Cisco Systems
Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

SPECint\_rate2006 = NC
SPECint\_rate\_base2006 = NC

Cisco Systems
Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

SPEC has determined that this result is not in compliance with the SPEC CPU2006 run and reporting rules. Specifically, the result does not meet the 3 month availability requirement in the SPEC CPU2006 run rules, because the tested processor was not supported on this platform within three months of publication.

CPU2006 license: 9019
Test sponsor: Cisco Systems
Tested by: Cisco Systems

Test date: Jan-2012
Hardware Availability: May-2011
Software Availability: Oct-2011

---

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

---

Hardware

CPU Name: Intel Xeon E7-4860
CPU Characteristics: Intel Turbo Boost Technology up to 2.66 GHz
CPU MHz: 2267
FPU: Integrated
CPU(s) enabled: 20 cores, 2 chips, 10 cores/chip, 2 threads/core
CPU(s) orderable: 1,2 chips
Primary Cache: 32 KB I + 32 KB D on chip per core

---

Software

Operating System: Red Hat Enterprise Linux Server release 6.1 (Santiago) 2.6.32-131.0.15.el6.x86_64
Compiler: C/C++: Version 12.1.0.225 of Intel C++ Studio XE for Linux
Auto Parallel: No
File System: ext4
System State: Run level 3 (multi-user)

---

Non-Compliant
Cisco Systems

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Results Table

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<th>Seconds</th>
<th>Ratio</th>
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<th>Seconds</th>
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</tr>
</tbody>
</table>

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

Submit Notes

The numactl mechanism was used to bind copies to processors. The config file option 'submit' was used to generate numactl commands to bind each copy to a specific processor. For details, please see the config file.
Cisco Systems
Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

CPU2006 license: 9019
Test sponsor: Cisco Systems
Tested by: Cisco Systems

Test date: Jan-2012
Hardware Availability: May-2011
Software Availability: Oct-2011

SPEC has determined that this result is not in compliance with the SPEC CPU2006 run and reporting rules. Specifically, the result does not meet the 3 month availability requirement in the SPEC CPU2006 run rules, because the tested processor was not supported on this platform within three months of publication.

Operating System Notes
Stack size set to unlimited using "ulimit -s unlimited"

Platform Notes
Sysinfo program /opt/cpu2006/config/sysinfo.rev6800
$Rev: 6800 $ $Date:: 2011-10-11#$ 6f2ebdff5032aaa42e583f96b07f99d3
running on localhost.localdomain Mon Jan 23 21:32:59 2012

This section contains SUT (System Under Test) info as seen by some common utilities. To remove or add to this section, see:
http://www.spec.org/cpu2006/Docs/config.html#sysinfo

From /proc/cpuinfo
  model name : Intel(R) Xeon(R) CPU E7- 4860 @ 2.27GHz
  2 "physical id" (chips)
  40 "processors"
cores, siblings (Caution: counting these is hw and system dependent. The following excerpts from /proc/cpuinfo might not be reliable. Use with caution.)
cpu cores : 20
siblings : 10
  physical 0: cores 0 1 2 8 9 16 17 18 24 25
  physical 1: cores 0 1 2 8 9 16 17 18 24 25
  cache size : 24576 KB

From /proc/meminfo
  MemTotal: 264434356 kB
  PagePages_Total: 0
  HugePages_Total:       0
  Hugepagesize: 2048 kB

/usr/bin/lsb_release -d
  Red Hat Enterprise Linux Server release 6.1 (Santiago)

From /etc/*release* /etc/*version*
  redhat-release: Red Hat Enterprise Linux Server release 6.1 (Santiago)
  system-release: Red Hat Enterprise Linux Server release 6.1 (Santiago)

Continued on next page
Cisco Systems

Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

SPEC CINT2006 Result

SPECint_rate2006 = NC
SPECint_rate_base2006 = NC

CPU2006 license: 9019
Test sponsor: Cisco Systems
Tested by: Cisco Systems

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Platform Notes (Continued)

uname -a:
    Linux localhost.localdomain 2.6.32-131.0.15.el6.x86_64 #1 SMP Tue May 10 15:42:40 EDT 2011 x86_64 x86_64 x86_64 GNU/Linux

run-level 3 Jan 23 21:29

SPEC is set to: /opt/cpu2006
Filesystem    Type    Size  Used Avail Use% Mounted on
/dev/sda1     ext4     58G  5.5G   50G  10% /

Additional information from dmidecode:

General Notes

Environment variables set by runspec before the start of the run:
LD_LIBRARY_PATH = "/opt/cpu2006/libs/32:/opt/cpu2006/libs/64"

Binaries compiled on a system with 1x Core i7-860 CPU + 8GB memory using RHEL5.
Transparent Huge Pages enabled with:
    echo always > /sys/kernel/mm/redhat_transparent_hugepage/enabled
Filesystem page cache cleared with:
    echo 1>/proc/sys/vm/drop_caches
runspec command invoked through numactl i.e.:
    numactl --interleave=all runspec <etc>

Base CompilerInvocation

C benchmarks:
    icc -m32

C++ benchmarks:
    icpc -m32
Cisco Systems

Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

SPECint_rate2006 = NC
SPECint_rate_base2006 = NC

CPU2006 license: 9019
Test sponsor: Cisco Systems
Tested by: Cisco Systems
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Base Portability Flags

400.perlbench: -DSPEC_CPU_LINUX_IA32
462.libquantum: -DSPEC_CPU_LINUX
483.xalancbmk: -DSPEC_CPU_LINUX

Base Optimization Flags

C benchmarks:
- sxSSE4.2 -ipo -O3 -no-pref-div -opt-prefetch -opt-mem-layout-trans=3
C++ benchmarks:
- sxSSE4.2 -ipo -O3 -no-pref-div -opt-prefetch -opt-mem-layout-trans=3
-Wl,-z,muldefs -L/smartheap -lsmartheap

Base Other Flags

C benchmarks:
403.gcc: -Dalloca=_alloca

Peak Compiler Invocation

C benchmarks (except as noted below):
100: -m32
400.perlbench: icc -m64
401.bzip2: icc -m64
456.hmmer: icc -m64

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Cisco Systems

Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)

SPECint_rate2006 = NC
SPECint_rate_base2006 = NC

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Peak Compiler Invocation (Continued)

458.sjeng: icc -m64

C++ benchmarks:
icpc -m32

Peak Portability Flags

400.perlbench: -DSPEC_CPU_LP64 -DSPEC_CPU_LINUX_X64
401.bzip2: -DSPEC_CPU_LP64
456.hmmer: -DSPEC_CPU_LP64
458.sjeng: -DSPEC_CPU_LP64
462.libquantum: -DSPEC_CPU_LINUX
483.xalancbmk: -DSPEC_CPU_LINUX

Peak Optimization Flags

C benchmarks:
400.perlbench: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2) -no-prec-div(pass 2) -prof-use(pass 2) -auto-ilp32
401.bzip2: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2) -O3(pass 2) -no-prec-div(pass 2) -prof-use(pass 2) -opt-prefetch -auto-ilp32 -ansi-alias
403.gcc: -xSSE4.2 -ipo -O3 -no-prec-div
429.mcf: basepeak = yes
445.gobmk: -xSSE4.2(pass 2) -prof-gen(pass 1) -prof-use(pass 2) -ansi-alias -opt-mem-layout-trans=3

Continued on next page
Cisco Systems
Cisco UCS B230 M2 (Intel Xeon E7-2860, 2.26 GHz)  

SPEC CPU 2006 license: 9019  
Test sponsor: Cisco Systems  
Tested by: Cisco Systems  

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Peak Optimization Flags (Continued)

456.hmmer: -xSSE4.2 -ipo -O3 -no-prec-div -unroll2 -auto-ilp32

458.sjeng: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)
-03(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)
-unroll4 -auto-ilp32

462.libquantum: basepeak = yes

464.h264ref: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)
-03(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)
-unroll2 -ansi-alias

C++ benchmarks:

471.omnetpp: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)
-03(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)
-ansi-alias -ot-ra-region-strategy=block -Wl,-z,muldefs
-L/smartheap -lsmartheap

473.astar: basepeak = yes

483.xalancbmk: basepeak = yes

Peak Other Flags

C benchmarks:

402.gcc: -Dalloca=_alloca

The flags files that were used to format this result can be browsed at
http://www.spec.org/cpu2006/flags/Intel-ic12.1-official-linux64.20111122.html
http://www.spec.org/cpu2006/flags/Cisco-Platform-Settings-V1.2.html
Cisco Systems
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You can also download the XML flags sources by saving the following links:
http://www.spec.org/cpu2006/flags/Intel-ic12.1-official-linux64.20111115.xml
http://www.spec.org/cpu2006/flags/Cisco-Platform-Settings-V1.2.xml

For questions about this result, please contact the tester.
For other inquiries, please contact webmaster@spec.org.

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