



# SPEC® CINT2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

## Cisco Systems

SPECint®\_rate2006 = 509

Cisco UCS C460 M2 (Intel Xeon E7-4807, 1.87 GHz)

SPECint\_rate\_base2006 = 480

CPU2006 license: 9019

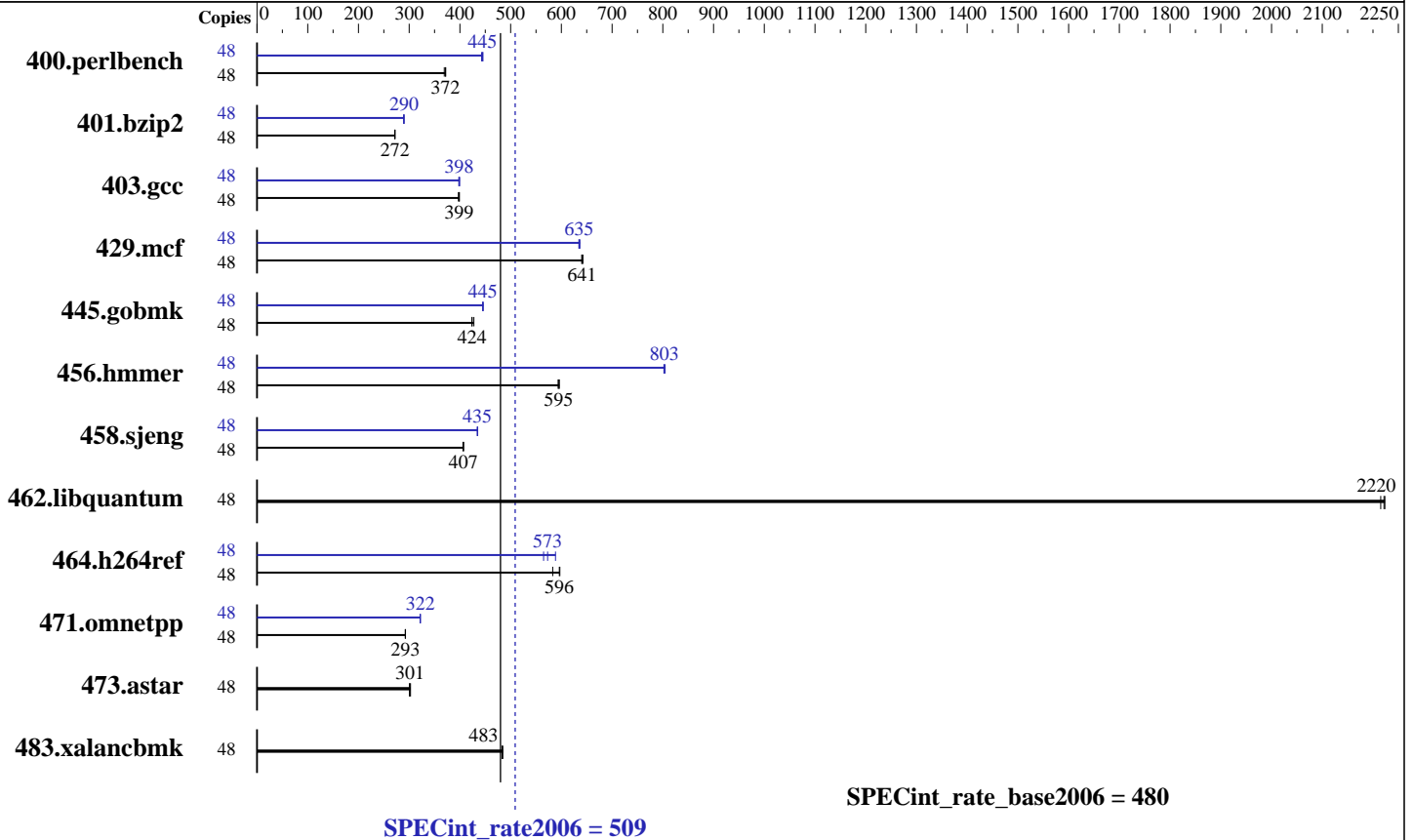
Test date: Jul-2011

Test sponsor: Cisco Systems

Hardware Availability: May-2011

Tested by: Cisco Systems

Software Availability: Mar-2011



### Hardware

CPU Name: Intel Xeon E7-4807  
 CPU Characteristics: None  
 CPU MHz: 1867  
 FPU: Integrated  
 CPU(s) enabled: 24 cores, 4 chips, 6 cores/chip, 2 threads/core  
 CPU(s) orderable: 1,2,3,4 chips  
 Primary Cache: 32 KB I + 32 KB D on chip per core  
 Secondary Cache: 256 KB I+D on chip per core  
 L3 Cache: 18 MB I+D on chip per chip  
 Other Cache: None  
 Memory: 1 TB (64 x 16 GB 4Rx4 PC3-8500R-9, ECC, running at 800 MHz)  
 Disk Subsystem: 146 GB SAS, 15K RPM  
 Other Hardware: None

