

SUN BLADE X6440 SERVER MODULE

KEY FEATURES

UNCOMPROMISING MULTICORE PROCESSING POWER FOR I/O- AND COMPUTE-INTENSIVE WORKLOADS

- Provides 6 MB L3 cache per processor with to Six-Core AMD Opteron processor technology
- Provides 32 DIMM slots
- Supports large memory configurations via cost-efficient 4 GB DIMMs
- Scales to 256 GB of memory using 8 GB DIMMs
- Provides 142 GB-per-second I/O to offer more than twice the I/O capacity of competing systems
- Supports Oracle Solaris 10, Linux, Windows, and VMware operating systems
- Supported by Sun Blade 6000 modular system family
- Seamless integration with Sun Blade transparent management and split-plane Dual Dynamic Power Management
- Streamlined installation and service and superior availability via Sun Blade 6000 support
- No fans or power supplies on blades

Part of Oracle's Sun Blade 6000 modular system family and supported in both the Sun Blade 6000 and 6048 modular systems, the Sun Blade X6440 server module offers significant reductions in cooling and power costs while providing the massive performance of a four-socket, enterprise-class data center workhorse. Leveraging the power of Six-Core AMD Opteron technology, blazingly fast and flexible I/O, and a large memory support, it offers the best of both rackmount and blade systems—unrivaled reliability, availability, serviceability, and scalability—without compromises.



The Sun Blade X6440 provides processing for I/O- and compute-intensive workloads.

Any Challenge, Every Workload: Sun Blade X6440 Is Up to the Task

Designed to handle challenging floating point operations and ideal for heavy-duty workloads—from Web servers to application servers, high-performance computing (HPC) to databases—the Sun Blade X6440 server module supports a vast range of applications. It also supports a broad variety of configurations, with extreme scalability, large memory footprints, and I/O flexibility, to help protect your IT investment and evolve as your business expands. The server is also well suited to data center consolidation and virtualization initiatives for Web farms and IT infrastructure, using the power of Six-Core AMD Opteron processor technology and the easy integration and leading innovation of Sun modular systems technology.

In addition, the Sun Blade X6440 server module reduces the risks associated with these initiatives by providing balanced features that help ensure maximum RAS and system performance. With hot-swappable, hot-pluggable components and transparent, streamlined management, the system is designed for the highest possible uptime. The diskless server is built on DDR2 memory and the power efficiency of AMD Opteron processors—running cooler and offering increased performance to minimize costs and emissions in the data center.

Sun Blade X6440 Server Module Specifications

Architecture		
Processor Choice		
<ul style="list-style-type: none"> Four Six-Core AMD Opteron processors, 75 W: 512 KB dedicated L2 cache per processor core, 6 MB shared L3 cache per processor 		
Main Memory		
<ul style="list-style-type: none"> An industry-leading 32 DIMM slots, supporting as much as 256 GB of memory per server module Supports 4 GB or 8 GB DDR2 667 MHz PC2-5300 ECC Registered DIMMs 		
Interfaces		
Network		
<ul style="list-style-type: none"> Two 10/100/1000 Base-T Ethernet ports using Intel 82575EB Gigabit Ethernet (GbE) Controllers One dedicated 10/100 Base-T Ethernet port for the management network 		
Storage		
<ul style="list-style-type: none"> Four SAS interfaces to the midplane, two to each PCI Express (PCIe) Network Express Module (NEM) slot IDE CompactFlash (CF) Module Interface (Type I) 		
Graphics		
Embedded graphics using the AST2000 video controller with 128 MB of shared SDRAM		
Midplane I/O		
<ul style="list-style-type: none"> Four (x8) PCIe busses, two to the NEM slots, two to the PCIe ExpressModule (EM) slots Four 3 Gb/sec SAS interfaces, two to each NEM slot Two 10/100/1000 Base-T Ethernet interfaces using Intel 82575EB GbE Controller, one interface to each NEM 10/100 Ethernet management port to the Chassis Monitoring Module (CMM) 		
Front Panel I/O (available via dongle cable)		
<ul style="list-style-type: none"> VGA graphics (DB-15 connector) Serial console to server module on-board Integrated Lights Out Manager (ILOM) Dual USB ports for keyboard, mouse, or storage 		
Software		
Operating Systems		
<ul style="list-style-type: none"> Oracle Solaris 10 Red Hat Enterprise Linux (32/64) SUSE Linux Enterprise Server (64) VMware vSphere ESX/ESXi 	<ul style="list-style-type: none"> Microsoft Windows Server 2003 (32/64) Microsoft Windows Server 2008 (32/64) 	
Networking		
<ul style="list-style-type: none"> ONC and ONC+ NFS and WebNFS TCP/IP 	<ul style="list-style-type: none"> SunLink OSI MHS 	<ul style="list-style-type: none"> IPX/SPX SMB technologies XML

Management

The Sun Blade X6440 server module employs on-board lights-out management via an embedded service processor to provide

- DMTF-style command line
- Support for SSH 2.0, HTTPS, RADIUS, LDAP, and MS Active Directory
- Browser-based GUI
- IPMI 2.0; SNMP v1, v2c, v3
- Local and remote KVM (keyboard, video, mouse) and media (CD, floppy)

Optional Sun xVM Ops Center: Generation of profiles to ensure compliance and compliance reporting, discovery and registration of data center assets, job scheduling to perform network tasks, system provisioning, and updates to Linux and Oracle Solaris

I/O Modules

The Sun Blade X6440 server module supports the following I/P module form factors:

- PCIe EMs and PCIe NEMs
- Up to two industry-standard (PCI-SIG) form factors, hot-pluggable PCIe EMs per server module
- Up to two hot-pluggable PCIe NEMs per Sun Blade 6000 modular system
- Up to eight hot-pluggable NEMs per Sun Blade 6048 modular system

Dimensions and Weight

Height: 44.45 mm (1.75 in.)	Depth: 496.82 mm (19.56 in.)
Width: 327.15 mm (12.88 in.)	Weight: 7.26 kg (16.00 lbs.); 7.90 kg (18.12 lbs.)

Warranty

Visit oracle.com/sun/warranty for Oracle's global warranty support information on Sun products.

Services

Visit oracle.com/sun/services for information on Oracle's service program offerings for Sun products.

Contact Us

For more information about Oracle's Sun Blade X6440 server module, please visit oracle.com/sun or call +1.800.ORACLE1 to speak to an Oracle representative.



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