servers contain flat<br>files which needs to be<br>backed up  | For sake of better understanding, kindly help with the schedule<br>and retention policies applied. Also, how these files are getting<br>replicated and by what backbone speed.   | In the existing setup , for Flat files, weekly full backup is scheduled (at both DC and DR locations) . Incremental backups are scheduled daily.<br>Total size of full backup of flat Files is approximately 4.8 TB (uncompressed) . The existing retention period is one week.   |
| SEC F A.7                                  | For Primary database servers at primary site on Oracle Exadata X7-<br>2(PRODS), the Storage Appliance<br>shall be directly mounted as a partition on database servers. Backups shall<br>be made to the mounted<br>partition directly through RMAN utility invoked from database servers<br>(disk to disk). The connection<br>shall be point-to-point direct Optical Fiber without connecting through<br>Dell unified switch. Please<br>see proposed connection diagram in schedule-3. | We understand the connectivity shall be P2P. For better clarity, kindly help us with the port numbers and speed of available ports.  | Please refer to Page no 92 and 93 - Proposed Connection and Layout diagram for DC and DR site.  |
| SEC F A.19                                 | The agents/plugins/backup software pertaining to backup software deployed on Exadata database servers shall be compatible with Exadata machines and should not cause any performance issues, huge consumption of resources, file locking etc.   | Primary OEMs do provide APIs for the same. For better<br>understanding, kindly help us if we can integrate the API on<br>existing Virtual machine or standalone machine used by the<br>Databases.  | Oracle Exadata Machines are Oracle Engineered Systems. Any third party<br>agents/plugins that would be installed should be fully compliant with Exadata<br>systems . The third party Agents /plugins installed on Database clients(Exadata DB<br>nodes) should not cause any performance issues on Exadata Systems. Bidder is<br>free to use agent-less methods if available. No spare virtual machines or<br>standalone machines are available at both sites . Bidder has to propose for<br>additional servers if required for agent-less installation at each site.   |
| SEC F A.20                                 | agents on Exadata systems<br>should be compatible and certified to work on Oracle Enterprise Linux<br>latest version.( the existing<br>version on Oracle Exadata systems is OEL version 8)  | We believe that this system and Operating system are under valid OEM support subscription. Kindly mention, if not.   | Exadata systems and Source staging servers are under OEM support. Media servers with Operating system with OEM support has to be supplied by bidder as per this RFP   |
| SEC F C.3                                  | ordination with<br>existing vendor  | For better understanding, kindly help us to understand if the decomissioning is considered in same delivery timelines?   | Yes . Decommissioning should be done prior to start of installation in the same<br>delivery schedule. Please refer to corrigendum for change in delivery schedule.<br>Please refer to corrigendum issued.   |
| SEC F C.9                                  | All works related to cabling and connectivity from Dell Unified switches to<br>Appliance, Tape<br>libraries and servers need to be carried out by the vendor.   | Please help us to understand exact model and available ports with speed.   | Please refer to Page no -8, Clause-4 - 4.Present Technical environment & Scope<br>of Work - for the model of Dell Unified Switch.<br>Please refer to Page no 92 and 93 - Proposed Connection and Layout diagram for<br>DC and DR site.ch  |
| The given Clause to be included in the RFP | The given Clause to be included in the RFP  | In case the bidding Company/firm is hived off from the demerged company, the experience, eligibility etc. as per the requirement of the RFP may be considered as of the demerged company, provided the demerged company doesn't apply in the same RFP process. | Please refer to corrigendum   |

| Section-B: Minimum            | Bidder must have supplied and configured Backup solutions involving           | Request for change in Clause to "(Bidder/OEM) must have                  | Please be guided by RFP and Corrigendum issued.                                   |
|-------------------------------|---|--|---|
| Eligibility Criteria : Pg. 10 | Backup Storage (Appliance), Backup software and LTO Tape libraries to at      | supplied and configured Backup solutions involving Backup                | 5,5   |
|                               | least 5 customers. In the last 5 financial years preceding the date of this   | Storage (Appliance), Backup software and LTO Tape libraries              |   |
|                               | REP. At least three among these should be provided to Government              | to at least 5 customers. In the last 5 financial years preceding         |   |
|                               | Departments/PSU/BESI sector companies   | the date of this RFP. At least three among these should be               |   |
|                               |   | provided to Government Departments/PSU/BESI sector                       |   |
|                               |   | companies."  |   |
| Section-B: Minimum            | Bidder must have experience in maintaining the backup solution for 3          | Request for change in Clause to "(Bidder/OEM) must have                  | Please be guided by RFP .   |
| Eligibility Criteria : Pg. 10 | different entities in the last three years. All should be from Govt Dept /PSU | experience in maintaining the backup solution for 3 different            |   |
|                               | / BFSI Sector.  | entities in the last three years. All should be from Govt Dept           |   |
|                               |   | /PSU / BFSI Sector."   |   |
|                               | Bidder must have supplied and configured Backup solutions involving           | We request you to change the clause from only Bidder to Bidder/          | No change. Please be guided by RFP  |
| Section-B: Minimum            | Backup Storage (Appliance), Backup software and LTO Tape libraries to at      | OEM for the this clause.   |   |
| Eligibility Criteria (Page -  | least 5 customers, In the last 5 financial years preceding the date of this   |  |   |
| 10)                           | RFP. At least three among these should be provided to Government              |  |   |
|                               | Departments/PSU/BFSI sector companies.  |  |   |
|                               |   |  |   |
|                               | Bidder must have experience in maintaining the backup solution for 3          | We request you to change the clause from only Bidder to <u>Bidder/</u>   | No change. Please be guided by RFP  |
| Section-B: Minimum            | different entities in the last three years. All should be from Govt Dept /PSU | <b><u>DEM</u></b> for the this clause.                                   |   |
| Eligibility Criteria (Page -  | / BFSI Sector.  |  |   |
| 10)<br>Clause 4 ( Dage - 28)  | 60% of the cost of Hardware items and 80% of Software items of the            | 80% of the cost of Hardware items and 80% of Software items of           | Place refer to Corrigondum  |
| Clause 4 (Fage - 50)          | Commercial Bid Format at Appevire-VI shall be paid after delivery of          | the Commercial Bid Format at Appevure-VI shall be paid after             |   |
|                               | entire colution (coffware, bardware, warranty & maintenance with OEM          | delivery of entire solution (software, bardware, warranty &              |   |
|                               | and peripherals as per scope) at the specified locations mentioned in the     | maintenance with OEM and peripherals as per scope) at the                |   |
|                               | and peripherals as per scope) at the specified locations mentioned in the     | internatice with OEM and peripherals as per scope) at the                |   |
|                               |   | specified locations mentioned in the PO.                                 |   |
|                               | 30% of the cost of Hardware items and 20% of the cost of software items       | 20% of the cost of Hardware items and 20% of the cost of software        |   |
|                               | In Annexure-vi- Commercial Bid shall be paid on Go-Live date.                 | date   |   |
|                               | GO-Live will be reckoned as the production implementation date backup         | Use.   |   |
|                               | and documentation of entire solution at the locations specified as per the    | backup solution after successful Installation and integration            |   |
