SPEC CPU®2026 Integer Rate Result

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Dell Inc.

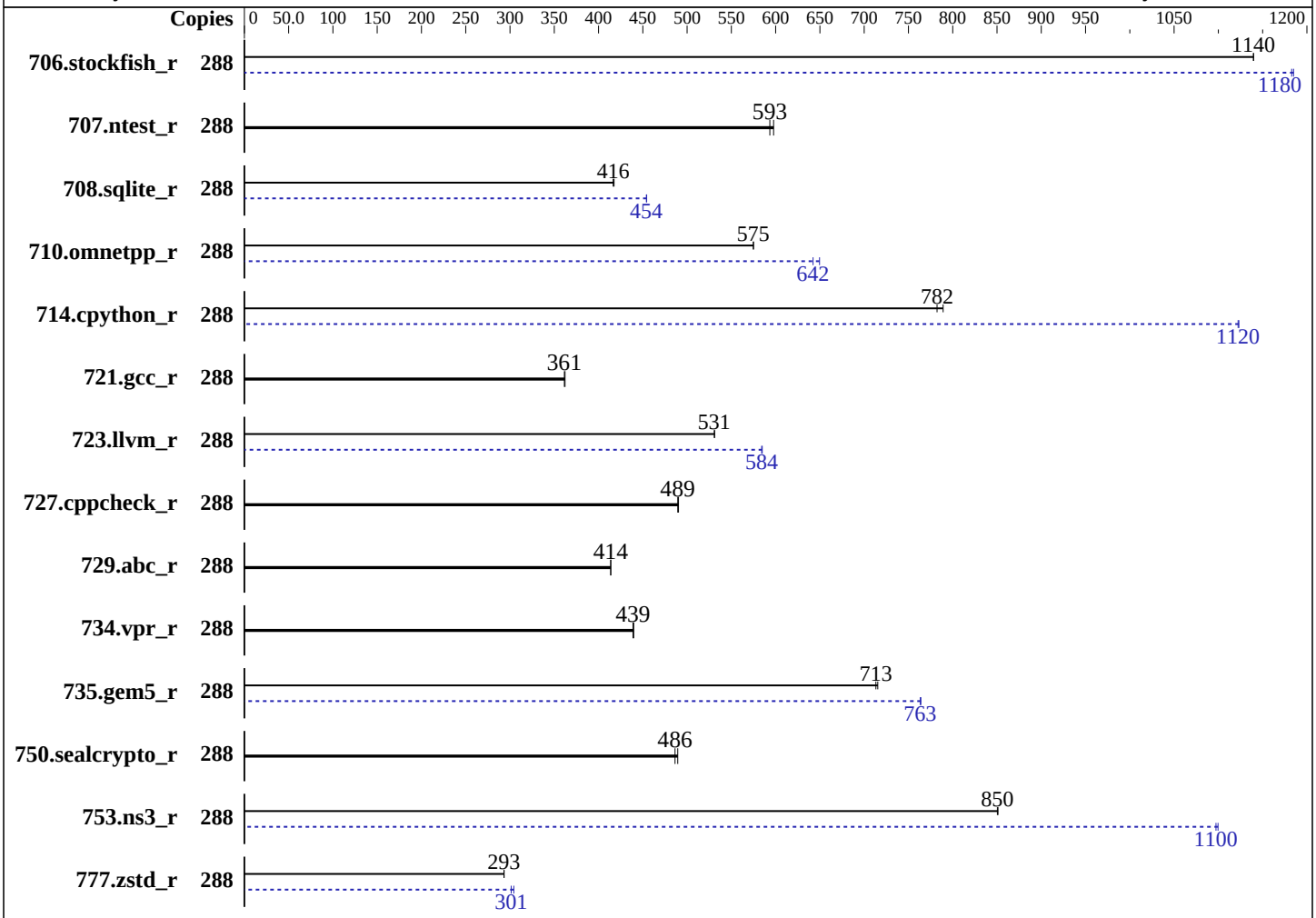
PowerEdge R770 (Intel Xeon 6780E)

SPECrate®2026_int_base = 542

SPECrate®2026_int_peak = 583

CPU2026 License: 6573
Test Sponsor: Dell Inc.
Tested by: Dell Inc.

