ThinkSystem SR590

Balanced 2U rack server performance and memory to tackle cloud and Big Data

Powerful and Balanced

Designed for rack environments that require peak twosocket performance and sizeable memory capacity, the Lenovo ThinkSystem SR590 can tackle cloud and Big Data environments for medium and large enterprises. The SR590 is a balanced, midrange rack server that also works well for small-scale virtualization, collaboration and productivity applications, as well as caching and logging.

Two Intel® Xeon® Scalable Family processors increase agility and manage data-rich, high-demand workloads with up to a 1.5x memory bandwidth increase over the previous generation. Combined with up to 1TB of memory capacity, this enables applications to run faster and more efficiently and boosts business performance at a lower cost and higher overall value.

Flexible and Expandable

The SR590 supports up to 16 hot-swap 2.5" or 14 hotswap or simple-swap 3.5" drive bays. Up to four of the 2.5" or 3.5" bays can be AnyBay, capable of supporting not only SAS/ SATA drives, but also direct-connect NVMe drives (which bypass the SAS bus) for the ultimate in storage performance. In addition, the SR590 supports SAS and SATA HDDs and SSDs with up to 12Gb SAS throughput, as well as up to two M.2 drives for faster, more secure OS boot.

The SR590 provides storage flexibility, NIC expansion in multiple form factors, including LOM, ML2, and PCIe, and replaceable I/O riser cards for varied adapter slot configurations.

Reliable and Secure

Lenovo servers have been the most reliable in the industry for several years. They were ranked #1 yet again in the latest ITIC survey of x86 server reliability*. The SR590 is no exception, including many features that contribute to the reliability and security of the server and your all-important data.

These features result in an ideal server for proxy caching, cloud, CRM, security, virtualization, media streaming, Big Data, databases, database-driven Web serving, mail serving, and many other workloads.

Why Lenovo

ThinkSystem

Lenovo is the leading provider of x86 systems for the data center. The portfolio includes rack, tower, blade, dense and converged systems, and supports enterprise class performance, reliability and security. Lenovo also offers a full range of networking, storage, software and solutions, and comprehensive services supporting business needs throughout the IT lifecycle.





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Specifications

Form Factor	20	
Processors	Up to 2x Intel [®] Xeon [®] Platinum 150W, up to 26 cores per CPU	
Memory	Up to 1TB of 2666MHz TruDDR4 memory in 16 slots	
Expansion Slots	Up to 6x PCIe 3.0 on replaceable riser cards for multiple I/O configurations	
Drive Bays	Up to 16x 2.5" or 14x 3.5" hot-swap or up to 8x 3.5" simple-swap; optional 4x AnyBay bays	
Internal Storage	Up to: 168TB (3.5" SAS/SATA HDD); 53.8TB (3.5" SSD); 38.4TB (2.5" SAS/SATA); 122.9TB (2.5" SSD); 16TB (direct-connect 2.5" NVMe); up to 2x M.2 boot drives	
Network Interface	2 GbE ports standard; LOM interface standard; optional ML2	
NIC ports	2x GbE standard; 1x GbE dedicated management standard; optional up to 2x 1GbE, 2x 10GBase-T, or 2x 10GBase SFP+	
Power Supply	Up to 2x hot-swap/redundant 550W/750W Platinum, 750W Titanium	
High-Availability	Hot-swap HDDs/SSDs/NVMe, hot-swap PSUs and fans, light path diagnostics, PFA for all major components, ASHRAE A4 support (with limits), optional XClarity Pro with Call Home feature.	
Security Features	Locking bezel; locking top cover; TPM 2.1 standard; optional TCM	
RAID Support	Hardware RAID 0, 1, 5 standard on hot-swap models (optional hardware RAID 0, 1, 5, 50, 6, 60 for 2.5" models); Software RAID 0, 1, 5 on simple-swap 3.5" models (optional hardware RAID 0, 1, 5)	
Management	XClarity Administrator; XClarity Controller (embedded hardware); optional XClarity Pro	
OS Support	Microsoft, SUSE, Red Hat, VMware. Visitlenovopress.com/osig for details.	
Limited Warranty	1- and 3-year customer replaceable unit and onsite service, next business day 9x5, optional service upgrades	

* 2016-2017 Global Hardware, Server OS Reliability Report, ITIC; October 2016

Featured Options

16GB TruDDR4 2666MHz (2Rx8 1.2V) RDIMM Memory	U.2 1.92TB Entry NVMe PCIe 3.0 Hot- Swap SSD	10Gb 2-port SFP+ LOM
7X77A01303	7N47A00984	7ZT7A00546
Improve server performance, reliability with high- capacity memory	High-performance, low-latency drive optimized for mixed workloads	Low-cost Intel LoM available for 1Gb, 10Gb, SFP+, and RJ45 connectivity

For More Information

To learn more about the Lenovo ThinkSystem SR590, contact your Lenovo representative or Business Partner or visit www.lenovo.com/thinksystem. For detailed specifications, consult the SR590 Product Guide.



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