|                               | and documentation of entire solution at the locations specified as per the    | accontance testing and documentation of ontire colution at the           |   |
|                               | 10% of the cost of Hardware items of the Commercial Rid Form at               | locations specified as per the scope of work                             |   |
|                               | Appendix of the cost of Hardware iterns of the confinencial bid Form at       | Since there is already a Park Currentee there is no need of 10%          |   |
|                               | submitting documentation on any Configuration changes (modifications          | Internetion after Co Live  |   |
|                               | done after Go-Live and after completion of training                           |  |   |
| Clause 6.5 (Page 42)          | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be          | Request this to be amended as follows: Backup speed of 10 TB per         | Please refer to Corrigendum   |
|                               | achieved.   | hour ( for uncompressed backups ) is to be achieved.                     | 5   |
| Clause 6.5 ( Page 42)         | Table 3   | Request the Table 3 be modified accordingly as per Backup speed          | Please refer to Corrigendum   |
|                               |   | of 10 TB per hour  |   |
| Clause 7 ( Page 44)           | Project Schedule:   | Request following changes to the Project Schedule:                       | Please refer to Corrigendum   |
|                               | 1. Delivery of hardware, software, licenses etc 4 to 6 weeks                  | 1. Delivery of hardware, software, licenses etc 8 to 12 weeks            |   |
| Clause 7 ( Page 44)           | Project Schedule:   | Project Schedule:  | Please refer to Corrigendum   |
|                               | 2. Project Completion period at DC, Mumbai. installation, commissioning,      | 2. Project Completion period at DC, Mumbai. installation,                |   |
|                               | integration, testing of backup solution - 6 to 10 weeks                       | commissioning, integration, testing of backup solution - <b>16 to 17</b> |   |
|                               |   | weeks  |   |
| Clause / ( Page 44)           | Project Schedule:   | Project Schedule:  | Please refer to Corrigendum   |
|                               | 3. Project Completion period at DR Site, Bangalore Colo i.e. installation,    | 3. Project Completion period at DR Site, Bangalore Colo i.e.             |   |
|                               | commissioning, integration, testing of backup and sync solution 6 to 14       | Installation, commissioning, integration, testing of backup and          |   |
|                               | Appovuro IV/ Mapufacturor's authorization latter (i.e. MAE) from              | sync solution 16 to 17 weeks   | LIC may consider accepting the OEM Standard MAE format, provided that it          |
| Annexure 4 ( page 49)         | respective OEMs**   | and specified in the PEP. Format can be provided by each OEM             | includes all necessary undertakings and assurances required in alignment with the |
|                               |   | one specified in the KFF. Format can be provided by each OEM             | intent of the RFP. Please refer to corrigendum                                    |
|                               |   | 1  | 5   |

| Annexure – XII ( page 66) | Sr No 1.  | Request to please change "point-to-point fiber-channel network"   | Please refer to Corrigendum   |
|---------------------------|---|---|---|
|                           | The proposed Storage Appliances for each site should be capable of          | to  | 5   |
|                           | being directly mounted (at each sites ) as a partition on Exadata server by | "point-to-point optical fiber network" Or "OSEP28 Copper cables"  |   |
|                           | directly connecting Storage Appliance to Evadata Primary Database           | in place of   |   |
|                           | convers (Evadata X7-2 convers ) and Standby Database Servers (Evadata X9M   |   |   |
|                           | 2 HC converts through point to point fiber channel network connection       |   |   |
|                           | 2 HC servers) through point-to-point liber-chainer hetwork connection       |   |   |
|                           | without connecting thru current Deli unified switch (Please see proposed    |   |   |
|                           | network connection diagram under schedule-3)                                |   |   |
| Page 71 / Primary and     | The backup software must support Oracle Data Guard replication for          | Need Clarity, is backup software should manage oracle dataguard   | Backup software should be capable of taking Backups of physical standby           |
| Standby Database          | primary and standby databases.  | replication or it should work while ODG is also working on the    | databases which are in recovery mode ( which are being replicated from primary    |
| Architecture:             |   | server ?  | site through Oracle dataguard/Active Oracle Dataguard)                            |
| Page 73 / 13. Backup      | The proposed Backup Software solution must support optimized                | Requesting LIC to remove " DASH COPY" as this is vendor specific  | The specification of DASH COPY stands removed . Please refer to the corrigendum   |
| Software- Other           | secondary copy creation to a remote site via DASH copy, where only          |   | issued.   |
| Specifications            | unique data blocks is sent over the network                                 |   |   |
| Page 74 / 13. Backup      | The proposed backup software should support data-masking strategies         | Requesting LIC to remove "data-masking strategies at backup",     | Please refer to Corrigendum   |
| Software- Other           | for Oracle database table columns to hide sensitive data in a non-          | this is favouring specific vendor                                 |   |
| Specifications            | production environment, such as a test or development system.               |   |   |
| Clause 4-Page 38          | 60% of the cost of Hardware items and 80% of Software items of the          | 80% of the cost of Hardware items and 80% of Software items of    | Please refer to Corrigendum   |
|                           | Commercial Bid Format at Annexure-VI shall be paid after delivery of        | the Commercial Bid Format at Annexure-VI shall be paid after      |   |
|                           | entire solution (software, hardware, warranty & maintenance with OEM        | delivery of entire solution (software, hardware, warranty &       |   |
|                           | and peripherals as per scope) at the specified locations mentioned in the   | maintenance with OEM and peripherals as per scope) at the         |   |
|                           |   | specified locations mentioned in the PO                           |   |
|                           | 20% of the cost of Hardware items and 20% of the cost of software items     | 20% of the cost of Hardware items and 20% of the cost of software |   |
|                           | 30% of the cost of Hardware items and 20% of the cost of software items     | 20% of the cost of Haldware items and 20% of the cost of software |   |
|                           | In Annexure-vi- Commercial Bid shall be paid on Go-Live date.               | items in Annexure-vi- Commercial Bid shall be paid on Go-Live     |   |
|                           | Go-Live will be reckoned as the production implementation date backup       | date.   |   |
|                           | solution after successful installation and integration, acceptance testing  | Go-Live will be reckoned as the production implementation date    |   |
|                           | and documentation of entire solution at the locations specified as per the  | backup solution after successful Installation and integration,    |   |
|                           | scope of work.  | acceptance testing and documentation of entire solution at the    |   |
|                           | 10% of the cost of Hardware items of the Commercial Bid Form at             | locations specified as per the scope of work.                     |   |
|                           | Annexure-VI shall be paid after 3 months of Go-Live date and after          | Since there is already a Bank Guarantee there is no need of 10%   |   |
|                           | submitting documentation on any Configuration changes/ modifications        | retention after Go-Live.  |   |
