SPEC® CFP2006 Result
Copyright 2006-2014 Standard Performance Evaluation Corporation

Bull SAS

NovaScale R460
(Intel Xeon processor E5335,2.00GHz)

$SPECfp®\_rate2006 =$ 51.2
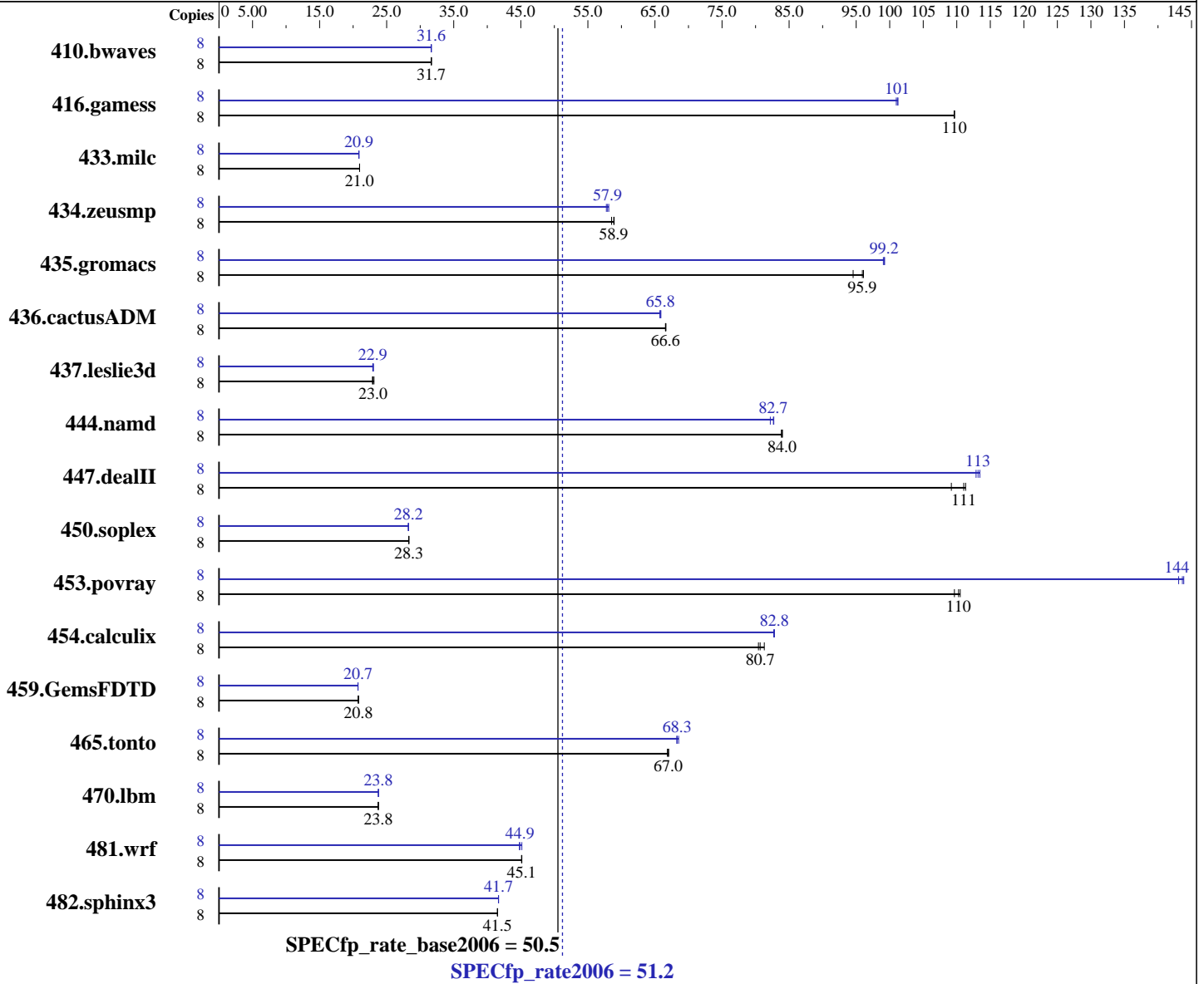
SPECfp_rate_base2006 = 50.5

CPU2006 license: 20
Test sponsor: Bull SAS
Tested by: Bull SAS

Test date: Apr-2007
Hardware Availability: Mar-2007
Software Availability: Dec-2006