Test Date: Feb-2026
Hardware Availability: Mar-2025
Software Availability: Nov-2025



Hardware

CPU Name:	Intel Xeon 6780E
Max MHz:	3000
Nominal:	2200
Enabled:	288 cores, 2 chips
Orderable:	1,2 chips
Cache L1:	64 KB I + 32 KB D on chip per core
L2:	4 MB I+D on chip per core
L3:	108 MB I+D on chip per chip
Other:	None
Memory:	1 TB (16 x 64 GB 2Rx4 PC5-6400B-R)
Storage:	160 GB on tmpfs
Cooling:	Air
Other:	None

Software

OS:	SUSE Linux Enterprise Server 15 SP6 6.4.0-150600.21-default
Compiler:	C/C++: Version 2025.3 of Intel oneAPI DPC++/C++ Compiler for Linux; Fortran: Version 2025.3 of Intel Fortran Compiler for Linux
Compiler Category:	Vendor
Firmware:	Version 1.6.4 released Nov-2025
File System:	tmpfs
System State:	Run level 3 (multi-user)
Base Pointers:	64-bit
Peak Pointers:	64-bit
Other:	None
Power Management:	BIOS set to prefer performance at the cost of additional power usage.

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Results Table

Benchmark	Base							Peak						
	Copies	Seconds	Ratio	Seconds	Ratio	Seconds	Ratio	Copies	Seconds	Ratio	Seconds	Ratio	Seconds	Ratio
706.stockfish_r	288	**318**	**1140**	318	1140			288	306	1180	**307**	**1180**		
707.ntest_r	288	**287**	**593**	285	598			288	**287**	**593**	285	598		
708.sqlite_r	288	**365**	**416**	364	418			288	**335**	**454**	335	454		
710.omnetpp_r	288	243	575	**244**	**575**			288	215	650	**218**	**642**		
714.cpython_r	288	**176**	**782**	175	789			288	**123**	**1120**	123	1120		
721.gcc_r	288	546	362	**547**	**361**			288	546	362	**547**	**361**		
723.llvm_r	288	**275**	**531**	275	531			288	**250**	**584**	250	585		
727.cppcheck_r	288	211	490	**211**	**489**			288	211	490	**211**	**489**		
729.abc_r	288	319	414	**319**	**414**			288	319	414	**319**	**414**		
734.vpr_r	288	**303**	**439**	302	440			288	**303**	**439**	302	440		
735.gem5_r	288	**197**	**713**	196	715			288	**184**	**763**	184	764		
750.sealcrypto_r	288	315	489	**317**	**486**			288	315	489	**317**	**486**		
753.ns3_r	288	**208**	**850**	207	851			288	161	1100	**161**	**1100**		
777.zstd_r	288	632	293	**633**	**293**			288	610	304	**616**	**301**		

SPECrate®2026_int_base = **542**

SPECrate®2026_int_peak = **583**

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.
```

Operating System Notes

```
Stack size set to unlimited using "ulimit -s unlimited"
```

Environment Variables Notes

```
Environment variables set by runcpu before the start of the run:
LD_LIBRARY_PATH = "/mnt/ramdisk/cpu2026-RC2/lib"
MALLOC_CONF = "retain:true"
```

General Notes

```
Binaries compiled on a system with 2x Intel Xeon Platinum 8280M CPU + 384GB RAM
memory using CentOS Stream 9.
Transparent Huge Pages enabled by default
Prior to runcpu invocation
```

(Continued on next page)

General Notes (Continued)

```
Filesystem page cache synced and cleared with:
sync; echo 3>       /proc/sys/vm/drop_caches
runcpu command invoked through numactl i.e.:
numactl --interleave=all runcpu <etc>
Benchmark run from a 160 GB ramdisk created with the cmd: "mount -t tmpfs -o size=160G tmpfs /mnt/ramdisk"
```

Platform Notes

```
BIOS Settings:

          System Profile : Custom
    CPU Power Management : Maximum Performance
                C-States : Autonomous
  Latency Optimized Mode : Enabled
 Energy Efficient Policy : Performance

Sysinfo program /mnt/ramdisk/cpu2026-RC2/bin/sysinfo
Rev: 069f95da7e7f5d81b2ce48a82150e54f
running on W407216-R770 Wed Feb  4 15:26:35 2026

SUT (System Under Test) info as seen by some common utilities.