|                           | done after Go-Live and after completion of training.                        |   |   |
| Clause 6.5-page 42        | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be        | Request this to be amended as follows: Backup speed of 10 TB per  | Please refer to Corrigendum   |
|                           | achieved.   | hour (for uncompressed backups) is to be achieved.                |   |
| Clause 6.5-page 42        | Table 3   | Request the Table 3 be modified accordingly as per Backup speed   | Please refer to Corrigendum   |
| Clause 7, 2000 44         | Designed Cale advited   | of IU IB per nour   |   |
| Clause 7-page 44          | 1 Delivery of bardware coffuere licenses atc. Atc 6 weeks                   | 1. Delivery of bardware coffware licenses etc. 8 to 12 weeks      |   |
| Clause 7 page 44          | T. Delivery of Hardware, software, licenses etc 4 to 6 weeks                | T. Delivery of hardware, software, licenses etc 6 to 12 weeks     | Please refer to Corrigondum   |
| Clause 7-page 44          | Project Schedule.   | Project Schedule.   |   |
|                           | 2. Project Completion period at DC, Mumbal. Installation, commissioning,    | 2. Project Completion period at DC, Mumbal. Installation,         |   |
|                           | Integration, testing of backup solution - 6 to 10 weeks                     | commissioning, integration, testing of backup solution - 12 - 20  |   |
| Clause 7-page 44          | Project Schedule:   | Project Schedule:   | Please refer to Corrigendum   |
| Clause / -page 44         | 2 Project Completion period at DP Site Paperlane Coloria inst-listics       | 2 Project Completion period at DP Site Paperlare Cale : -         | nease refer to Comgenuum  |
|                           | 5. Project completion period at DK site, Bangalore Colo I.e. Installation,  | 5. Project completion period at DK Site, Bangalore Colo I.e.      |   |
|                           | commissioning, integration, testing of backup and sync solution 6 to 14     | Installation, commissioning, integration, testing of backup and   |   |
| A                         | Weeks   | sync solution 12 - 28 weeks                                       |   |
| Annexure 4-page 49        | Annexure-IV: Manufacturer's authorization letter (i.e. MAF) from            | Request Lic to accept OEM standard MAF Format rather than the     | LIC may consider accepting the OEM Standard MAF format, provided that it          |
|                           | respective OEMs."   | one specified in the RFP. Format can be provided by each OEM      | includes all necessary undertakings and assurances required in alignment with the |
| Appeyure - XII-page 66    | Sr No 1   | Request to please change "point-to-point fiber-chapped potwork"   | Please refer to Corrigendum   |
| Annexure - An-page 00     | The proposed Storage Appliances for each site should be capable of          | to  |   |
|                           | he proposed storage Appliances for each site should be capable of           | "point to point optical fiber potwork" Or "OCED29 Compared to the |   |
|                           | being unectly mounted (at each sites ) as a partition on Exadata server by  | point-to-point optical liber network" Or "QSFP28 Copper cables"   |   |
|                           | urectly connecting Storage Appliance to Exadata Primary Database            | in place of   |   |
|                           | servers (Exadata X7-2servers ) and Standby Database Servers(Exadata X9M     |   |   |
|                           | 2 HC servers) through point-to-point fiber-channel network connection       |   |   |
|                           | without connecting thru current Dell unified switch (Please see proposed    |   |   |
|                           | network connection diagram under schedule-3)                                |   |   |

| Section B-page 9   | Bidder must have minimum turnover of Rs 100                                | Kindly change the turnover requirement to "Average 45 crores" for | Please refer to Corrigendum   |
|--------------------|--|---|---|
| beenion b page 5   | Crores in each of the following three financial years                      | the last 3 years for MSME bidders                                 |   |
|                    | i e 2021-2022 2022-2023 2023-2024 Bidder                                   |   |   |
|                    | should have made profit (before tax) in each of the                        |   |   |
|                    | following three financial year's i.e. 2021-2022 and                        |   |   |
|                    | 2022_2023_2023_2024  |   |   |
| Section B-page 10  | Bidder must have supplied and configured Backup                            | Kindly relax this clause for MSME bidders or reduce the number of | No Change . Please be guided by RFP conditions                                    |
|                    | solutions involving Backup Storage (Appliance),                            | customers from 5 to 1   |   |
|                    | Backup software and LTO Tape libraries to at least 5                       |   |   |
|                    | customers, In the last 5 financial years preceding                         |   |   |
|                    | the date of this RFP. At least three among these                           |   |   |
|                    | should be provided to Government   |   |   |
|                    | Departments/PSU/BFSI sector companies.                                     |   |   |
| Section B-page 10  | Bidder must have experience in maintaining the                             | Kindly relax this clause for MSME bidders or reduce the number of | No Change . Please be guided by RFP conditions and corrigendum.                   |
|                    | backup solution for 3 different entities in the last                       | customers from 3 to 1. Also please allow customer letter as proof |   |
|                    | three years. All should be from Govt Dept /PSU /                           | in lieu of purchase order.  |   |
|                    | BFSI Sector.   |   |   |
| Clause 4-page 38   | 60% of the cost of Hardware items and 80% of Software items of the         | 80% of the cost of Hardware items and 80% of Software items of    | Please refer to Corrigendum   |
|                    | Commercial Bid Format at Annexure-VI shall be paid after delivery of       | the Commercial Bid Format at Annexure-VI shall be paid after      |   |
|                    | entire solution (software, hardware, warranty & maintenance with OEM       | delivery of entire solution (software, hardware, warranty &       |   |
|                    | and peripherals as per scope) at the specified locations mentioned in the  | maintenance with OEM and peripherals as per scope) at the         |   |
|                    | PO.  | specified locations mentioned in the PO.                          |   |
|                    | 30% of the cost of Hardware items and 20% of the cost of software items    | 20% of the cost of Hardware items and 20% of the cost of software |   |
|                    | in Annexure-VI- Commercial Bid shall be paid on Go-Live date.              | items in Annexure-VI- Commercial Bid shall be paid on Go-Live     |   |
|                    | Go-Live will be reckoned as the production implementation date backup      | date.   |   |
|                    | solution after successful Installation and integration, acceptance testing | Go-Live will be reckoned as the production implementation date    |   |
|                    | and documentation of entire solution at the locations specified as per the | backup solution after successful Installation and integration,    |   |
|                    | scope of work.   | acceptance testing and documentation of entire solution at the    |   |
|                    | 10% of the cost of Hardware items of the Commercial Bid Form at            | locations specified as per the scope of work.                     |   |
|                    | Annexure-VI shall be paid after 3 months of Go-Live date and after         | Since there is already a Bank Guarantee there is no need of 10%   |   |
|                    | submitting documentation on any Configuration changes/ modifications       | retention after Go-Live.  |   |
|                    | done after Go-Live and after completion of training.                       |   |   |
| Clause 6.5-page 42 | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be       | Request this to be amended as follows: Backup speed of 10 TB per  | Please refer to Corrigendum   |
|                    | achieved.  | hour ( for uncompressed backups ) is to be achieved.              |   |
| Clause 6.5-page 42 | Table 3  | Request the Table 3 be modified accordingly as per Backup speed   | Please refer to Corrigendum   |