Benchmark	Copies	Result (blue)	Result (black)
410.bwaves	8 / 8	31.6	31.7
416.gamess	8 / 8	101	110
433.milc	8 / 8	20.9	21.0
434.zeusmp	8 / 8	57.9	58.9
435.gromacs	8 / 8	99.2	95.9
436.cactusADM	8 / 8	65.8	66.6
437.leslie3d	8 / 8	22.9	23.0
444.namd	8 / 8	82.7	84.0
447.dealII	8 / 8	113	111
450.soplex	8 / 8	28.2	28.3
453.povray	8 / 8	144	110
454.calculix	8 / 8	82.8	80.7
459.GemsFDTD	8 / 8	20.7	20.8
465.tonto	8 / 8	68.3	67.0
470.lbm	8 / 8	23.8	23.8
481.wrf	8 / 8	44.9	45.1
482.sphinx3	8 / 8	41.7	41.5

SPECfp_rate_base2006 = 50.5

SPECfp_rate2006 = 51.2

Hardware

CPU Name:	Intel Xeon E5335
CPU Characteristics:	2.0GHz, 2x4 MB L2 shared, 1333 MHz system bus
CPU MHz:	2000
FPU:	Integrated
CPU(s) enabled:	8 cores, 2 chips, 4 cores/chip
CPU(s) orderable:	1 to 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

Continued on next page

Software

Operating System:	SuSE Linux Enterprise Server 10 (EM64T) kernel 2.6.16.21-0.8-smp
Compiler:	Intel C++ Compiler for Intel EM64T-based applications, Version 9.1 Package ID l_cc_c_9.1.045 Build no 20061101 Intel Fortran Compiler for Intel EM64T-based applications, Version 9.1 Package ID l_fc_c_9.1.040 Build no 20061101
Auto Parallel:	No

Continued on next page

SPEC CFP2006 Result
Copyright 2006-2014 Standard Performance Evaluation Corporation

Bull SAS

NovaScale R460
(Intel Xeon processor E5335,2.00GHz)

$SPECfp\_rate2006 =$ 51.2

$SPECfp\_rate\_base2006 =$ 50.5

CPU2006 license: 20	**Test date:** Apr-2007
Test sponsor: Bull SAS	**Hardware Availability:** Mar-2007
Tested by: Bull SAS	**Software Availability:** Dec-2006

L3 Cache:	None	File System:	ext2
Other Cache:	None	System State:	Multi-user, run level 3
Memory:	24 GB (2GB DIMMx12, FB-DIMM PC2-5300F ECC CL5)	Base Pointers:	64-bit
Disk Subsystem:	73 GB SAS, 10000RPM	Peak Pointers:	32/64-bit
Other Hardware:	None	Other Software:	None

Results Table

Benchmark	Copies	Base Seconds	Ratio	Seconds	Ratio	Seconds	Ratio	Copies	Peak Seconds	Ratio	Seconds	Ratio	Seconds	Ratio
410.bwaves	8	3435	31.6	**3434**	**31.7**	3433	31.7	8	3436	31.6	3433	31.7	**3436**	**31.6**
416.gamess	8	1429	110	1428	110	**1429**	**110**	8	1551	101	**1549**	**101**	1547	101
433.milc	8	3503	21.0	3504	21.0	**3504**	**21.0**	8	3523	20.8	**3520**	**20.9**	3518	20.9
434.zeusmp	8	1236	58.9	1244	58.5	**1237**	**58.9**	8	1253	58.1	1261	57.8	**1257**	**57.9**
435.gromacs	8	594	96.1	**595**	**95.9**	604	94.5	8	577	99.1	576	99.2	**576**	**99.2**
436.cactusADM	8	**1436**	**66.6**	1435	66.6	1436	66.6	8	1454	65.7	**1453**	**65.8**	1451	65.9
437.leslie3d	8	3254	23.1	**3277**	**23.0**	3287	22.9	8	**3277**	**22.9**	3280	22.9	3264	23.0
444.namd	8	765	83.8	764	84.0	**764**	**84.0**	8	781	82.2	776	82.7	**776**	**82.7**
447.dealII	8	**824**	**111**	838	109	822	111	8	811	113	807	113	**809**	**113**
450.soplex	8	2356	28.3	2360	28.3	**2356**	**28.3**	8	2360	28.3	**2362**	**28.2**	2365	28.2
453.povray	8	388	110	**386**	**110**	385	111	8	297	143	**296**	**144**	296	144
454.calculix	8	821	80.4	812	81.3	**818**	**80.7**	8	797	82.8	**797**	**82.8**	798	82.7
459.GemsFDTD	8	4091	20.7	**4084**	**20.8**	4080	20.8	8	**4095**	**20.7**	4098	20.7	4095	20.7
465.tonto	8	**1175**	**67.0**	1178	66.9	1174	67.0	8	1149	68.5	1153	68.3	**1152**	**68.3**
470.lbm	8	4625	23.8	4634	23.7	**4625**	**23.8**	8	4624	23.8	4626	23.8	4624	23.8
481.wrf	8	1979	45.2	1981	45.1	**1980**	**45.1**	8	**1992**	**44.9**	1995	44.8	1979	45.2
482.sphinx3	8	3756	41.5	3753	41.5	**3755**	**41.5**	8	3740	41.7	**3741**	**41.7**	3742	41.7

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

Operating System Notes

Environment stack size set to 'unlimited'

General Notes

The NovaScale R440 and the NovaScale R460 models are
electronically equivalent.
The results have been measured on a NovaScale R440 model.

