SPEC® OMPG2012 Result
Copyright 2012-2017 Standard Performance Evaluation Corporation

Supermicro
(Test Sponsor: HZDR)
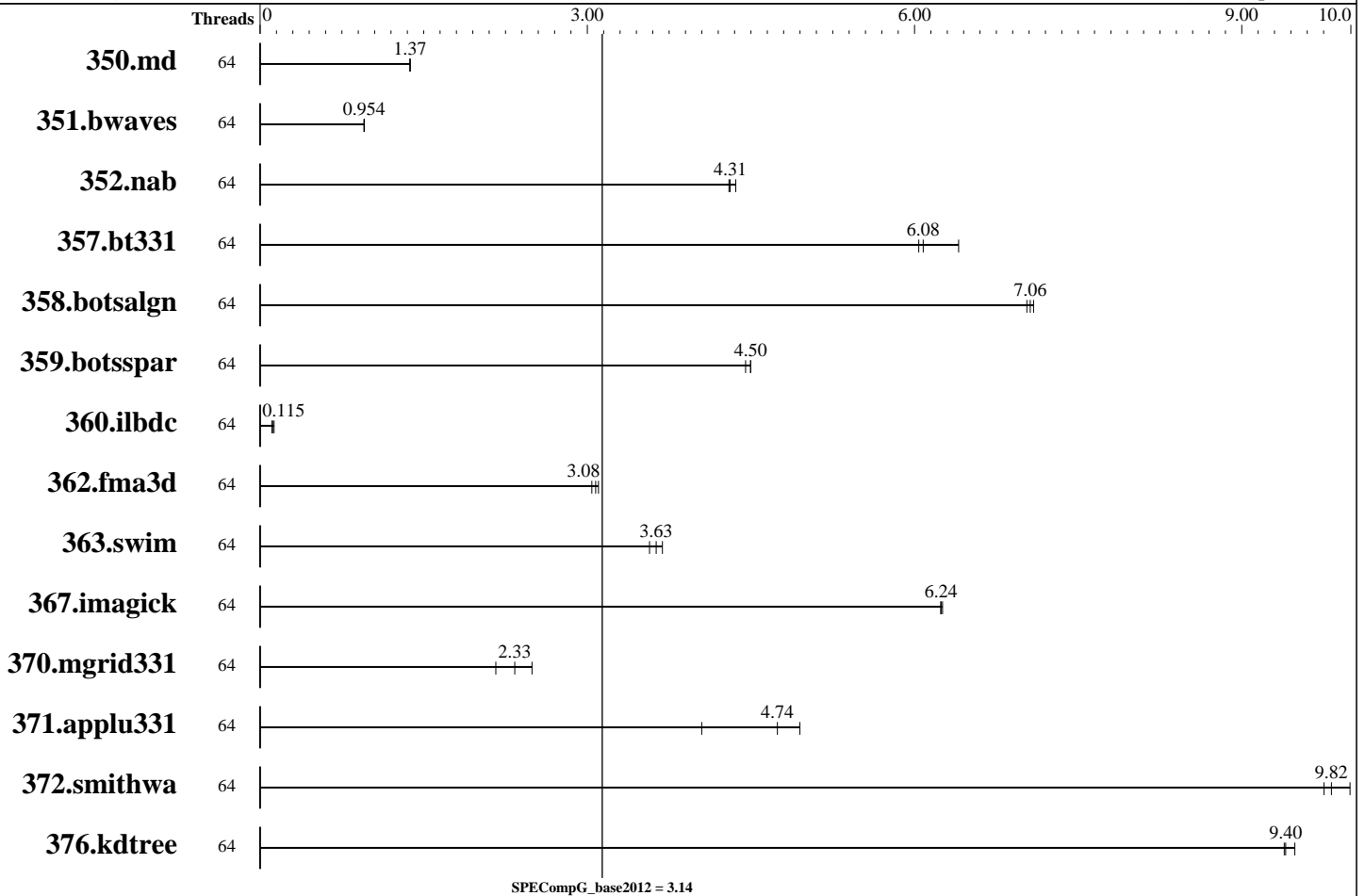
Supermicro H8QGi+-F