|                    |  | of 10 TB per hour   |   |
| Clause 7-page 44   | Project Schedule:  | Request following changes to the Project Schedule:                | Please refer to Corrigendum   |
|                    | 1. Delivery of hardware, software, licenses etc 4 to 6 weeks               | 1. Delivery of hardware, software, licenses etc 8 to 12 weeks     |   |
| Clause 7-page 44   | Project Schedule:  | Project Schedule:   | Please refer to Corrigendum   |
|                    | 2. Project Completion period at DC, Mumbai. installation, commissioning,   | 2. Project Completion period at DC, Mumbai. installation,         |   |
|                    | integration, testing of backup solution - 6 to 10 weeks                    | commissioning, integration, testing of backup solution - 6 to 10  |   |
|                    |  | weeks (Partner to suggest this appropriately)                     |   |
| Clause 7-page 44   | Project Schedule:  | Project Schedule:   | Please refer to Corrigendum   |
|                    | 3. Project Completion period at DR Site, Bangalore Colo i.e. installation, | 3. Project Completion period at DR Site, Bangalore Colo i.e.      |   |
|                    | commissioning, integration, testing of backup and sync solution 6 to 14    | installation, commissioning, integration, testing of backup and   |   |
|                    | weeks  | sync solution 6 to 14 weeks (Partner to suggest this              |   |
|                    |  | appropriately)  |   |
| Annexure 4-page 49 | Annexure-IV: Manufacturer's authorization letter (i.e. MAF) from           | Request LIC to accept OEM Standard MAF Format rather than the     | LIC may consider accepting the OEM Standard MAF format, provided that it          |
|                    | respective OEMs**  | one specified in the RFP. Format can be provided by each OEM      | includes all necessary undertakings and assurances required in alignment with the |
|                    |  |   | intent of the RFP. Please refer to the Corrigendum issued.                        |
| 1                  |  |   |   |

| Annexure – XII-page 66                                    | Sr No 1<br>The proposed Storage Appliances for each site should be capable of<br>being directly mounted (at each sites) as a partition on Exadata server by<br>directly connecting Storage Appliance to Exadata Primary Database<br>servers (Exadata X7-2servers) and Standby Database Servers(Exadata X9M<br>2 HC servers) through point-to-point fiber-channel network connection<br>without connecting thru current Dell unified switch (Please see proposed<br>network connection diagram under schedule-3)  | Request to please change "point-to-point fiber-channel network"<br>to<br>"point-to-point optical fiber network" Or "QSFP28 Copper cables"<br>in place of | Please refer to Corrigendum   |
|---|--|--|---|
| 34, 2.22 insurance-page<br>34                             | Obligation to Maintain Insurance<br>In connection with the provision of the Services, the Vendor must have<br>and maintain for the Contract Period, valid and enforceable insurance<br>policies for: public liability; either professional indemnity or errors and<br>omissions; workers' compensation as required by law.   | Please explain coverage area for Public Liability, Professional<br>Indemnity Worker's Compensation.  | Public Liability Insurance: Should cover liabilities arising from third-party bodily<br>injury, property damage, or other claims occurring in connection with the services<br>provided.<br>Professional Indemnity (or Errors & Omissions) Insurance: Should cover claims<br>related to professional negligence, errors, or omissions in the services delivered by<br>the Vendor.<br>Workers' Compensation Insurance: Should comply with applicable labor laws and<br>provide coverage for employee injuries, medical expenses, and compensation as<br>per statutory requirements. |
| 4,Payment Terms   | 60% of the cost of Hardware items and 80% of Software items of the<br>Commercial Bid Format at Annexure-VI shall be paid after delivery of<br>entire solution (software, hardware, warranty & maintenance with OEM<br>and peripherals as per scope) at the specified locations mentioned in the<br>PO.   | Please align Hardware items payment term with Software items payment terms.  | Please refer to corrigendum   |
| System Uptime required<br>and its applicable<br>penalties | System Uptime required and its applicable penalties Penalty cap for a<br>quarter shall be a maximum of 15% of the Total AMC Bill for a quarter.<br>Penalty will be deducted from any amount payable to the Vendor or<br>invoking the performance Bank Guarantee  | 15% Penalty cap is on higerside please revise it to 5%   | Please refer to corrigendum   |
| 8. Liquidated damages<br>page 44                          | 8. Liquidated damages<br>If Service Provider fails to deliver product and/or perform any or all the<br>Services within the stipulated time, schedule as specified in this<br>Agreement, LIC may, without prejudice to its other remedies under the<br>Agreement, and unless otherwise extension of time is agreed upon<br>without the application of liquidated damages, deduct from the Project<br>Cost, as liquidated damages a sum equivalent to 12 % of total Project Cost<br>for delay of each week or part thereof maximum up to 100 % of total<br>Project Cost. Once the maximum deduction is reached, LIC may consider<br>termination of the Agreement | 12% Penalty cap is on higerside please revise it to 5%   | Please refer to corrigendum   |
| 2.34 page 36  | Addition and Deletion in Inventory:<br>Based on the movement/ shifting/Buyback of Hardware items or due to<br>any other reasons, there may be addition or removal of Hardware items in<br>the AMC Inventory of the Vendor where the possibility is remote. Such<br>changes will be affected in the Hardware Inventory will be informed to the<br>Vendor. The AMC for such Hardware items will be calculated on pro-rata<br>basis for the effective period. However, such situations will be remote<br>wherein a new hardware will be added in the existing setup.  | Whether the vendor has to support any additional items in the AMC other than the mentioned BOM supplied through this tender?                             | Bidder has to provide AMC for the items supplied by him under this RFP as per the RFP terms anc conditions mentioned .  |
| 3.1 Maintenance and<br>servicing page 36                  | b) Spares, consumables and support for the hardware should be made available from Principal Vendor (OEM).  | Whether all the support calls to be attended by OEM engineers?   | No. Support calls will be registered with Vendor  |
| 3.1 Maintenance and<br>servicing page 37                  | g) Wherever any system has to be shifted from one LIC location to<br>another, as decided by LIC, the Vendor is required to uninstall / reinstall<br>and maintain the system/s at the new location, without any extra cost on<br>account of reinstallation.   | Assume the shifting charges shall be borne by LIC, kindly confirm.   | Shifting charges will be borne by LIC   |
|   | General Query  | Any training to be provided to LIC team?<br>Kindly share the details   | Please refer to corrigendum   |

| Clause 4 page 38       | 60% of the cost of Hardware items and 80% of Software items of the          | 80% of the cost of Hardware items and 80% of Software items of    | Please refer to Corrigendum   |
|------------------------|---|---|---|
|                        | Commercial Bid Format at Annexure-VI shall be paid after delivery of        | the Commercial Bid Format at Annexure-VI shall be paid after      |   |
|                        | entire solution (software, hardware, warranty & maintenance with OEM        | delivery of entire solution (software, hardware, warranty &       |   |
|                        | and peripherals as per scope) at the specified locations mentioned in the   | maintenance with OEM and peripherals as per scope) at the         |   |
|                        | PO.   | specified locations mentioned in the PO.                          |   |
|                        | 30% of the cost of Hardware items and 20% of the cost of software items     | 20% of the cost of Hardware items and 20% of the cost of software |   |
|                        | in Annexure-VI- Commercial Bid shall be paid on Go-Live date.               | items in Annexure-VI- Commercial Bid shall be paid on Go-Live     |   |
|                        | Go-Live will be reckoned as the production implementation date backup       | date.   |   |
|                        | solution after successful Installation and integration, acceptance testing  | Go-Live will be reckoned as the production implementation date    |   |