------------------------------------------------------------
Table of contents
------------------------------------------------------------
 1. uname -srvm
 2. w
 3. Username
 4. ulimit -a
 5. sysinfo process ancestry
 6. /proc/cpuinfo
 7. lscpu
 8. numactl --hardware
 9. /proc/meminfo
10. who -r
11. Systemd service manager version: systemd 254 (254.10+suse.84.ge8d77af424)
12. Services, from systemctl list-unit-files
13. Linux kernel boot-time arguments, from /proc/cmdline
14. cpupower frequency-info
15. sysctl
16. /sys/kernel/mm/transparent_hugepage
17. /sys/kernel/mm/transparent_hugepage/khugepaged
18. OS release
19. Disk information
20. /sys/devices/virtual/dmi/id
```

(Continued on next page)

Platform Notes (Continued)

```
21. dmidecode
22. BIOS
------------------------------------------------------------

------------------------------------------------------------
1. uname -srvm
  Linux 6.4.0-150600.21-default #1 SMP PREEMPT_DYNAMIC Thu May 16 11:09:22 UTC 2024 (36c1e09) x86_64

------------------------------------------------------------
2. w
   15:26:35 up 13 min,  1 user,  load average: 0.76, 1.88, 1.24
  USER     TTY      FROM             LOGIN@   IDLE   JCPU   PCPU WHAT
  root     tty1     -                15:15   27.00s  2.01s  0.01s /bin/bash
  /home/DellFiles/bin/Intel/dell-run-speccpu.sh rate --define DL-VERS=7.0_T01 --output_format html,pdf,txt

------------------------------------------------------------
3. Username
  From environment variable $USER:  root

------------------------------------------------------------
4. ulimit -a
  core file size          (blocks, -c) unlimited
  data seg size           (kbytes, -d) unlimited
  scheduling priority             (-e) 0
  file size               (blocks, -f) unlimited
  pending signals                 (-i) 4126060
  max locked memory       (kbytes, -l) 8192
  max memory size         (kbytes, -m) unlimited
  open files                      (-n) 1024
  pipe size            (512 bytes, -p) 8
  POSIX message queues     (bytes, -q) 819200
  real-time priority              (-r) 0
  stack size              (kbytes, -s) unlimited
  cpu time               (seconds, -t) unlimited
  max user processes              (-u) 4126060
  virtual memory          (kbytes, -v) unlimited
  file locks                      (-x) unlimited

------------------------------------------------------------
5. sysinfo process ancestry
 /usr/lib/systemd/systemd --switched-root --system --deserialize=42
 login -- root
 -bash
 /bin/bash /home/DellFiles/bin/DELL_rate.sh
 /bin/bash /home/DellFiles/bin/dell-run-main.sh rate
 /bin/bash /home/DellFiles/bin/dell-run-main.sh rate
 /bin/bash /home/DellFiles/bin/Intel/dell-run-speccpu.sh rate --define DL-VERS=7.0_T01 --output_format
```

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Platform Notes (Continued)

```
    html,pdf,txt
 /bin/bash /home/DellFiles/bin/Intel/dell-run-speccpu.sh rate --define DL-VERS=7.0_T01 --output_format
    html,pdf,txt
 runcpu --nobuild --reportable --action validate --define default-platform-flags --copies 288 -c
   ic2025.3-sierraforest-cpu2026-0.902-rate-20260121.cfg --define smt-on --define cores=288 --define
   physicalfirst --define invoke_with_interleave --define drop_caches --reportable --tune base,peak -o all
    --iterations 2 --define DL-VERS=7.0_T01 --output_format html,pdf,txt intrate
 runcpu --nobuild --reportable --action validate --define default-platform-flags --copies 288 --configfile
   ic2025.3-sierraforest-cpu2026-0.902-rate-20260121.cfg --define smt-on --define cores=288 --define
   physicalfirst --define invoke_with_interleave --define drop_caches --reportable --tune base,peak
   --output_format all --iterations 2 --define DL-VERS=7.0_T01 --output_format html,pdf,txt --nopower
    --runmode rate --tune base:peak --size refrate intrate --nopreenv --note-preenv --logfile
    $SPEC/tmp/CPU2026.001/templogs/preenv.intrate.001.0.log --lognum 001.0 --from_runcpu 2
  specperl $SPEC/bin/sysinfo
$SPEC = /mnt/ramdisk/cpu2026-RC2