SPECompG_peak2012 = Not Run

SPECompG_base2012 =   3.14

OMP2012 license: 65A

Test sponsor: HZDR

Tested by: HZDR

Test date: Jul-2017

Hardware Availability: Nov-2011

Software Availability: Sep-2016

Benchmark	Threads	Score
350.md	64	1.37
351.bwaves	64	0.954
352.nab	64	4.31
357.bt331	64	6.08
358.botsalgn	64	7.06
359.botsspar	64	4.50
360.ilbdc	64	0.115
362.fma3d	64	3.08
363.swim	64	3.63
367.imagick	64	6.24
370.mgrid331	64	2.33
371.applu331	64	4.74
372.smithwa	64	9.82
376.kdtree	64	9.40

SPECompG_base2012 = 3.14

Hardware
CPU Name: AMD Opteron 6276
CPU Characteristics: AMD Turbo CORE technology up to 3.20 GHz
CPU MHz: 2300
CPU MHz Maximum: 3200
FPU: Integrated
CPU(s) enabled: 64 cores, 4 chips, 16 cores/chip
CPU(s) orderable: 2,4 chips
Primary Cache: 512 KB I on chip per chip,
64 KB I shared / 2 cores;
16 KB D on chip per core
Secondary Cache: 16 MB I+D on chip per chip, 2 MB shared / 2 cores
L3 Cache: 16 MB I+D on chip per chip, 8 MB shared / 8 cores
Other Cache: None
Memory: 256 GB (32 x 8 GB 2Rx4 PC3-10600R-9, ECC)
Disk Subsystem: 500 GB (1 x 500 GB SATA 7200rpm)
Other Hardware: --

Software
Operating System: Ubuntu 14.04 LTS
Kernel 4.4.0-38-generic
Compiler: C/C++/Fortran: Version 6.2 of the GNU Compilers
Auto Parallel: No
File System: ext3
System State: run-level 5
Base Pointers: 64-bit
Peak Pointers: Not Applicable
Other Software: None

Continued on next page

SPEC OMPG2012 Result
Copyright 2012-2017 Standard Performance Evaluation Corporation

Supermicro
(Test Sponsor: HZDR)

Supermicro H8QGi+-F

SPECompG_peak2012 = Not Run

SPECompG_base2012 =   3.14

OMP2012 license: 65A
Test sponsor: HZDR
Tested by: HZDR

Test date: Jul-2017
Hardware Availability: Nov-2011
Software Availability: Sep-2016

Base Threads Run: 64
Minimum Peak Threads: --
Maximum Peak Threads: --

Results Table

Benchmark	Threads	Base Seconds	Ratio	Seconds	Ratio	Seconds	Ratio	Peak Threads	Seconds	Ratio	Seconds	Ratio	Seconds	Ratio
350.md	64	**3368**	**1.37**	3369	1.37	3367	1.38							
351.bwaves	64	4756	0.953	4737	0.956	**4749**	**0.954**							
352.nab	64	**903**	**4.31**	905	4.30	892	4.36							
357.bt331	64	785	6.04	**780**	**6.08**	740	6.40							
358.botsalgn	64	619	7.03	**616**	**7.06**	613	7.09							
359.botsspar	64	1167	4.50	**1168**	**4.50**	1180	4.45							
360.ilbdc	64	**31036**	**0.115**	27818	0.128	33016	0.108							
362.fma3d	64	**1235**	**3.08**	1225	3.10	1250	3.04							
363.swim	64	**1248**	**3.63**	1269	3.57	1228	3.69							
367.imagick	64	1124	6.26	1127	6.24	**1126**	**6.24**							
370.mgrid331	64	2045	2.16	**1893**	**2.33**	1773	2.49							
371.applu331	64	**1278**	**4.74**	1225	4.95	1497	4.05							
372.smithwa	64	536	9.99	**546**	**9.82**	549	9.75							
376.kdtree	64	**479**	**9.40**	474	9.49	479	9.39							