### Software

Operating System: Red Hat Enterprise Linux Server release 6.1 Beta  
 Kernel 2.6.32-130.el6.x86\_64  
 Compiler: Intel C++ Compiler XE for applications running on IA-32  
 Version 12.0.1.116 Build 20101116  
 Auto Parallel: No  
 File System: ext3  
 System State: Run level 3 (multi-user)  
 Base Pointers: 32-bit  
 Peak Pointers: 32/64-bit  
 Other Software: Microquill SmartHeap V9.01



# SPEC CINT2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

## Cisco Systems

SPECint\_rate2006 = 509

Cisco UCS C460 M2 (Intel Xeon E7-4807, 1.87 GHz)

SPECint\_rate\_base2006 = 480

CPU2006 license: 9019

Test date: Jul-2011

Test sponsor: Cisco Systems

Hardware Availability: May-2011

Tested by: Cisco Systems

Software Availability: Mar-2011

## Results Table

Benchmark	Base							Peak						
	Copies	Seconds	Ratio	Seconds	Ratio	Seconds	Ratio	Copies	Seconds	Ratio	Seconds	Ratio	Seconds	Ratio
400.perlbench	48	1261	372	<u>1262</u>	<u>372</u>	1270	369	48	<u>1055</u>	<u>445</u>	1053	445	1059	443
401.bzip2	48	1703	272	<u>1703</u>	<u>272</u>	1706	271	48	1603	289	1598	290	<u>1598</u>	<u>290</u>
403.gcc	48	969	399	<u>969</u>	<u>399</u>	973	397	48	971	398	<u>970</u>	<u>398</u>	967	400
429.mcf	48	684	640	<u>683</u>	<u>641</u>	681	643	48	<u>689</u>	<u>635</u>	688	637	690	635
445.gobmk	48	<u>1188</u>	<u>424</u>	1178	428	1188	424	48	<u>1131</u>	<u>445</u>	1129	446	1131	445
456.hammer	48	751	596	755	594	<u>753</u>	<u>595</u>	48	557	805	558	802	<u>558</u>	<u>803</u>
458.sjeng	48	1426	407	<u>1427</u>	<u>407</u>	1431	406	48	1335	435	<u>1337</u>	<u>435</u>	1337	434
462.libquantum	48	<u>448</u>	<u>2220</u>	449	2220	447	2220	48	<u>448</u>	<u>2220</u>	449	2220	447	2220
464.h264ref	48	1779	597	1822	583	<u>1782</u>	<u>596</u>	48	1880	565	<u>1854</u>	<u>573</u>	1805	588
471.omnetpp	48	<u>1025</u>	<u>293</u>	1025	293	1027	292	48	933	322	931	322	<u>932</u>	<u>322</u>
473.astar	48	1113	303	<u>1118</u>	<u>301</u>	1121	300	48	1113	303	<u>1118</u>	<u>301</u>	1121	300
483.xalancbmk	48	685	483	<u>685</u>	<u>483</u>	684	485	48	685	483	<u>685</u>	<u>483</u>	684	485

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

## Submit Notes

The config file option 'submit' was used.  
numactl was used to bind copies to the cores

## Operating System Notes

ulimit -s unlimited was used to set the stacksize to unlimited prior to run  
Large pages were disabled for this run

## Platform Notes

BIOS Configuration : Data Reuse Optimization = Disabled

## General Notes

Binaries compiled on RHEL5.5 with  
binutils-2.17.50.0.6-14.el5

## Base Compiler Invocation

C benchmarks:  
icc -m32

C++ benchmarks:  
icpc -m32



# SPEC CINT2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

Cisco Systems

SPECint\_rate2006 = 509

Cisco UCS C460 M2 (Intel Xeon E7-4807, 1.87 GHz)

SPECint\_rate\_base2006 = 480

CPU2006 license: 9019

Test sponsor: Cisco Systems

Tested by: Cisco Systems

Test date: Jul-2011

Hardware Availability: May-2011

Software Availability: Mar-2011

## Base Portability Flags

400.perlbench: -DSPEC\_CPU\_LINUX\_IA32  
462.libquantum: -DSPEC\_CPU\_LINUX  
483.xalancbmk: -DSPEC\_CPU\_LINUX

