



one tough customer

Netra™ 20 Server

RUGGED, RACK-OPTIMIZED, AND BOASTING UP TO TWO 900-MHZ PROCESSORS, IT'S THE SYSTEM THAT MAKES THE NET WORK HARDER—NO MATTER HOW INHOSPITABLE THE ENVIRONMENT

NETRA™ 20 SERVER

The Netra™ 20 server is an ideal system for rack-intensive environments where reliability and compute density are paramount and space is at a premium. These servers pack up to two UltraSPARC® III Cu processors, front-accessible components and front and back LEDs, a removable system configuration card, and many other rack-optimization features into a compact 4U form factor with a remarkably small footprint. With AC and DC powering options, these servers deliver outstanding performance in rack-intensive deployments. Combine all that with the reliable, scalable Solaris™ Operating Environment, NEBS Level-3 certification for deployment in less than ideal environments, and Lights-Out Management for simple remote monitoring from anywhere on the network, and you have an outstanding solution for space-conscious, rack-intensive deployments.

SPECIFICATIONS

PROCESSORS	
Architecture	One or two Superscalar SPARC® Version 9, 64-bit RISC UltraSPARC® III Cu processors at 900 MHz
Cache	8-MB integrated second-level cache per processor
SYSTEM BUS	
	Bus width is 576-bits running at 150 MHz with 2.4-GB/sec. bandwidth
MAIN MEMORY	
	Eight slots populated in two banks of four 256-, 512-, or 1024-MB DIMMs System configurations from 1 GB (4 x 256 MB) to 8 GB (8 x 1024 MB) ECC memory
STANDARD INTERFACES	
Network	Ethernet/FastEthernet STP (10-BaseT, 100-BaseT)
SCSI	Fast/Wide SCSI port, DB48 connector, 40 MB/sec.
FC-AL	HSSDC connector, 100 MB/sec.
Serial	Dual RS-232C/RS-423 serial ports (DB25 connector) Single LOM/console serial port (RJ45 connector)
Parallel	Single parallel port
USB	Four OHCI-compliant ports, 12 Mb/sec. each
Expansion bus	Four internal PCI 2.1-compliant expansion slots: One full-size PCI slot, 32/64-bit, 66 MHz; two full-size PCI slots, 32/64-bit, 33 MHz; one half-size PCI slot, 32/64-bit, 33 MHz
Alarms	Three fail-safe, dry-contact alarms (critical, major, minor) with external reset input, via DB15 pin connector
System configuration reader and card	For rapid transfer of system configuration between Netra 20 systems, including host ID
MASS STORAGE AND MEDIA	
Internal DVD-ROM	Optional DVD-ROM drive
Internal tape	Optional DDS-4 DAT tape drive
Internal disk	Up to two 3.5-in. x 1-in. 36-GB or 73-GB FC-AL disks, hot swap and front accessible
External disk	Sun Netra st D130, Sun Netra st A1000/D1000, Sun StorEdge™ T3 array
SOFTWARE	
Operating environment	Solaris® 8 Operating Environment
Languages	Java™ programming language; all other standard Sun-supported languages
Networking	ONC/NFS, TCP/IP, SunLink™ OSI, MHS, IPX/SPX, DCE
Management	Sun™ Management Center, SNMP/MIBS, SunVTS; SRS Ready, LOMlite 2
High availability	Sun Cluster 3.0

www.sun.com/netra

ENVIRONMENT

AC power	90-264 V AC (47-63 Hz) Maximum input power 735 W Nominal input power 418 W Nominal input current 4.685 A Nominal thermal dissipation 1313 BTU/hr. Maximum input power 683 W Nominal input power 388 W Nominal input current 1.557 A Nominal thermal dissipation 1218 BTU/hr.
240 V/63 Hz	-48 to -60 V DC (dual isolated inputs) Maximum input power 770 W Nominal input power 430.3 W Nominal input current 8.97 A Nominal thermal dissipation 1351.14 BTU/hr. Maximum input power 782 W Nominal input power 436 W Nominal input current 7.26 A Nominal thermal dissipation 1369 BTU/hr.
DC power	Operating: 5° C to 40° C (41° F to 104° F), 20% to 80% relative humidity, noncondensing, subject to a maximum absolute humidity of 0.024 kg water/kg dry air
-48 V DC	Nonoperating: -40° C to 70° C (-40° F to 104° F), 10% to 95% relative humidity, noncondensing
-60 V DC	Tape streamer: 5° C to 40° C (41° F to 104° F)
Operating	Elevation operation: Operating: -300 m to +3,000 m
Nonoperating	ETS: ETS 300-19-2-3, Table 3.1, Climatic
Tape streamer	Acoustic noise: Less than 60 dBA (GR-63-CORE Test Method)
Elevation operation	Seismic: GR-63-CORE requirements for earthquake zone 4
ETS	REGULATIONS
Acoustic noise	Meets or exceeds the following requirements:
Seismic	Safety
	UL 1950/CAS C22.2 No. 950, EN 60950 (73/23/EEC), IEC 950, CCIB for PSU, GOSTMark
	Emissions
	CFR Title 47 FCC Part 15, EN 55022 (89/336/EEC)
	Immunity
	EN 50082-1 (89/336/EEC)
	Certifications
	Safety
	EMC
	cULus Mark, TUV GS Mark, CE Mark, CE Mark, (93/68/EEC), FCC authorized Class A, VCCI, BSMI, CTICK, DC only
	NEBS Level-3
	DIMENSIONS AND WEIGHT
Chassis	
Height	17.70 cm (6.97 in.)
Width	43.50 cm (17.13 in.)
Depth	49.60 cm (19.53 in.)
Weight	27.30 kg (60.00 lb.)
Enclosure	Fits 19-, 23-, 24-in., and 600-mm racks

NETRA RACK-OPTIMIZED SERVICES PLATFORMS



Netra T1



Netra 20 Server



Netra t 1400/1405

HEADQUARTERS SUN MICROSYSTEMS, INC., 901 SAN ANTONIO ROAD, PALO ALTO, CA 94303-4900 USA

PHONE: 650 960-1300 OR 800 555-9SUN INTERNET: www.sun.com



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SALES OFFICES

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