------------------------------------------------------------
6. /proc/cpuinfo
    model name      : Intel(R) Xeon(R) 6780E
    vendor_id       : GenuineIntel
    cpu family      : 6
    model           : 175
    stepping        : 3
    microcode       : 0x3000382
    bugs            : spectre_v1 spectre_v2 spec_store_bypass swapgs bhi
    cpu cores       : 144
    siblings        : 144
    2 physical ids (chips)
    288 processors (hardware threads)
    physical id 0: core ids 0-143
    physical id 1: core ids 0-143
    physical id 0: apicids
   0,2,4,6,8,10,12,14,16,18,20,22,24,26,28,30,32,34,36,38,40,42,44,46,48,50,52,54,56,58,60,62,64,66,68,70,72
   ,74,76,78,80,82,84,86,88,90,92,94,96,98,100,102,104,106,108,110,112,114,116,118,120,122,124,126,128,130,1
   32,134,136,138,140,142,144,146,148,150,152,154,156,158,160,162,164,166,168,170,172,174,176,178,180,182,18
   4,186,188,190,192,194,196,198,200,202,204,206,208,210,212,214,216,218,220,222,224,226,228,230,232,234,236
   ,238,240,242,244,246,248,250,252,254,256,258,260,262,264,266,268,270,272,274,276,278,280,282,284,286
    physical id 1: apicids
   512,514,516,518,520,522,524,526,528,530,532,534,536,538,540,542,544,546,548,550,552,554,556,558,560,562,5
   64,566,568,570,572,574,576,578,580,582,584,586,588,590,592,594,596,598,600,602,604,606,608,610,612,614,61
   6,618,620,622,624,626,628,630,632,634,636,638,640,642,644,646,648,650,652,654,656,658,660,662,664,666,668
   ,670,672,674,676,678,680,682,684,686,688,690,692,694,696,698,700,702,704,706,708,710,712,714,716,718,720,
   722,724,726,728,730,732,734,736,738,740,742,744,746,748,750,752,754,756,758,760,762,764,766,768,770,772,7
    74,776,778,780,782,784,786,788,790,792,794,796,798
  Caution: /proc/cpuinfo data regarding chips, cores, and threads is not necessarily reliable, especially for
   virtualized systems.  Use the above data carefully.
```

(Continued on next page)

Platform Notes (Continued)

```
------------------------------------------------------------
7. lscpu

From lscpu from util-linux 2.39.3:
  Architecture:                            x86_64
  CPU op-mode(s):                          32-bit, 64-bit
  Address sizes:                           52 bits physical, 48 bits virtual
  Byte Order:                              Little Endian
  CPU(s):                                  288
  On-line CPU(s) list:                     0-287
  Vendor ID:                               GenuineIntel
  BIOS Vendor ID:                          Intel
  Model name:                              Intel(R) Xeon(R) 6780E
  BIOS Model name:                         Intel(R) Xeon(R) 6780E  CPU @ 2.2GHz
  BIOS CPU family:                         179
  CPU family:                              6
  Model:                                   175
  Thread(s) per core:                      1
  Core(s) per socket:                      144
  Socket(s):                               2
  Stepping:                                3
  BogoMIPS:                                4400.00
  Flags:                                   fpu vme de pse tsc msr pae mce cx8 apic sep mtrr pge mca cmov pat
                                           pse36 clflush dts acpi mmx fxsr sse sse2 ss ht tm pbe syscall nx
                                           pdpe1gb rdtscp lm constant_tsc art arch_perfmon pebs bts rep_good
                                           nopl xtopology nonstop_tsc cpuid aperfmperf tsc_known_freq pni
                                           pclmulqdq dtes64 monitor ds_cpl vmx smx est tm2 ssse3 sdbg fma cx16
                                           xtpr pdcm pcid dca sse4_1 sse4_2 x2apic movbe popcnt
                                           tsc_deadline_timer aes xsave avx f16c rdrand lahf_lm abm
                                           3dnowprefetch cpuid_fault epb cat_l3 cat_l2 cdp_l3 intel_ppin cdp_l2
                                           ssbd mba ibrs ibpb stibp ibrs_enhanced tpr_shadow flexpriority ept
                                           vpid ept_ad fsgsbase tsc_adjust bmi1 avx2 smep bmi2 erms invpcid cqm
                                           rdt_a rdseed adx smap clflushopt clwb intel_pt sha_ni xsaveopt xsavec
                                           xgetbv1 xsaves cqm_llc cqm_occup_llc cqm_mbm_total cqm_mbm_local
                                           split_lock_detect user_shstk avx_vnni lam wbnoinvd dtherm ida arat
                                           pln pts vnmi umip pku ospke waitpkg gfni vaes vpclmulqdq tme rdpid
                                           bus_lock_detect cldemote movdiri movdir64b enqcmd fsrm md_clear
                                           serialize pconfig arch_lbr ibt flush_l1d arch_capabilities
  Virtualization:                          VT-x
  L1d cache:                               9 MiB (288 instances)
  L1i cache:                               18 MiB (288 instances)
  L2 cache:                                288 MiB (72 instances)
  L3 cache:                                216 MiB (2 instances)
  NUMA node(s):                            2
  NUMA node0 CPU(s):                       0,2,4,6,8,10,12,14,16,18,20,22,24,26,28,30,32,34,36,38,40,42,44,46,48
                                           ,50,52,54,56,58,60,62,64,66,68,70,72,74,76,78,80,82,84,86,88,90,92,94
                                           ,96,98,100,102,104,106,108,110,112,114,116,118,120,122,124,126,128,13
```

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Platform Notes (Continued)

