SPEC SFS 1 Summary (Side 1 of 2) 097.LADDIS

Sun Microsystems Inc.
Enterprise 4000/10

Server Hardware

CPU, Memory, & Power

Model No.	Model 4000/10
CPU	167MHz UltraSPARC
# of CPUs	10
Primary Cache	16KBI+16KBD on chip
Secondary Cache	512KB(I+D) off chip
Other Cache	None
Memory	2GB
UPS	None
Other hardware	None

Server Software

OS Version	Solaris 2.5.1 pre-FCS
Other software	None
File system	UFS

Load Generators (LGs)

Number of Load Generators:	10
Processes Per Load Generator:	19
Biod_Max_Reads:	2
Biod_Max_Writes:	3

Disk Subsystem & Filesystems

(Full Configuration on Side 2)

Num Disk Controllers	9
Num Disks	192
Num File Systems	190

Network Subsystem

(Full Configuration On Side 2)

Num Net Controllers	5
Num Networks	5
Type Network	100MBit Sun FastEthernet

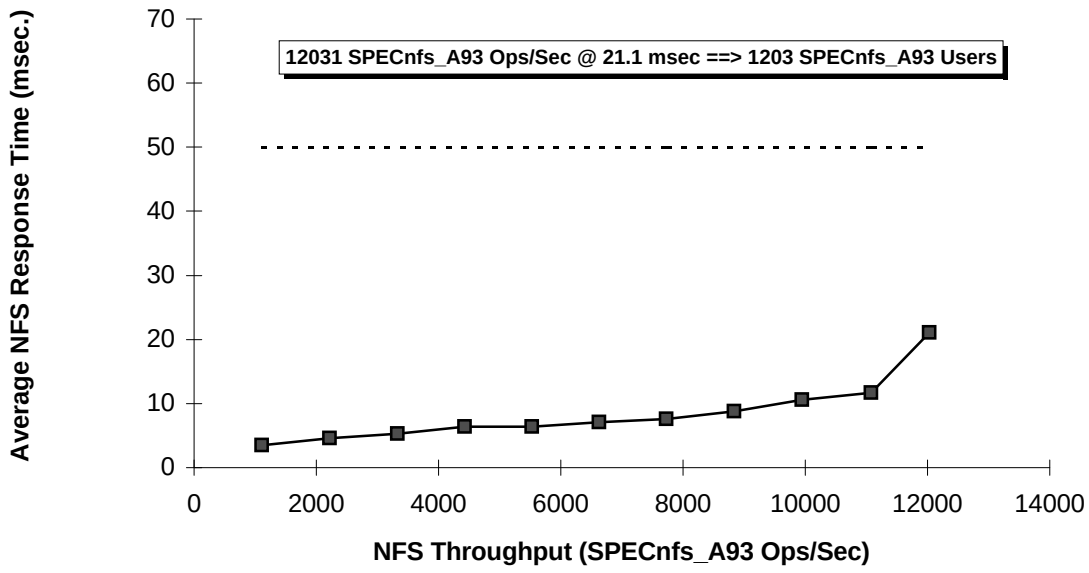
Server Tuning

(Also see Notes/Tuning below)

Buffer Cache Size	Dynamic
Num NFS Daemons	512
Fileset Size	68.5GB

NFS Throughput SPECnfs_A93 Ops/Sec	Avg. Response Time (NFS) Milliseconds
1110	3.5
2215	4.6
3328	5.3
4426	6.4
5526	6.4
6629	7.1
7730	7.6
8833	8.8
9952	10.6
11075	11.7
12031	21.1

Hardware Availability:	May-96			**Software Availability:**	May-96		
License #:	6	**Tested:**	Apr-96	**By:**	Sun	**Of:**	Mountain View



Notes/Summary Of Tuning Parameters: (Continued on Side 2 of 2)

bufhwm=131072

IGNORE_KERNEL_PREEMPTION=1

ncsize=131072

SSA fast_write enabled

SPEC SFS 1 Summary (Side 2 of 2) 097.LADDIS

Sun Microsystems Inc.
Enterprise 4000/10

Detailed Server Description

Network Subsystem

1 Sun FastEthernet (N1): 2 LGs
2 Sun FastEthernet (N2): 2 LGs
3 Sun FastEthernet (N3): 2 LGs
4 Sun FastEthernet (N4): 2 LGs
5 Sun FastEthernet (N5): 2 LGs

Disk Subsystem & Filesystems

Controller 1: On-board SCSI-2
Disks: 2 2GB 7200rpm

Controller 2-9:
Fiber Channel SBus (FC25/S) /Fiber Channel Optical Module (FC25/OM)
Disks: SPARCstorage Array 102 w/ 24 2GB 7200rpm drives
Contents 2: F1-F24
Contents 3: F25-F48
Contents 4: F49-F72
Contents 5: F73-F96
Contents 6: F97-F120
Contents 7: F121-F144
Contents 8: F145-F168

Detailed Load Generator (LG) Description

Load Gen. Type	*Model*	*# of CPUs*	*RAM*	*OS*	*Compiler*
LG1	SS20-712	2	64MB	Solaris 2.5.1 pre-FCS	SC3.0

Testbed Configuration

Load Gen. #	*Load Gen. Type*	*Network*	*Target File Systems*	*Notes*
1	LG1	N1	F1,F11,...,F181	rw,anon=0
2	LG1	N1	F2,F12,...,F182	rw,anon=0
3	LG1	N2	F3,F13,...,F183	rw,anon=0
4	LG1	N2	F4,F14,...,F184	rw,anon=0
5	LG1	N3	F5,F15,...,F185	rw,anon=0
6	LG1	N3	F6,F16,...,F186	rw,anon=0
7	LG1	N4	F7,F17,...,F187	rw,anon=0
8	LG1	N4	F8,F18,...,F188	rw,anon=0
9	LG1	N5	F9,F19,...,F189	rw,anon=0
10	LG1	N5	F10,F20,...,F190	rw,anon=0

Notes/Summary Of Tuning Parameters: (Continued from Side 1 of 2)