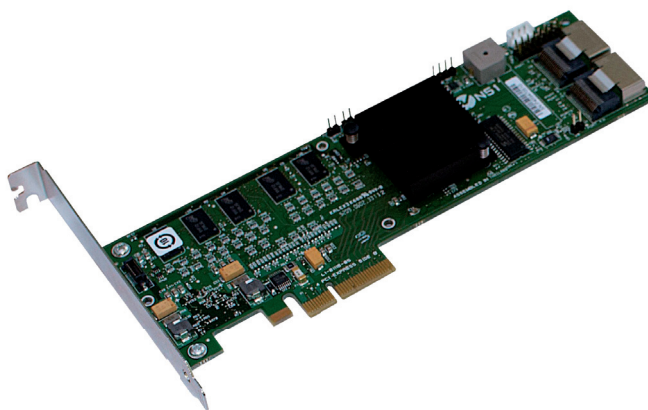


LOW-COST AND HIGH PERFORMANCE DATA PROTECTION AT YOUR FINGERTIPS



THINKSERVER® RAID OPTIONS

SMART PROTECTION, ROBUST SOLUTIONS

Keeping electronic data online 24/7 and surviving data loss only come from having robust solutions.

Designed to enhance server uptime and maintain flexibility for future growth, Lenovo's RAID options provide your business with best cost-efficient solutions and robust hardware RAID offerings.

For a low-cost solution that efficiently and easily upgrades your server, the ThinkServer SATA RAID 5 is your best option. Designed specifically for the all-in-one, workhorse ThinkServer TD230, this pluggable key provides robust data protection for up to 5 terabytes of critical data. All this without taking up any PCIe slots!

Many applications and environments demand even higher reliability and availability without compromising on performance. That's where ThinkServer hardware RAID solutions provide the best fit. Lenovo introduces the 9240-8i SAS/SATA Hardware RAID adapter that can connect up to 8 internal SAS/SATA ports at a maximum interface speed of 6G bps.

The ThinkServer 8708ELP takes availability to a higher level. Not only does this RAID adapter provide robust hardware RAID 5, 6, 10, 50 and 60, but leveraging 256MB cache and a battery kit for battery backup write back cache. This provides an additional protection to your data when your server experiences unscheduled outages.

KEY ADVANTAGES

- HIGH PERFORMANCE WITH A MAXIMUM OF 6GBPS INTERFACE SPEED
- LOW-COST, EASY SOLUTIONS FOR A SATA RAID 5 UPGRADE
- ROBUST HARDWARE RAID SOLUTIONS LEVERAGING WRITE-BACK CACHE (W/ BATTERY KIT)

TYPICAL USES AND APPLICATIONS

RAID is important for applications that leverage internal direct-attached storage that are used for file, web, database and email applications. With ThinkServer 9240-8i and 8708ELP SAS/SATA controllers, users can connect to both SATA and SAS drives – creating a cost-optimized solution that leverages SATA capacity or SAS performance.

FEATURES AND BENEFITS

ThinkServer TD230 SATA RAID 5 Upgrade Key:

- Cost-efficient and easy upgrade for software RAID 5 protection
- Does not require a PCIe slot

ThinkServer 9240-8i SAS/SATA Hardware RAID Adapter:

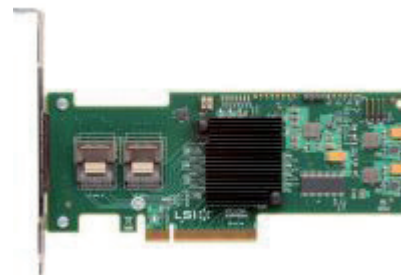
- 8 internal SATA/SAS ports
- Two x4 mini SAS Internal connectors
- RAID 0, 1, 5, 10, 50 and JBOD mode
- LSI SAS2008 Controller

ThinkServer 8708ELP SAS/SATA Hardware RAID Adapter:

- 8 internal SATA/SAS ports
- Two x4 mini SAS
- RAID 0, 1, 5, 6, 10, 50 and 60
- 256MB cache and battery kit for BBWC upgrade option
- PCIe x4

THINKSERVER® 9240-8i SAS/SATA RAID CONTROLLER

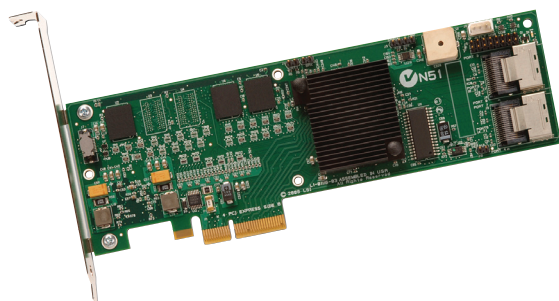
Description	<ul style="list-style-type: none"> • Low-Cost and Green SATA/SAS RAID solution for ThinkServer systems
Physical Dimensions	<ul style="list-style-type: none"> • Low-Profile (6.6" x 2.54")
Connectors	<ul style="list-style-type: none"> • 2 Internal x4 mini-SAS (SFF8087)
Drives supported	<ul style="list-style-type: none"> • Up to 8 without expanders*
Host Bus Type	<ul style="list-style-type: none"> • PCI-Express 1.0a compliant
Data Transfer Rates	<ul style="list-style-type: none"> • 6Gb/s per port*
RAID Features	<ul style="list-style-type: none"> • RAID levels 0, 1, 5, 10, 50 • Hot plug support • Global hot spare support • S.M.A.R.T support • Online Capacity Expansion • Online RAID Level Migration • Error Recovery Support
Warranty	<ul style="list-style-type: none"> • 1 year



* System dependent

THINKSERVER 8708ELP RAID CONTROLLER

Description	<ul style="list-style-type: none"> • 8-port SAS/SATA RAID solution for ThinkServer systems
Physical Dimensions	<ul style="list-style-type: none"> • Low profile, extended half-length (7.71" x 2.54")
Connectors	<ul style="list-style-type: none"> • 2 Internal mini-SAS 4i (SFF8087) connectors
Drives supported	<ul style="list-style-type: none"> • Up to 8 without expanders
Host Bus Type	<ul style="list-style-type: none"> • X4 PCI-Express 1.0a Compliant
Data Transfer Rates	<ul style="list-style-type: none"> • 3Gb/s per port
Cache Memory	<ul style="list-style-type: none"> • 667MHz DDR II SDRAM, 128MB
Battery Backup Unit	<ul style="list-style-type: none"> • Yes, Optional available from Lenovo® (67Y1495)
RAID Features	<ul style="list-style-type: none"> • RAID levels 0, 1, 5, 6, 10, 50 and 60 • Configurable stripe size up to 1MB • Hot Spare Support • Online RAID Level Management • S.M.A.R.T support
Warranty	<ul style="list-style-type: none"> • 1 year



 www.lenovo.com/thinkserver

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THERE'S MORE THINKING IN A **ThinkServer**