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

Platform Notes

```
    Sysinfo program /tmp/spec/1.1/Docs/sysinfo
    Revision 563 of 2016-06-10 (097295389cf6073d8c3b03fa376740a5)
    running on laser084 Wed Jul  5 09:44:24 2017

    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/omp2012/Docs/config.html#sysinfo

    From /proc/cpuinfo
      model name : AMD Opteron(TM) Processor 6276
         4 "physical id"s (chips)
         64 "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 : 8
         siblings  : 16
         physical 0: cores 0 1 2 3 4 5 6 7
         physical 1: cores 0 1 2 3 4 5 6 7
         physical 2: cores 0 1 2 3 4 5 6 7
         physical 3: cores 0 1 2 3 4 5 6 7
```

Supermicro
(Test Sponsor: HZDR)

Supermicro H8QGi+-F

SPECompG_peak2012 = Not Run

SPECompG_base2012 =   3.14

OMP2012 license:65A
Test sponsor: HZDR
Tested by: HZDR

Test date: Jul-2017
Hardware Availability: Nov-2011
Software Availability: Sep-2016

Platform Notes (Continued)

```
      cache size : 2048 KB

  From /proc/meminfo
     MemTotal:       264017344 kB
     HugePages_Total:        0
     Hugepagesize:      2048 kB

  /usr/bin/lsb_release -d
     Ubuntu 14.04.5 LTS

  From /etc/*release* /etc/*version*
     debian_version: jessie/sid
     os-release:
        NAME="Ubuntu"
        VERSION="14.04.5 LTS, Trusty Tahr"
        ID=ubuntu
        ID_LIKE=debian
        PRETTY_NAME="Ubuntu 14.04.5 LTS"
        VERSION_ID="14.04"
        HOME_URL="http://www.ubuntu.com/"
        SUPPORT_URL="http://help.ubuntu.com/"
     rh-release: Red Hat Enterprise Linux Server release 7.2 (Maipo)

  uname -a:
     Linux laser084 4.4.0-38-generic #57~14.04.1-Ubuntu SMP Tue Sep 6 17:20:43 UTC
     2016 x86_64 x86_64 x86_64 GNU/Linux

  run-level 5 Jul 5 09:38

  SPEC is set to: /tmp/spec/1.1
     Filesystem      Type  Size  Used Avail Use% Mounted on
     /dev/sda1       ext3   37G  8.0G   27G  23% /

  Cannot run dmidecode; consider saying 'chmod +s /usr/sbin/dmidecode'

  (End of data from sysinfo program)
```

General Notes

```
  Environment:
    ENV_OMP_DYNAMIC=FALSE
    ENV_OMP_NESTED=FALSE
```

Base Compiler Invocation

C benchmarks:
    gcc

Continued on next page

Supermicro
(Test Sponsor: HZDR)

Supermicro H8QGi+-F

OMP2012 license:65A
Test sponsor: HZDR
Tested by: HZDR

Test date: Jul-2017
Hardware Availability: Nov-2011
Software Availability: Sep-2016

Base Compiler Invocation (Continued)

C++ benchmarks:
    g++

Fortran benchmarks:
    gfortran

Base Portability Flags

350.md: `-ffree-form -fno-range-check`

Base Optimization Flags

C benchmarks:
    `-fopenmp -O3`

C++ benchmarks:
    `-fopenmp -O3`

Fortran benchmarks:
    `-fopenmp -O3`

The flags file that was used to format this result can be browsed at
`http://www.spec.org/omp2012/flags/gcc62_linux_flags.html`

You can also download the XML flags source by saving the following link:
`http://www.spec.org/omp2012/flags/gcc62_linux_flags.xml`

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

Tested with SPEC OMP2012 v1.1.
Report generated on Wed Sep 6 18:01:44 2017 by SPEC OMP2012 PS/PDF formatter v541.
Originally published on 6 September 2017.