|                        | and documentation of entire solution at the locations specified as per the  | backup solution after successful Installation and integration,    |   |
|                        | scope of work.  | acceptance testing and documentation of entire solution at the    |   |
|                        | 10% of the cost of Hardware items of the Commercial Bid Form at             | locations specified as per the scope of work.                     |   |
|                        | Annexure-VI shall be paid after 3 months of Go-Live date and after          | Since there is already a Bank Guarantee there is no need of 10%   |   |
|                        | submitting documentation on any Configuration changes/ modifications        | retention after Go-Live.  |   |
|                        | done after Go-Live and after completion of training.                        |   |   |
| Clause 6.5 Page 42     | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be        | Request this to be amended as follows: Backup speed of 10 TB per  | Please refer to Corrigendum   |
|                        | achieved.   | hour ( for uncompressed backups ) is to be achieved.              |   |
| Clause 6.5 page 42     | Table 3   | Request the Table 3 be modified accordingly as per Backup speed   | Please refer to Corrigendum   |
|                        |   | of 10 TB per hour   |   |
| Clause 7 page 44       | Project Schedule:   | Request following changes to the Project Schedule:                | Please refer to Corrigendum   |
|                        | 1. Delivery of hardware, software, licenses etc 4 to 6 weeks                | 1. Delivery of hardware, software, licenses etc 8 to 12 weeks     |   |
| Clause 7 page 44       | Project Schedule:   | Project Schedule:   | Please refer to Corrigendum   |
|                        | 2. Project Completion period at DC, Mumbai. installation, commissioning,    | 2. Project Completion period at DC, Mumbai. installation,         |   |
|                        | integration, testing of backup solution - 6 to 10 weeks                     | commissioning, integration, testing of backup solution - 6 to 12  |   |
|                        |   | weeks   |   |
| Clause 7 page 44       | Project Schedule:   | Project Schedule:   | Please refer to Corrigendum   |
|                        | 3. Project Completion period at DR Site, Bangalore Colo i.e. installation,  | 3. Project Completion period at DR Site, Bangalore Colo i.e.      |   |
|                        | commissioning, integration, testing of backup and sync solution 6 to 14     | installation, commissioning, integration, testing of backup and   |   |
|                        | weeks   | sync solution 6 to 16 weeks                                       |   |
| Annexure 4 page 49     | Annexure-IV: Manufacturer's authorization letter (i.e. MAF) from            | Request LIC to accept OEM Standard MAF Format rather than the     | LIC may consider accepting the OEM Standard MAF format, provided that it          |
|                        | respective OEMs**   | one specified in the RFP. Format can be provided by each OEM      | includes all necessary undertakings and assurances required in alignment with the |
|                        |   |   | intent of the RFP. Please refer to the Corrigendum issued.                        |
| A                      |   |   |   |
| Annexure – XII page 66 |   | Request to please change "point-to-point fiber-channel network"   | Please refer to Corrigendum   |
|                        | The proposed Storage Appliances for each site should be capable of          |   |   |
|                        | being directly mounted (at each sites ) as a partition on Exadata server by | "point-to-point optical fiber network" Or "QSFP28 Copper cables"  |   |
|                        | directly connecting Storage Appliance to Exadata Primary Database           | in place of   |   |
|                        | servers (Exadata X7-2servers ) and Standby Database Servers (Exadata X9M    |   |   |
|                        | 2 HC servers) through point-to-point fiber-channel network connection       |   |   |
|                        | without connecting thru current Dell unified switch (Please see proposed    |   |   |
|                        | network connection diagram under schedule-3)                                |   |   |
| Clause 4 Page 38       | 60% of the cost of Hardware items and 80% of Software items of the          | 80% of the cost of Hardware items and 80% of Software items of    | Please refer to Corrigendum   |
|                        | Commercial Bid Format at Annexure-VI shall be paid after delivery of        | the Commercial Bid Format at Annexure-VI shall be paid after      |   |
|                        | entire solution (software, hardware, warranty & maintenance with OEM        | delivery of entire solution (software, hardware, warranty &       |   |
|                        | and peripherals as per scope) at the specified locations mentioned in the   | maintenance with OEM and peripherals as per scope) at the         |   |
|                        | PO.   | specified locations mentioned in the PO.                          |   |
|                        | 30% of the cost of Hardware items and 20% of the cost of software items     | 20% of the cost of Hardware items and 20% of the cost of software |   |
|                        | in Annexure-VI- Commercial Bid shall be paid on Go-Live date.               | items in Annexure-VI- Commercial Bid shall be paid on Go-Live     |   |
|                        | Go-Live will be reckoned as the production implementation date backup       | date.   |   |
|                        | solution after successful Installation and integration, acceptance testing  | Go-Live will be reckoned as the production implementation date    |   |
|                        | and documentation of entire solution at the locations specified as per the  | backup solution after successful Installation and integration     |   |
|                        | scope of work.  | acceptance testing and documentation of entire solution at the    |   |
|                        | 10% of the cost of Hardware items of the Commercial Bid Form at             | locations specified as per the scope of work                      |   |
|                        | Annexure-VI shall be paid after 3 months of Go-Live date and after          | Since there is already a Bank Guarantee there is no need of 10%   |   |
|                        | submitting documentation on any Configuration changes/ modifications        | retention after Go-Live   |   |
|                        | done after Go-Live and after completion of training                         |   |   |
| Clause 6.5 Page 42     | Backup speed is 12 TB per hour ( for uncompressed backups ) is to be        | Request this to be amended as follows: Backup speed of 10 TB per  | Please refer to Corrigendum   |
|                        | achieved.   | hour ( for uncompressed backups ) is to be achieved.              |   |
|                        |   |   |   |

| Clause 6.5 page 42  | Table 3   | Request the Table 3 be modified accordingly as per Backup speed<br>of 10 TB per hour   | Please refer to Corrigendum   |
|---|---|--|---|
| Clause 7 page 44  | Project Schedule:<br>1. Delivery of hardware, software, licenses etc 4 to 6 weeks   | Request following changes to the Project Schedule:<br>1. Delivery of hardware, software, licenses etc 8 to 12 weeks  | Please refer to Corrigendum   |
| Clause 7 page 44  | Project Schedule:<br>2. Project Completion period at DC, Mumbai. installation, commissioning,<br>integration, testing of backup solution - 6 to 10 weeks  | Project Schedule:<br>2. Project Completion period at DC, Mumbai. installation,<br>commissioning, integration, testing of backup solution - 6 to 10<br>weeks (Partner to suggest this appropriately)                            | Please refer to Corrigendum   |
| Clause 7 page 44  | Project Schedule:<br>3. Project Completion period at DR Site, Bangalore Colo i.e. installation,<br>commissioning, integration, testing of backup and sync solution 6 to 14<br>weeks   | Project Schedule:<br>3. Project Completion period at DR Site, Bangalore Colo i.e.<br>installation, commissioning, integration, testing of backup and<br>sync solution 6 to 14 weeks (Partner to suggest this<br>appropriately) | Please refer to Corrigendum   |
| Annexure 4 page 44  | Annexure-IV: Manufacturer's authorization letter (i.e. MAF) from respective OEMs**  | Request LIC to accept OEM Standard MAF Format rather than the<br>one specified in the RFP. Format can be provided by each OEM  | LIC may consider accepting the OEM Standard MAF format, provided that it<br>includes all necessary undertakings and assurances required in alignment with the<br>intent of the RFP. Please refer to the Corrigendum issued. |
