SPEC® CINT2006 Result

Fujitsu Siemens Computers

PRIMERGY RX300 S3, Intel Xeon processor E5335, 2.0 GHz

SPECint®_rate2006 = 77.6
SPECint_rate_base2006 = 73.7

CPU2006 license: 22
Test sponsor: Fujitsu Siemens Computers
Tested by: Fujitsu Siemens Computers

Test date: Apr-2007
Hardware Availability: Feb-2007
Software Availability: Feb-2007

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2.0 GHz
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400.perlbench
401.bzip2
403.gcc
429.mcf
445.gobmk
456.hmmer
458.sjeng
462.libquantum
464.h264ref
471.omnetpp
473.astar
483.xalancbmk

Copies

8
8
8
8
8
8
8
8
8
8

Hardware

CPU Name: Intel Xeon E5335
CPU Characteristics: 1333 MHz system bus
CPU MHz: 2000
FPU: Integrated
CPU(s) enabled: 8 cores, 2 chips, 4 cores/chip
CPU(s) orderable: 1.2 chips
Primary Cache: 32 KB I + 32 KB D on chip per core
Secondary Cache: 8 MB I+D on chip per chip, 4 MB shared / 2 cores
L3 Cache: None
Other Cache: None
Memory: 16 GB (8x2 GB DDR2 PC2-5300F, 2 rank, CAS 5-5-5, with ECC)
Disk Subsystem: SAS (73GB 15400 rpm)
Other Hardware: None

Software

Operating System: 64-Bit SUSE LINUX Enterprise Server 10, Kernel 2.6.16.21-0.8-smp on an x86, 64
Auto Parallel: No
File System: ext2
System State: Multiuser, Runlevel 3
Base Pointers: 32-bit
Peak Pointers: 32/64-bit
Other Software: Smart Heap Library, Version 8.1

Standard Performance Evaluation Corporation
info@spec.org
http://www.spec.org/
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Results Table

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<thead>
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</tr>
</tbody>
</table>

Results appear in the order in which they were run. Bold underlined text indicates a median measurement.

Operating System Notes

'ulimit -s unlimited' was used to set the stacksize to unlimited prior to run  
'/usr/bin/taskset' used to bind processes to CPUs

General Notes

The system bus runs at 1333 MHz

All binaries were built with 32-bit Intel compiler except: 
401.bzip2, 456.hmmer and 462.libquantum in peak were built with 
64-bit Intel compiler by changing the path for include and library files.

BIOS configuration:
Hardware Prefetch = Disable, Adjacent Sector Prefetch = Disable

The PRIMERGY RX300 S3 and the PRIMERGY TX300 S3 are electronically equivalent.

For information about Fujitsu Siemens Computers in your country please see: 
http://www.fujitsu-siemens.com/countries

Base Compiler Invocation

C benchmarks: 
icc
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Base Compiler Invocation (Continued)

C++ benchmarks:
icpc

Base Portability Flags

```
400.perlbench: -DSPEC_CPU_LINUX_X64
462.libquantum: -DSPEC_CPU_LINUX
483.xalancbmk: -DSPEC_CPU_LINUX
```

Base Optimization Flags

```
C benchmarks:
- fast

C++ benchmarks:
-XP -O3 -ipo -no-prec-div -L/opt/SmartHeap_8.1/lib -lsmartheap
```

Peak Compiler Invocation

```
C benchmarks (except as noted below):
icc

401.bzip2: /opt/intel/cce/9.1.047/bin/icc
        -I/opt/intel/cce/9.1.047/include
        -L/opt/intel/cce/9.1.047/lib

456.hmmer: /opt/intel/cce/9.1.047/bin/icc
         -I/opt/intel/cce/9.1.047/include
         -L/opt/intel/cce/9.1.047/lib

462.libquantum: /opt/intel/cce/9.1.047/bin/icc
        -I/opt/intel/cce/9.1.047/include
        -L/opt/intel/cce/9.1.047/lib

C++ benchmarks:
icpc
```

Peak Portability Flags

```
400.perlbench: -DSPEC_CPU_LINUX_X64
401.bzip2: -DSPEC_CPU_LP64
```

Continued on next page
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Peak Portability Flags (Continued)

456.hmmer: -DSPEC_CPU_LP64
462.libquantum: -DSPEC_CPU_LP64 -DSPEC_CPU_LINUX
483.xalancbmk: -DSPEC_CPU_LINUX

Peak Optimization Flags

C benchmarks:

400.perlbench: -prof_gen(pass 1) -prof_use(pass 2) -fast
401.bzip2: -fast
403.gcc: basepeak = yes
429.mcf: -prof_gen(pass 1) -prof_use(pass 2) -fast
-L/opt/SmartHeap_8_1/lib -lsmartheap
445.gobmk: Same as 429.mcf
456.hmmer: Same as 400.perlbench
458.sjeng: Same as 429.mcf
462.libquantum: Same as 400.perlbench
464.h264ref: Same as 429.mcf

C++ benchmarks:

471.omnetpp: -prof_gen(pass 1) -prof_use(pass 2) -xP -O3 -ipo
-no-prec-div -L/opt/SmartHeap_8_1/lib -lsmartheap
473.astar: -prof_gen(pass 1) -prof_use(pass 2) -fast
-L/opt/SmartHeap_8_1/lib -lsmartheap
483.xalancbmk: basepeak = yes

The flags file that was used to format this result can be browsed at

You can also download the XML flags source by saving the following link:
http://www.spec.org/cpu2006/flags/CPU2006_flags.20090714.09.xml
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For other inquiries, please contact webmaster@spec.org.

Tested with SPEC CPU2006 v1.0.