```
                                0,132,134,136,138,140,142,144,146,148,150,152,154,156,158,160,162,164
                                ,166,168,170,172,174,176,178,180,182,184,186,188,190,192,194,196,198,
                                200,202,204,206,208,210,212,214,216,218,220,222,224,226,228,230,232,2
                                34,236,238,240,242,244,246,248,250,252,254,256,258,260,262,264,266,26
                                          8,270,272,274,276,278,280,282,284,286
  NUMA node1 CPU(s):            1,3,5,7,9,11,13,15,17,19,21,23,25,27,29,31,33,35,37,39,41,43,45,47,49
                                ,51,53,55,57,59,61,63,65,67,69,71,73,75,77,79,81,83,85,87,89,91,93,95
                                ,97,99,101,103,105,107,109,111,113,115,117,119,121,123,125,127,129,13
                                1,133,135,137,139,141,143,145,147,149,151,153,155,157,159,161,163,165
                                ,167,169,171,173,175,177,179,181,183,185,187,189,191,193,195,197,199,
                                201,203,205,207,209,211,213,215,217,219,221,223,225,227,229,231,233,2
                                35,237,239,241,243,245,247,249,251,253,255,257,259,261,263,265,267,26
                                          9,271,273,275,277,279,281,283,285,287
   Vulnerability Gather data sampling:   Not affected
   Vulnerability Itlb multihit:          Not affected
   Vulnerability L1tf:                   Not affected
   Vulnerability Mds:                    Not affected
   Vulnerability Meltdown:               Not affected
   Vulnerability Mmio stale data:        Not affected
   Vulnerability Reg file data sampling: Not affected
   Vulnerability Retbleed:               Not affected
   Vulnerability Spec rstack overflow:   Not affected
   Vulnerability Spec store bypass:      Mitigation; Speculative Store Bypass disabled via prctl
   Vulnerability Spectre v1:             Mitigation; usercopy/swapgs barriers and __user pointer sanitization
   Vulnerability Spectre v2:             Mitigation; Enhanced / Automatic IBRS; IBPB conditional; RSB filling;
                                         PBRSB-eIBRS Not affected; BHI BHI_DIS_S
   Vulnerability Srbds:                  Not affected
   Vulnerability Tsx async abort:        Not affected

  From lscpu --cache:
       NAME ONE-SIZE ALL-SIZE WAYS TYPE        LEVEL   SETS PHY-LINE COHERENCY-SIZE
       L1d       32K       9M    8 Data            1     64        1             64
       L1i       64K      18M    8 Instruction     1    128        1             64
       L2         4M     288M   16 Unified         2   4096        1             64
       L3       108M     216M   12 Unified         3 147456        1             64

