# SPECweb99 Result

© Copyright 1999, Standard Performance Evaluation Corporation

## IBM: Netfinity 7600
## Microsoft: IIS 5.0

SPECweb99 = 968

Test Date: Jun-2000
Tester: IBM

| Hardware Avail: | May-2000 | OS Avail: | Feb-2000 | HTTP Software Avail: | Feb-2000 | Sup. Software Avail: | Feb-2000 | SPEC license #: | 11 |
|---|---|---|---|---|---|---|---|---|---|

### Hardware

| | |
|---|---|
| Vendor: | IBM |
| Model: | Netfinity 7600 |
| Processor: | 700 MHz Pentium III Xeon |
| # Processors: | 1 core, 1 chip, 1 core/chip |
| Primary Cache: | 16KBI+16KBD on chip |
| Secondary Cache: | 2MB |
| Other Cache: | none |
| Memory: | 4GB |
| Disk Subsystem: | 7 X 9GB (Seagate ST39103LC) |
| Disk Controllers: | IBM ServeRaid 3H |
| Other Hardware: | ALTEON ACEswitch 180 GbE Switch |

### Software

| | |
|---|---|
| Operating System: | Microsoft Windows 2000 Advanced Server |
| File System: | NTFS |
| Other Software: | none |

### HTTP Software

| | |
|---|---|
| Vendor: | Microsoft |
| HTTP Software: | IIS 5.0 |
| API: | ISAPI |
| Server Cache: | none |
| Log Mode: | W3C Extended Log File Format |

### Test Sponsor

| | |
|---|---|
| Test Date: | Jun-2000 |
| Tested By: | IBM |
| SPEC License: | 11 |

### Network

| | |
|---|---|
| # of Controllers: | 1 |
| Network Controllers: | Alteon ACEnic PCI |
| # of Nets: | 1 |
| Type of Nets: | Gigabit Ethernet |
| Network Speed: | 1Gb/s |
| MSL (sec): | 30 (Non RFC1122) |
| Time-Wait (sec): | 60 (Non RFC1122) |
| MTU: | 1500 |

### Clients

| | |
|---|---|
| # of Clients: | 5 |
| Model: | Intellistation Z Pro |
| Processor: | 450Mhz Pentium II Xeon |
| # of Processors: | 2 |
| Memory: | 256MB |
| Network Controller: | Alteon ACEnic PCI |
| Operating System: | Windows 2000 Professional |
| Compiler: | Microsoft Visual C++ 6.0 |

## Notes/Tuning Information

### SUT Notes

IIS settings: Maximum Performance
IIS Home Directory: Access for Read & Write, Scripts & Executables
IIS Virtual Directory spec99 points back to web server root, low application protection

### Operating System Notes

Tuning parameters:
- Tcpip/Parameters/TcpTimedWaitDelay=0x3c, sets TIME_WAIT parameter to 60 seconds (non-RFC 1122), default is 240
- Tcpip/Parameters/MaxFreeTwTcbs=400000, sets maximum number of TIME_WAIT tcbs to 400,000
- Tcpip/Parameters/MaxHashTableSize=0x10000, sets TCB hash table size to 65,536 entries, default is 512
- Tcpip/Parameters/MaxUserPort=0xfffe, sets maximum open ports to 65534
- Tcpip/Parameters/NumTcbTablePartitions=16, sets number of independent TCB table segments, default 4
- Inetinfo/Parameters/ListenBacklog=1000, default 25
- Inetinfo/Parameters/ObjectCacheTTL=0xffffff, sets IIS object cache timeout, default 10 minutes
- Inetinfo/Parameters/AcceptExTimeout=0x1, sets time for accept ex socket to wait for receive, default 120
- Inetinfo/Parameters/MemCacheSize=2000, sets the cache size for IIS, default is 50% of available memory
- Inetinfo/Parameters/MaxCachedFileSize=93000, sets the maximum file size (in bytes) that IIS will cache, default is 256KB

Alteon NIC settings in registry
- StatTicks=0, default 100000
- SendCoalTicks=10000, sets number of microsec before send buffers are returned to host, default 1000
- RecvCoalTicks=10000 sets number of microsec before recv buffers are returned to host, default 1000
- SendCoalMax=30, sets number of frames sent before notifying host, default 20
- RecvCoalMax=80, sets number of frames received before notifying host, default 20
- RxFlowControl=0, default 1

### HTTP API Notes

IBM ISAPI v1.10 for IIS5.0 compiled with Intel Optimizing Compiler 4.0, code optimization = Pentium Pro

© Copyright 1999, Standard Performance Evaluation Corporation

## Notes/Tuning Information (Continued)

### Hardware Notes

1 disk for OS, 2 disk RAID 0 for logs, 4 disk RAID 0 for web pages