| Annexure – XII page 66  | Sr No 1<br>The proposed Storage Appliances for each site should be capable of<br>being directly mounted (at each sites ) as a partition on Exadata server by<br>directly connecting Storage Appliance to Exadata Primary Database<br>servers (Exadata X7-2servers ) and Standby Database Servers(Exadata X9M<br>2 HC servers) through point-to-point fiber-channel network connection<br>without connecting thru current Dell unified switch (Please see proposed<br>network connection diagram under schedule-3) | Request to please change "point-to-point fiber-channel network"<br>to<br>"point-to-point optical fiber network" Or "QSFP28 Copper cables"<br>in place of   | Please refer to Corrigendum   |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 67 RFP Point -c)<br>Scalability and<br>Connectivity,sub-point- 5                              | The storage system must support 22TB SAS-3 7.2K RPM hard disk drive.  | Please confirm if an 8TB disk size across the entire enclosure is acceptable. As this configuration may be vendor-specific.  | The specification is modified as<br>The storage system must support 22 TB or higher capacity SAS-3 hard disk drive.<br>Please refer to the corrigendum issued.  |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 68 RFP Point -d)<br>Software Features and<br>Backup Services<br>requirements,sub-point-<br>16 | The storage system support replication on-disk compressed data as is over the write, node compression/recompression when doing replication.   | Need more Clarity on the point   | The specification means that storage system should be able to replicate<br>compressed data directly in its compressed form, without needing to decompress<br>it first during the write or replication process               |

| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 69 RFP Point -d)<br>Software Features and<br>Backup Services<br>requirements,sub-point-<br>21 | The storage should support object API for Oracle Cloud Infrastructure<br>Object Storage that enables touse the same applications on both on-<br>premises on the storage and in the cloud on Oracle Cloud Infrastructure<br>Object Storage. | To clarify your requirement, are you expecting the backup solution<br>to integration with OCI Object Storage strictly for backup and LTR<br>purposes?   | This requirement has been removed. Please refer to the Corrigendum.  |
|---|--|---|--|
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 69 RFP Point -d)<br>Software Features and<br>Backup Services<br>requirements,sub-point-<br>22 | The storage should support data retention policy on Oracle Cloud<br>Infrastructure object, snapshot, and share/file retention policies for legal<br>hold, data governance, or regulatory compliance.                                       | Need more Clarity on the point. Could you please clarify whether<br>you expect the backup solution itself to manage and enforce<br>retention, legal hold, and governance policies directly within<br>Oracle Cloud Infrastructure services (such as object storage,<br>snapshots, and file shares) as these features are typically handled<br>through OCI's built-in data governance tools, which can be used in<br>parallel with backup solution.   | Storage system should support object store in public cloud which will support retention policies for legal hold , governance policies and regulatory compliance  |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 69 RFP Point -e)<br>Monitoring, Notification<br>and Management,sub-<br>point-3                | The storage system must support dynamic change configuration (no<br>downtime). For example, segment/block size change, enable/disable SSD<br>resource, enable/disable compression & de-duplication.  | Once the Deduplication or Compression is enabled, disabling may<br>impact the backup set.<br>Remove enable/disable compression & deduplication.   | This requirement has been removed.<br>Please refer to the Corrigendum.   |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 69 RFP Point -e)<br>Monitoring, Notification<br>and Management, sub-<br>point-6               | The storage system should support discovery, management and configuration using the iSNS protocol.   | Most of PBBA vendors does not rely on the iSNS protocol for<br>discovery or configuration, as it is not designed to function as an<br>iSCSI-based storage system. Instead, it provides robust storage<br>and network management capabilities through its integrated<br>management interface and APIs tailored for modern data<br>protection workflows.<br>Requesting modification to this point to state that the storage<br>system should support iSNS or an equivalent capability, such<br>as an integrated management interface and APIs designed for<br>modern data protection workflows. | The specification is modified as below<br>storage system should support iSNS or an equivalent capability, such as an<br>integrated management interface and APIs designed for modern data protection<br>workflows. Please refer to the corrigendum issued. |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 69 RFP Point -f) Data<br>Protection Features,sub-<br>point-4                                  | The storage system should support multi-pathing - IP multi-pathing (IPMP) and I/O multi-pathing to Disk arrays.  | Most of the Vendors supports multi-pathing ensuring high<br>availability and path failover. This point referring to IPMP is more<br>vendor specific (solaris).<br>Instead the storage appliance should offers network<br>redundancy and load balancing through interface bonding,<br>achieving comparable resilience for network connectivity.  | No change in requirement. Please be guided by RFP.<br>IPMP and I/O multi-pathing is expected to be an inherent feature of Storage<br>appliance for performance and Bandwidth utilization.  |

| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 70 RFP Point -f) Data<br>Protection Features,sub-<br>point-8  | The storage system should support independent retention policies for auto generated snapshots on Source and target.  | Need more Clarity on the point   | This specification means that Each storage snapshot generated should allow<br>independent retention policies to be applied.   |
|---|--|--|---|
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 71 RFP Point -2.<br>Backup software<br>specifications,sub-point-<br>5. Retention Policies and<br>Backup Management: | RMAN retention policies should take precedence over backup software policies   | In backup solution, backup image retention is governed by backup<br>policies. While RMAN can specify retention expectations, the<br>actual retention is enforced by backup solution.<br>To align both systems, it is recommended to configure backup<br>retention settings to match or exceed RMAN's retention<br>policies | No change in requirement. Please be guided by RFP.<br>When Oracle RMAN is interfaced with Backup software , the backup software<br>should have configuration to allow RMAN retention policies to dominate over<br>Backup software retention policies  |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 71 RFP Point -2.<br>Backup software<br>specifications,sub-point-<br>5. Retention Policies and<br>Backup Management: | The backup software should support configuration for RMAN retention<br>policies (e.g., recovery window, redundancy) to override the retention<br>policies of backup software | In backup solution, backup image retention is governed by backup<br>policies. While RMAN can specify retention expectations, the<br>actual retention is enforced by backup solution.<br>To align both systems, it is recommended to configure backup<br>retention settings to match or exceed RMAN's retention<br>policies | No change in requirement. Please be guided by RFP.<br>When Oracle RMAN is interfaced with Backup software , the backup software<br>should have configuration to allow RMAN retention policies to dominate over<br>Backup software retention policies  |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 71 RFP Point -2.<br>Backup software<br>specifications,sub-point-<br>5. Retention Policies and<br>Backup Management: | Maintenance tasks like cross-check and delete obsolete should be scheduled and configured within the backup software.  | RMAN maintenance tasks such as CROSSCHECK and DELETE<br>OBSOLETE are Oracle-specific operations and are typically<br>managed within the Oracle environment.<br>Backup solution can be integrated via scheduled through<br>Oracle tools or system-level schedulers, ensuring consistent<br>and automated maintenance        | No change in requirements . Please be guided by RFP.<br>In scenarios where RMAN is interfaced with Backup software , the Backup software<br>should have the capability to configure the scheduling and execution of all RMAN<br>backup maintenance activities like crosscheck backup , delete obsolete etc. |

| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 74 RFP Point -13.<br>Backup Software- Other<br>Specifications,sub-point-<br>13. Backup Software-<br>Other Specifications  | The proposed backup software should support data-masking strategies<br>for Oracle database table columns to hide sensitive data in a non-<br>production environment, such as a test or development system.  | Data masking is typically handled at the database layer using<br>Oracle's Data Masking and Subsetting tools or third-party<br>solutions.<br>Need to remove the point.   | Please refer to Corrigendum   |
|---|---|---|---|
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 74 RFP Point -13.<br>Backup Software- Other<br>Specifications,sub-point-<br>13. Backup Software-<br>Other Specifications  | The proposed software should have a security dashboard with cyber<br>security<br>solution that includes:<br>(a) Machine-learning-based prevention mechanism to prevent against<br>cyber threats.<br>(b) Behaviour analysis for ransomware detection and protection with<br>encryption<br>rollback.<br>(c) Ransomware protection and Malware detection functionality<br>(d) Alert mechanism in the event of detection of any anomaly | Backup solution should be focussed on rapid recovery of clean<br>backup copies to minimize impact and restore operations securely.<br>Hence modify the point to just<br>:(b) Behaviour analysis for ransomware detection  | No change in requirement. Please be guided by the RFP   |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 77 RFP Point - "3.<br>Media Server<br>specifications -<br>Description of<br>Requirement", sub-point-<br>Firmware security | For firmware security, system should support remote management chip<br>creating a fingerprint in the silicon, preventing servers from booting up<br>unless the firmware matches the fingerprint. This feature should be<br>immutable  | Most of PBBA vendors might not natively implement silicon-based<br>firmware fingerprinting or prevent boot based on immutable<br>firmware signatures. However, the appliance is built on enterprise-<br>class hardware that may include platform-level security features<br>from the OEM (e.g., secure boot, firmware verification).<br>Hence the point needs modification as<br>For firmware security, system should support remote<br>management chip creating a fingerprint in the silicon,<br>preventing servers from booting up unless the firmware<br>matches the fingerprint or equivalent capacility like secure<br>boot and firmware verification. The appliance should support<br>lockdown capaibilities. | The requirement pertains to Media Servers, not PBBA.<br>No change in requirement. Please be guided by specifications in RFP   |
| Annexure – XII: Technical<br>Requirements for RFP for<br>procurement of Backup<br>solution for ODS project<br>of LIC of India<br>Pg 78 RFP Point - "3.<br>Media Server<br>specifications -<br>Description of<br>Requirement" sub point-<br>Server Management  | Zero Touch Provisioning (ZTP) using SSDP with remote access   | Need more clarity   | No change in requirement. Please be guided by the specifications mentioned in<br>RFP.<br>ZTP is an automated process that configures a network device without requiring<br>any interaction from the user, except for physically connecting the device to the<br>network and powering it on. |

| Backup<br>Appliance/Storage<br>technical specifications-<br>Page No.66,Clause No.1                | The proposed Storage Appliances for each site should be capable of<br>being directly mounted (at each sites) as a partition on Exadata server by<br>directly connecting Storage Appliance to Exadata Primary Database<br>servers (Exadata X7-2servers) and Standby Database Servers(Exadata X9M<br>2 HC servers)                             | The Current exadata setup intigrated with recovery appliance only<br>or other DB also Intigrated with appliance need DBs details which<br>intigrate with Appliance | In the existing setup , all database backups are taken to Dell appliance DD6800<br>which is connected through Dell unified switch . The databases being backed up<br>are Production database, SMS database, UAT database and Catalog Database at<br>each locations to existing local Backup Appliance DD6800 |
|---|--|--|--|
| Backup<br>Appliance/Storage<br>technical specifications-<br>Page No.67,Clause No.8                | The proposed Storage system should be certified by Oracle to work with Oracle Exadata systems  | Exact how much usable storage required for backup Solution   | Please refer to RFP page no-74 -1Backup Appliance/Storage technical specifications-1(g) other features-<br>"Storage Capacity 340 TB Usable RAID(1/0) Or Mirror"  |
| Scalability and<br>Connectivity,Page<br>No.67,Clause No.7   | The storage system should be mountable on existing Exadata X7-2 rack at<br>Primary site and Exadata X9M-2-HC rack at DR site   | Recovery applince will be separate rack so Space should be available in Datacenter   | The entire backup solution hardware should fit in available 24 U rack space under<br>Non-exadata rack( rack space available after decommissioning the existing Backup<br>system components).<br>Please refer to the Corrigendum issued.  |
| Software Features and<br>Backup Services<br>requirements-Page<br>No.68.Clause No.4                | The storage system should be able to backup Transparent Data Encrypted<br>enabled database's backup of Oracle Databases using Oracle RMAN<br>backup  | Data Backup and Restoration connectivity required SAN also   | Please refer to Annexure-XII -Technical Requirements-a) General features -1.<br>Backup Appliance/Storage technical specifications. Point 1 and 2.<br>Please refer to corrigendum issued on point-to-point connectivity   |
| Monitoring, Notification<br>and Management.Page<br>No.69,Clause No.4                              | The storage system should provide automated serviceability using Call<br>Home feature  | Recovery Appliance intigrate with enterprise manager for Alerting  | No change in requirements. Please be guided by RFP .<br>Automated serviciability using Call Home facility to be provided as feature in<br>respective product   |
| Monitoring, Notification<br>and Management.Page<br>No.69,Clause No.9                              | The storage system must provide or support a single management<br>console to manage both cloud and on-prem environments that allows<br>administrators to manage their Storage resources in the cloud along with<br>their on-premises resources, providing a unified management platform for<br>distributed cloud environments                | want to know Cloud DB Runing in your environment   | Currently there are no Cloud DBs.<br>Requirement is for futuristic needs.  |
| Recovery Appliance.Page<br>No.70- Clause No.1   | capabilities. At least should support virus scanning and quarantine<br>capabilities. At least should support popular anti-virus software like<br>Symantec, McAfee, CA etc.   | Recovery appliance no need to installed Anivires it has incrypted<br>backup  | This is Security audit & compliance requirement.<br>No change in requirement.Please be guided by RFP.  |
| Recovery Appliance,Page<br>No.70,Clause No.2  | Backup and Recovery for Oracle Database and Flat Files   | File system Backup also required   | Please refer to RFP for requirement on flat file backups   |
| Primary and Standby<br>Database<br>Architecture:Page<br>No.71,Clause No.3                         | Backup should be executed through direct Optical Fiber connections<br>between Exadata servers and storage appliances (disk-to-disk).   | Recovery Appliace connecting through Network or SAN  | Please refer to Annexure-XII -Technical Requirements-a) General features -1.<br>Backup Appliance/Storage technical specifications. Point 1 and 2.<br>Please refer to corrigendum issued on point-to-point connectivity   |
|   |  |  |  |
| Pre-bid Queries raised P  | re-bid during meeting held on 28.03.2024   |  |  |
| RFP Document<br>Reference(s)<br>(Section & Page<br>Number)  | Clause (in brief) of RFP requiring clarification(s)  | Brief details/ Query in reference to the clause  | LIC Response   |
| Section B Minimum<br>Eligibility Criteria (MEC)<br>[Stage I Evaluation] Point<br>(3) Page No - 10 | Bidder must have supplied and configured Backup solutions involving<br>Backup Storage (Appliance), Backup software and LTO Tape libraries to at<br>least 5 customers, In the last 5 financial years preceding the date of this<br>RFP. At least three among these should be provided to Government<br>Departments/PSU/BFSI sector companies. | Relaxation of eligibility Criteria from 5 to 3 customers.  | Please be guided by the RFP.   |