  ------------------------------------------------------------
  8. numactl --hardware
  NOTE: a numactl 'node' might or might not correspond to a physical chip.
    available: 2 nodes (0-1)
    node 0 cpus:
  0,2,4,6,8,10,12,14,16,18,20,22,24,26,28,30,32,34,36,38,40,42,44,46,48,50,52,54,56,58,60,62,64,66,68,70,72,7
  4,76,78,80,82,84,86,88,90,92,94,96,98,100,102,104,106,108,110,112,114,116,118,120,122,124,126,128,130,132,1
  34,136,138,140,142,144,146,148,150,152,154,156,158,160,162,164,166,168,170,172,174,176,178,180,182,184,186,
  188,190,192,194,196,198,200,202,204,206,208,210,212,214,216,218,220,222,224,226,228,230,232,234,236,238,240
   ,242,244,246,248,250,252,254,256,258,260,262,264,266,268,270,272,274,276,278,280,282,284,286
    node 0 size: 515597 MB
```

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Platform Notes (Continued)

```
   node 0 free: 489068 MB
   node 1 cpus:
  1,3,5,7,9,11,13,15,17,19,21,23,25,27,29,31,33,35,37,39,41,43,45,47,49,51,53,55,57,59,61,63,65,67,69,71,73,7
  5,77,79,81,83,85,87,89,91,93,95,97,99,101,103,105,107,109,111,113,115,117,119,121,123,125,127,129,131,133,1
  35,137,139,141,143,145,147,149,151,153,155,157,159,161,163,165,167,169,171,173,175,177,179,181,183,185,187,
  189,191,193,195,197,199,201,203,205,207,209,211,213,215,217,219,221,223,225,227,229,231,233,235,237,239,241
  ,243,245,247,249,251,253,255,257,259,261,263,265,267,269,271,273,275,277,279,281,283,285,287
   node 1 size: 515944 MB
   node 1 free: 512318 MB
   node distances:
   node   0   1
     0:  10  21
     1:  21  10

------------------------------------------------------------
9. /proc/meminfo
    MemTotal:       1056298400 kB

------------------------------------------------------------
10. who -r
  run-level 3 Feb 4 15:14

------------------------------------------------------------
11. Systemd service manager version: systemd 254 (254.10+suse.84.ge8d77af424)
  Default Target  Status
  multi-user      running

------------------------------------------------------------
12. Services, from systemctl list-unit-files
  STATE             UNIT FILES
  enabled         YaST2-Firstboot YaST2-Second-Stage apparmor auditd cron display-manager getty@ irqbalance
                  issue-generator kbdsettings klog lvm2-monitor nscd postfix purge-kernels rollback rsyslog
                  smartd sshd systemd-pstore wicked wickedd-auto4 wickedd-dhcp4 wickedd-dhcp6 wickedd-nanny
  enabled-runtime  systemd-remount-fs
  disabled        autofs autoyast-initscripts blk-availability boot-sysctl ca-certificates chrony-wait
                   chronyd console-getty cups cups-browsed debug-shell ebtables exchange-bmc-os-info
                  firewalld fsidd gpm grub2-once haveged ipmi ipmievd issue-add-ssh-keys kexec-load lunmask
                   man-db-create multipathd nfs nfs-blkmap rpcbind rpmconfigcheck rsyncd serial-getty@
                   smartd_generate_opts snmpd snmptrapd systemd-boot-check-no-failures systemd-confext
                  systemd-network-generator systemd-sysext systemd-time-wait-sync systemd-timesyncd udisks2
                      vncserver@
  indirect          systemd-userdbd wickedd

------------------------------------------------------------
13. Linux kernel boot-time arguments, from /proc/cmdline
  BOOT_IMAGE=/boot/vmlinuz-6.4.0-150600.21-default
  root=UUID=e81515a8-96ce-43a6-8780-d2ae771756fe
```

(Continued on next page)

Platform Notes (Continued)

```
  splash=silent
  mitigations=auto
  quiet
  security=apparmor

------------------------------------------------------------
14. cpupower frequency-info
  analyzing CPU 110:
    Unable to determine current policy
    boost state support:
      Supported: yes
      Active: yes