## Base Optimization Flags

C benchmarks:

-xSSE4.2 -ipo -O3 -no-prec-div -opt-prefetch  
-B /usr/share/libhugetlbfs/ -Wl,-hugetlbfs-link=BDT

C++ benchmarks:

-xSSE4.2 -ipo -O3 -no-prec-div -opt-prefetch -Wl,-z,muldefs  
-L/smartheap -lsmartheap  
-B /usr/share/libhugetlbfs/ -Wl,-hugetlbfs-link=BDT

## Base Other Flags

C benchmarks:

403.gcc: -Dalloca=\_alloca

## Peak Compiler Invocation

C benchmarks (except as noted below):

icc -m32

400.perlbench: icc -m64

401.bzip2: icc -m64

456.hmmer: icc -m64

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

Continued on next page



# SPEC CINT2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

Cisco Systems

SPECint\_rate2006 = 509

Cisco UCS C460 M2 (Intel Xeon E7-4807, 1.87 GHz)

SPECint\_rate\_base2006 = 480

CPU2006 license: 9019

Test date: Jul-2011

Test sponsor: Cisco Systems

Hardware Availability: May-2011

Tested by: Cisco Systems

Software Availability: Mar-2011

## Peak Portability Flags (Continued)

456.hmmcr: -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)  
-O3(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)  
-B /usr/share/libhugetlbfs/ -Wl,-melf\_x86\_64 -Wl,-hugetlbfs-link=BDT

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  
-B /usr/share/libhugetlbfs/ -Wl,-melf\_x86\_64 -Wl,-hugetlbfs-link=BDT

403.gcc: -xSSE4.2 -ipo -O3 -no-prec-div  
-B /usr/share/libhugetlbfs/ -Wl,-hugetlbfs-link=BDT

429.mcf: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)  
-O3(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)  
-ansi-alias -auto-ilp32

445.gobmk: -xSSE4.2(pass 2) -prof-gen(pass 1) -prof-use(pass 2)  
-ansi-alias -auto-ilp32

456.hmmcr: -xSSE4.2 -ipo -O3 -no-prec-div -unroll2 -auto-ilp32  
-B /usr/share/libhugetlbfs/ -Wl,-melf\_x86\_64 -Wl,-hugetlbfs-link=BDT

458.sjeng: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)  
-O3(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)  
-unroll4 -auto-ilp32  
-B /usr/share/libhugetlbfs/ -Wl,-melf\_x86\_64 -Wl,-hugetlbfs-link=BDT

462.libquantum: basepeak = yes

464.h264ref: -xSSE4.2(pass 2) -prof-gen(pass 1) -ipo(pass 2)  
-O3(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)  
-O3(pass 2) -no-prec-div(pass 2) -prof-use(pass 2)  
-ansi-alias -opt-ra-region-strategy=block -Wl,-z,muldefs  
-L/smartheap -lsmartheap

Continued on next page



# SPEC CINT2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

Cisco Systems

SPECint\_rate2006 = 509

Cisco UCS C460 M2 (Intel Xeon E7-4807, 1.87 GHz)

SPECint\_rate\_base2006 = 480

CPU2006 license: 9019

Test date: Jul-2011

Test sponsor: Cisco Systems

Hardware Availability: May-2011

Tested by: Cisco Systems

Software Availability: Mar-2011

## Peak Optimization Flags (Continued)

473.astar: basepeak = yes

483.xalancbmk: basepeak = yes

## Peak Other Flags

C benchmarks:

403.gcc: -Dalloca=\_alloca

The flags files that were used to format this result can be browsed at

<http://www.spec.org/cpu2006/flags/Intel-ic12.0-linux64-revB.html>

<http://www.spec.org/cpu2006/flags/Cisco-Platform-Settings.20110808.html>

You can also download the XML flags sources by saving the following links:

<http://www.spec.org/cpu2006/flags/Intel-ic12.0-linux64-revB.xml>

<http://www.spec.org/cpu2006/flags/Cisco-Platform-Settings.20110808.xml>

SPEC and SPECint are registered trademarks of the Standard Performance Evaluation Corporation. All other brand and product names appearing in this result are trademarks or registered trademarks of their respective holders.

For questions about this result, please contact the tester.  
For other inquiries, please contact [webmaster@spec.org](mailto:webmaster@spec.org).

Tested with SPEC CPU2006 v1.1.

Report generated on Wed Jul 23 23:56:18 2014 by SPEC CPU2006 PS/PDF formatter v6932.

Originally published on 2 August 2011.