| Annexure – XII 1(d) Point<br>No-21 Page No- 69  | The storage should support object API for Oracle Cloud Infrastructure<br>Object Storage that enables touse the same applications on both on-<br>premises on the storage and in the cloud on Oracle Cloud Infrastructure<br>Object Storage  | Clarification Asked  | This requirement is removed. Please refer to Corrigendum.  |
| Annexure – XII 1(d) Point<br>No-22 Page No-69   | The storage should support data retention policy on Oracle Cloud<br>Infrastructure object, snapshot, and share/file retention policies for legal<br>hold, data governance, or regulatory compliance.   | Clarification Asked  | Storage system should support object store in public cloud which will support retention policies for legal hold , governance policies and regulatory compliance  |
| Annexure – XII 1(e) Point<br>No-3 Page No-69  | The storage system must support dynamic change configuration (no downtime). For example, segment/block size change, enable/disable SSD resource, enable/disable compression & de-duplication.  | Clarification Asked  | This requirement is removed. Please refer to Corrigendum.  |

| Annexure - XII 1(e) Point                   | The storage system should support discovery, management and                                 | Clarification Asked  | The specification is modified as below   |
|---|---|--|--|
| No-6 Page No-69                             | configuration using the iSNS protocol.  |  | storage system should support iSNS or an equivalent capability, such as an         |
|   |   |  | integrated management interface and APIs designed for modern data protection       |
|   |   |  | workflows.   |
|   |   |  | Please refer to the corrigendum issued.  |
| Annexure – XII 1(f) Point                   | The storage system should support multi-pathing - IP multi-pathing                          | Clarification Asked  | No change in requirement. Please be guided by RFP.                                 |
| No-4 Page No-69                             | (IPMP) and I/O multi-pathing to Disk arrays.  |  | IPMP and I/O multi-pathing is expected to be an inherent feature of Storage        |
|   | , ,, ,, ,, ,, ,, <u>,</u> ,, <u>,</u> ,, <u>,</u> ,,  |  | appliance for performance and Bandwidth utilization.                               |
| Annexure – XII 1(f) Point                   | The storage system should support independent retention policies for                        | Clarification Asked  | This specification means that Each storage snapshot generated should allow         |
| No-8 Page No-70                             | autogenerated snapshots on Source and target.   |  | independent retention policies to be applied.                                      |
| Annexure – XII 2(13)<br>Page No- 74         | (b) Behaviour analysis for ransomware detection and protection with<br>encryption rollback. | Request to remove  | No change in requirement. Please be guided by RFP.                                 |
| Firmware security Point                     | Should maintain repository for firmware and drivers recipes to aid rollback                 | Clarification Asked  | No change in requirement. Please be guided by the specifications mentioned in      |
| No-2 Page No- 77                            | or patching of compromised firmware. Should also store Factory Recovery                     |  | RFP.   |
|   | recipe preloaded to rollback to factory tested secured firmware                             |  | Maintaining a repository of firmware and driver versions, along with a factory     |
|   |   |  | recovery recipe, ensures that compromised or outdated server components can be     |
|   |   |  | quickly rolled back or patched to a secure, tested state                           |
| Server Management Page                      | Zero Touch Provisioning (ZTP) using SSDP with remote access                                 | Clarification Asked  | No change in requirement. Please be guided by the specifications mentioned in      |
| No- 78                                      |   |  | RFP.   |
|   |   |  | ZTP is an automated process that configures a network device without requiring     |
|   |   |  | any interaction from the user, except for physically connecting the device to the  |
|   |   |  | network and powering it on   |
| Annexure – XII 1(d)                         | The storage system support replication on-disk compressed data as is                        | Clarification Asked  | This specification means that storage system should be able to replicate           |
| Point No- 16                                | over  |  | compressed data directly in its compressed form, without needing to decompress     |
|   | the write, node compression/recompression when doing replication.                           |  | it first during the write or replication process                                   |
|   | ······································  |  | · · · · · · · · · · · · · · · · · · ·  |
| Annexure – XII 1(a) Point                   | The storage system should be available as both an on-premises appliance                     | Clarification Asked  | No change in requirement. Please be guided by RFP.                                 |
| No- 16                                      | and a cloud image that can be installed on a compute instance to provide                    |  | Capability required for future need.   |
|   | storage   |  |  |
| Annexure – XII 1(a) Point                   | The proposed Storage system should be certified by Oracle to work with                      | Clarification Asked  | The requirement is modified as follows:  |
| No- 18                                      | Oracle Exadata systems  |  | The proposed Storage system should be compatible to work with Oracle Exadata       |
|   |   |  | systems.   |
|   |   |  | Please refer to the corrigendum issued.  |
| Schedule -1 Section - C                     | The solution should support backup data integrity validation through                        | Clarification Asked  | Solution proposed shall have the ability to verify that the backup data is correct |
| Point No - 38 Page No-                      | checksums and hash verification mechanisms.   |  | and hasn't been tampered with during the backup process or storage.                |
| Annexure – XII 2(13)                        | The proposed Integrated solution (Backup Software and De-Dupe                               |  | The requirement is modified as follows:  |
| Point No - 3 Page No- 73                    | Appliance) must be provided by a single OEM to ensure ownership of                          |  | The proposed Integrated solution (Backup Software and De-Dupe Appliance) must      |
|   | design and support. It must be with the single OEM support and must be                      |  | be provided by a single Bidder to ensure ownership of design and support. It must  |
|   | implemented by Single OEM   |  | be with the respective OFM support and must be implemented by Single Bidder        |
|   |   |  | Please refer to the corrigendum issued   |
|   |   |  | incuse refer to the configentationissued.  |
| Annexure – XII 4<br>Scalability Page No- 79 | Tape Library shall be scalable to minimum of 48 number of LTO-9 drives                      | Change 48 to 24  | No change in requirement. Please be guided by RFP                                  |
| Annexure – XII 1(13)                        | The proposed backup software should support data-masking strategies                         |  | Please refer to Corrigendum  |
| Point No - 12 Page No-                      | for Oracle database table columns to hide sensitive data in a non-                          |  | <u>.</u>   |
| 74  | production environment, such as a test or development system                                |  |  |
|   |   |  |  |
| PDLL Socket types                           | Type of sockets in PDU  |  | The Socket currently used in DC sites isEC socket PDU smaller socket C12           |
| Section B Minimum                           | Bidder must have supplied and configured Packup solutions involving                         | Bidders want to make experience in supply and configuration of | Please refer to Corrigendum issued   |
| Eligibility Criteria (MEC)                  | Packup Storage (Appliance) Packup software and LTO Tage "brander of                         | TO Tape libraries optional                                     | n lease relet to Comgenuum issueu.   |
| Eligionity Criteria (MEC)                   | backup storage (Appliance), backup software and LTO Tape libraries to at                    |  |  |
| Istage i Evaluation Point                   | least 5 customers, in the last 5 financial years preceding the date of this                 |  |  |
| (3) Page No - 10                            | IKTY. At least three among these should be provided to Government                           |  |  |
|   | Departments/PSU/BFSI sector companies.  |  |  |