------------------------------------------------------------
15. sysctl
  kernel.numa_balancing               1
  kernel.randomize_va_space           2
  vm.compaction_proactiveness        20
  vm.dirty_background_bytes           0
  vm.dirty_background_ratio          10
  vm.dirty_bytes                      0
  vm.dirty_expire_centisecs        3000
  vm.dirty_ratio                     20
  vm.dirty_writeback_centisecs      500
  vm.dirtytime_expire_seconds     43200
  vm.extfrag_threshold              500
  vm.min_unmapped_ratio               1
  vm.nr_hugepages                     0
  vm.nr_hugepages_mempolicy           0
  vm.nr_overcommit_hugepages          0
  vm.swappiness                      60
  vm.watermark_boost_factor       15000
  vm.watermark_scale_factor          10
  vm.zone_reclaim_mode                0

------------------------------------------------------------
16. /sys/kernel/mm/transparent_hugepage
  defrag          always defer defer+madvise [madvise] never
  enabled         [always] madvise never
  hpage_pmd_size  2097152
  shmem_enabled   always within_size advise [never] deny force

------------------------------------------------------------
17. /sys/kernel/mm/transparent_hugepage/khugepaged
  alloc_sleep_millisecs   60000
  defrag                      1
  max_ptes_none             511
```

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Platform Notes (Continued)

```
   max_ptes_shared           256
   max_ptes_swap              64
   pages_to_scan            4096
   scan_sleep_millisecs    10000

 ------------------------------------------------------------
 18. OS release
   From /etc/*-release /etc/*-version
   os-release SUSE Linux Enterprise Server 15 SP6

 ------------------------------------------------------------
 19. Disk information
 SPEC is set to: /mnt/ramdisk/cpu2026-RC2
   Filesystem     Type   Size  Used Avail Use% Mounted on
   tmpfs          tmpfs  160G   13G  148G   9% /mnt/ramdisk

 ------------------------------------------------------------
 20. /sys/devices/virtual/dmi/id
     Vendor:          Dell Inc.
     Product:         PowerEdge R770
     Product Family:  PowerEdge
     Serial:          W407216

 ------------------------------------------------------------
 21. dmidecode
   Additional information from dmidecode 3.4 follows.  WARNING: Use caution when you interpret this section.
   The 'dmidecode' program reads system data which is "intended to allow hardware to be accurately
   determined", but the intent may not be met, as there are frequent changes to hardware, firmware, and the
    "DMTF SMBIOS" standard.
    Memory:
      6x 00AD042300AD HMCG94AHBRA480N 64 GB 2 rank 6400
      10x 00AD063200AD HMCG94AHBRA277N 64 GB 2 rank 6400


 ------------------------------------------------------------
 22. BIOS
 (This section combines info from /sys/devices and dmidecode.)
    BIOS Vendor:       Dell Inc.
    BIOS Version:      1.6.4
    BIOS Date:         11/02/2025
    BIOS Revision:     1.6
```

Compiler Version Notes

```
==============================================================================
C      | 708.sqlite_r(base, peak) 714.cpython_r(base, peak) 777.zstd_r(base,
```

(Continued on next page)

Compiler Version Notes (Continued)

```
       | peak)
------------------------------------------------------------------------------
Intel(R) oneAPI DPC++/C++ Compiler for applications running on Intel(R) 64,
  Version 2025.3.0 Build 20251010
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------------------------------------------------------------------------------

==============================================================================
C++    | 706.stockfish_r(base, peak) 707.ntest_r(base, peak)
       | 727.cppcheck_r(base, peak) 753.ns3_r(base, peak)
------------------------------------------------------------------------------
Intel(R) oneAPI DPC++/C++ Compiler for applications running on Intel(R) 64,
  Version 2025.3.0 Build 20251010
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------------------------------------------------------------------------------