SPEC CFP2006 Result
Copyright 2006-2014 Standard Performance Evaluation Corporation

Bull SAS

NovaScale R460
(Intel Xeon processor E5335,2.00GHz)

$SPECfp\_rate2006 = \qquad 51.2$

$SPECfp\_rate\_base2006 = 50.5$

CPU2006 license: 20	**Test date:** Apr-2007
Test sponsor: Bull SAS	**Hardware Availability:** Mar-2007
Tested by: Bull SAS	**Software Availability:** Dec-2006

Base Compiler Invocation

C benchmarks:
    icc

C++ benchmarks:
    icpc

Fortran benchmarks:
    ifort

Benchmarks using both Fortran and C:
    icc ifort

Base Portability Flags

```
   410.bwaves: -DSPEC_CPU_LP64
   416.gamess: -DSPEC_CPU_LP64
     433.milc: -DSPEC_CPU_LP64
   434.zeusmp: -DSPEC_CPU_LP64
  435.gromacs: -DSPEC_CPU_LP64 -nofor_main
 436.cactusADM: -DSPEC_CPU_LP64 -nofor_main
  437.leslie3d: -DSPEC_CPU_LP64
     444.namd: -DSPEC_CPU_LP64
    447.dealII: -DSPEC_CPU_LP64
    450.soplex: -DSPEC_CPU_LP64
    453.povray: -DSPEC_CPU_LP64
  454.calculix: -DSPEC_CPU_LP64 -nofor_main
 459.GemsFDTD: -DSPEC_CPU_LP64
    465.tonto: -DSPEC_CPU_LP64
     470.lbm: -DSPEC_CPU_LP64
      481.wrf: -DSPEC_CPU_LP64 -DSPEC_CPU_CASE_FLAG -DSPEC_CPU_LINUX
   482.sphinx3: -DSPEC_CPU_LP64
```

Base Optimization Flags

C benchmarks:
    -fast

C++ benchmarks:
    -fast

Fortran benchmarks:
    -fast

Benchmarks using both Fortran and C:
    -fast

SPEC CFP2006 Result
Copyright 2006-2014 Standard Performance Evaluation Corporation

Bull SAS

NovaScale R460
(Intel Xeon processor E5335,2.00GHz)

$SPECfp\_rate2006 = \quad 51.2$

$SPECfp\_rate\_base2006 = \quad 50.5$

CPU2006 license: 20
Test sponsor: Bull SAS
Tested by: Bull SAS

Test date: Apr-2007
Hardware Availability: Mar-2007
Software Availability: Dec-2006

Peak Compiler Invocation

C benchmarks:
    icc

C++ benchmarks:
    icpc

Fortran benchmarks:
    ifort

Benchmarks using both Fortran and C:
    icc ifort

Peak Portability Flags

Same as Base Portability Flags

Peak Optimization Flags

C benchmarks:
    -prof_gen(pass 1) -prof_use(pass 2) -fast -auto_ilp32

C++ benchmarks:
    -prof_gen(pass 1) -prof_use(pass 2) -fast -auto_ilp32

Fortran benchmarks:
    -prof_gen(pass 1) -prof_use(pass 2) -fast

Benchmarks using both Fortran and C:
    -prof_gen(pass 1) -prof_use(pass 2) -fast -auto_ilp32

The flags file that was used to format this result can be browsed at
http://www.spec.org/cpu2006/flags/EM64T_Intel91_flags.html

You can also download the XML flags source by saving the following link:
http://www.spec.org/cpu2006/flags/EM64T_Intel91_flags.xml

SPEC CFP2006 Result

Copyright 2006-2014 Standard Performance Evaluation Corporation

Bull SAS

NovaScale R460
(Intel Xeon processor E5335,2.00GHz)

$SPECfp\_rate2006 = 51.2$

$SPECfp\_rate\_base2006 = 50.5$

CPU2006 license: 20
Test sponsor: Bull SAS
Tested by: Bull SAS

Test date: Apr-2007
Hardware Availability: Mar-2007
Software Availability: Dec-2006

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

Tested with SPEC CPU2006 v1.0.
Report generated on Tue Jul 22 12:17:05 2014 by SPEC CPU2006 PS/PDF formatter v6932.
Originally published on 15 May 2007.