

AMD OPTERON™ processor

core of the cloud



Why AMD Opteron™ Processors?

Here are some quick facts about why you should bid AMD Opteron™ processors:

1

The Three Ps: Power, Price, Performance

Power

AMD Opteron™ 6200 Series processors feature up to 39% lower power per core than Intel Xeon E5-2600 Series processors¹.

Price

AMD Opteron™ 6200 Series processors offer up to 25% lower processor price/performance than Intel E5-2600 Series processors².

Performance

AMD Opteron™ 6200 Series processors are the world's only 16-core x86 processors, delivering up to 60-160% more cores than competing processors³.

2

The AMD Opteron™ 6200 Series processor is the world's first and only 16-core x86 server processor, making it an ideal solution for software that demands more cores for efficient operation. With consistent memory support speeds and full speed I/O across all AMD Opteron™ 6200 processors, customers don't have to make feature trade-offs when they buy down the stack. Plus, we use the same die and chip set across our product families so customers can seamlessly upgrade processors, move virtual machines and easily migrate software between systems.

3

Dual Bidding: What's in it for you?

Be a differentiator and possibly make more margin! Rather than just quoting the same Intel-based servers, stand out from your competitors by offering a credible AMD alternative. Give yourself the opportunity to win new business and potentially increase your margins. AMD Opteron™ processor-based servers can offer your customers competitive performance and efficiency at an attractive cost advantage, ideal for winning new customers or reactivating business that has been lost due to budget reductions.

4

Four Things to know about AMD

1. AMD has the world's fastest and most advanced graphics cards⁴.
2. AMD APU technology accelerates the performance of more than 200+ applications including Windows®, Internet Explorer, Google Chrome, Firefox and Adobe®.
3. AMD holds the Guinness World Record for the Fastest Overclocked CPU (8.429 GHz)⁵.
4. The discrete-class AMD Radeon™ Graphics available in all AMD APU-powered PCs can be found in the Nintendo Wii, Microsoft Xbox 360 and Apple PCs.

5

Five Things to know about AMD Opteron™ processors

1. AMD has been helping to build the highest performing supercomputers in the world for many years, including 24 of the 100 most powerful systems in the most recent Top 500 list⁶.
2. Within the last year, enterprises relied on over 500,000 AMD Opteron™ based servers⁷.
3. AMD has powered special effects in movies that have collectively netted billions in worldwide box office revenues.
4. AMD Opteron™ processors help drive Scuderia Ferrari further, faster. See how at www.amd.com/ferrari
5. The AMD Opteron™ 4200 Series processor is the world's lowest-power-per-core processor at fewer than 5 watts per core⁸.

For more information, please visit www.amd.com/opteron

1. Based on AMD Opteron 6200 Series processor with 16 cores at 85W TDP (5.3125W/core) versus lowest wattage, highest core Intel Xeon processor with 8 cores at 70W TDP (8.75W/core) according to www.intel.com as of 3/14/12.

2. SPEC and SPECint are registered trademarks of the Standard Performance Evaluation Corporation. The result using AMD Opteron™ processor Model 6284 SE is an estimate. The result using Intel Xeon processor Model E5-2690 reflects results published on www.spec.org/cpu2006/results as of 4/17/12. The comparison is based on the best performing two-socket servers using these two processors. For the latest SPECint®_rate2006 results, visit www.spec.org/cpu2006/results. Pricing reflects planned AMD 1KU tray pricing and actual pricing on www.intel.com as of 4/17/12, and is subject to change. For the latest SPECint_rate2006 results, visit <http://www.spec.org/cpu2006/results>. Two-Socket Server SPECint®_rate2006: 574 (est.) using 2 x AMD Opteron™ 6284 SE (16-core 2.7GHz) processors, 128GB (16 x 8GB DDR3-1600) memory, Red Hat Enterprise Linux™ Server 64-bit, x86_64 Compiler Suite, 698, Cisco UCS C240 M3 (Intel Xeon E5-2690, 2.90 GHz), 128 GB (16 x 8 GB 2Rx4 PC3-12800R-11, ECC), Red Hat Enterprise Linux Server release 6.2 (Santiago) 2.6.32-220.el6.x86_64, C/C++: Version 12.1.0.225 of Intel C++ Studio XE for Linux. <http://www.spec.org/cpu2006/results/res2012q2/cpu2006-20120313-20140.html>. Two-Socket Pricing: AMD Opteron processor Model 6284 SE planned pricing is \$1,265 per processor as of 4/17/12 and Intel Xeon processor Model E5-2690 cost \$2057 per processor, according to <http://www.intel.com/pricelist.cfm> as of 4/17/12. SVR-127.

3. Comparison of 16-core AMD Opteron™ 6200 Series processor with 8-core Intel Xeon E5-2600 Series processor and 10-core Intel Xeon E7 Series processors according to www.intel.com/pricelist.cfm as of 4/12/12. SVR-30.

4. Based on GCN Architecture, the world's first 28nm graphics architecture, the AMD Radeon™ HD 7970 and HD 7950 graphics achieve 3DMark® 11 scores in excess of X2700 and X2200, respectively. These results are the two highest scores achieved by single-GPU graphics cards on stock platforms as of 26 January, 2012. System configuration: Intel Core i7-3960X (3.3GHz), MSI X79A-GD65 8D, 16GB DDR3-1600 (9-9-9-24) and Windows® 7 64-bit. Testing based on AMD Catalyst™ 8.921.2. The NVIDIA® GeForce™ GTX 580, NVIDIA's highest performing single-GPU graphics card, was evaluated using NVIDIA ForceWare 290.53 BETA and scored X2124.

5. Testing conducted in AMD performance labs using liquid helium. Final frequency obtained was 8.429GHz on August 31, 2011. AMD's product warranty does not cover damages caused by overclocking, even when overclocking is enabled via AMD software.

6. Taken from <http://www.top500.org/lists/2012/06/100> as of June 1, 2012.

7. Based on AMD internal estimates from the IDC Worldwide Quarterly Server Tracker, 2Q12, July 2012.

8. As of March 16, 2012 AMD Opteron™ processor Models 4200 EE have the lowest known power per core of any x86 server processor, at 35W TDP (35W/8 = 4.375W/core). Intel's lowest power per core server processor, Intel Xeon E5-2650L, is 70W TDP (70W/8 = 8.75W/core). See www.intel.com/pricelist.cfm as of 3/16/12. Previous record held by AMD Opteron processor Models 4100 EE at 35W TDP / 6 cores = 5.83 W/core. SVR-58.