==============================================================================
C++, C | 710.omnetpp_r(base, peak) 721.gcc_r(base, peak) 723.llvm_r(base,
       | peak) 729.abc_r(base, peak) 734.vpr_r(base, peak) 735.gem5_r(base,
       | peak) 750.sealcrypto_r(base, peak)
------------------------------------------------------------------------------
Intel(R) oneAPI DPC++/C++ Compiler for applications running on Intel(R) 64,
  Version 2025.3.0 Build 20251010
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------------------------------------------------------------------------------
```

Base Compiler Invocation

C benchmarks:
icx

C++ benchmarks:
icpx

Benchmarks using both C and C++:
icpx icx

Base Portability Flags

706.stockfish_r: -DSPEC_LP64
707.ntest_r: -DSPEC_LP64
708.sqlite_r: -DSPEC_LP64
710.omnetpp_r: -DSPEC_LP64

(Continued on next page)

Base Portability Flags (Continued)

714.cpython_r: `-DSPEC_LP64`
721.gcc_r: `-DSPEC_LP64`
723.llvm_r: `-DSPEC_LP64`
727.cppcheck_r: `-DSPEC_LP64`
729.abc_r: `-DSPEC_LP64`
734.vpr_r: `-DSPEC_LP64`
735.gem5_r: `-DSPEC_LP64`
750.sealcrypto_r: `-DSPEC_LP64`
753.ns3_r: `-DSPEC_LP64`
777.zstd_r: `-DSPEC_LP64`

Base Optimization Flags

C benchmarks:
`-m64 -std=c18 -Wl,-z,muldefs -xsierraforest -O3 -ffp-model=fast -flto -mfpmath=sse -funroll-loops -qopt-mem-layout-trans=4 -L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc`

C++ benchmarks:
`-m64 -std=c++17 -Wl,-z,muldefs -xsierraforest -O3 -ffp-model=fast -flto -mfpmath=sse -funroll-loops -qopt-mem-layout-trans=4 -L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc`

Benchmarks using both C and C++:
`-m64 -std=c++17 -std=c18 -Wl,-z,muldefs -xsierraforest -O3 -ffp-model=fast -flto -mfpmath=sse -funroll-loops -qopt-mem-layout-trans=4 -L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc`

Peak Compiler Invocation

C benchmarks:
`icx`

C++ benchmarks:
`icpx`

Benchmarks using both C and C++:
`icpx icx`

Peak Portability Flags

Same as Base Portability Flags

Peak Optimization Flags

C benchmarks:
-m64 -std=c18 -Wl,-z,muldefs -fprofile-generate(pass 1)
-fprofile-use=default.profdata(pass 2) -xCORE-AVX2(pass 1)
-ffp-model=fast -xsierraforest(pass 2) -flto -qopt-mem-layout-trans=4
-O3 -mfpmath=sse -funroll-loops
-L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc

C++ benchmarks:

706.stockfish_r: -m64 -std=c++17 -Wl,-z,muldefs
-fprofile-generate(pass 1)
-fprofile-use=default.profdata(pass 2) -xCORE-AVX2(pass 1)
-ffp-model=fast -xsierraforest(pass 2) -flto
-qopt-mem-layout-trans=4 -O3 -mfpmath=sse -funroll-loops
-L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc

707.ntest_r: basepeak = yes

727.cppcheck_r: basepeak = yes

753.ns3_r: Same as 706.stockfish_r

Benchmarks using both C and C++:

710.omnetpp_r: -m64 -std=c++17 -std=c18 -Wl,-z,muldefs
-fprofile-generate(pass 1)
-fprofile-use=default.profdata(pass 2) -xCORE-AVX2(pass 1)
-ffp-model=fast -xsierraforest(pass 2) -flto
-qopt-mem-layout-trans=4 -O3 -mfpmath=sse -funroll-loops
-L/opt/intel/oneapi/compiler/2025.3/lib -lqkmalloc

721.gcc_r: basepeak = yes

723.llvm_r: Same as 710.omnetpp_r

729.abc_r: basepeak = yes

734.vpr_r: basepeak = yes

(Continued on next page)

Peak Optimization Flags (Continued)

735.gem5_r: `Same as 710.omnetpp_r`

750.sealcrypto_r: `basepeak = yes`

The flags files that were used to format this result can be browsed at
`http://www.spec.org/cpu2026/results/flags/Intel-ic2025-official-linux64-cpu2026-0.902.html`
`http://www.spec.org/cpu2026/results/flags/Dell-Platform-Flags-PowerEdge-Intel-Xeon-v1.19.html`

You can also download the XML flags sources by saving the following links:
`http://www.spec.org/cpu2026/results/flags/Intel-ic2025-official-linux64-cpu2026-0.902.xml`
`http://www.spec.org/cpu2026/results/flags/Dell-Platform-Flags-PowerEdge-Intel-Xeon-v1.19.xml`

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Tested with SPEC CPU®2026 v0.902.0 on 2026-02-04 16:26:34-0500.
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