

AMD Radeon™ Dual Graphics Technology Cheat Sheet

Dual Graphics Talking Points

- Boost visual performance up to 123% when combining the AMD Quad-Core A8 desktop APU with the AMD Radeon™ HD 6670 graphics card¹
- Only the AMD A-Series APUs' discrete-level graphics cores stay on when paired with select AMD Radeon™ HD 6000 Series graphics cards for more total graphics cores
- Smoother game play experience with the latest DirectX® 11 games
- Connect up to 3 monitors to AMD Radeon™ discrete graphics cards in AMD Eyefinity technology mode for an immersive gaming experience²

The Power of AMD Radeon™ Graphics Multiplied

AMD Dual Graphics technology platform unleashes the processing power and brilliant DirectX® 11 graphics you need to create an immersive, vivid HD entertainment and gaming experience.

AMD A-Series APUs and AMD Radeon™ graphics both support DirectX® 11. With AMD Dual Graphics, users can experience gaming at higher resolutions with greater image quality and **boost visual performance up to 123%** when combining the AMD Quad-Core A8 desktop APU with the AMD Radeon™ HD 6670 graphics card.¹

A Unique Competitive Advantage against Intel and NVIDIA

Unlike the competition, AMD A-Series APUs' discrete-level graphics cores stay on when paired with select AMD Radeon™ HD 6000 Series graphics cards for more total graphics cores.

- Intel: When an AMD Radeon™ discrete GPU is added to an Intel Sandy Bridge processor, the performance and features of the Intel graphics processor are shut off, offering no additional graphics performance beyond the capabilities of the AMD Radeon™ GPU. When added to an AMD A-Series APU, select AMD Radeon™ discrete GPUs will work in tandem with the APU's on-die graphics cores to provide a boost in performance.
- NVIDIA: The addition of an NVIDIA GPU disables the integrated graphics capabilities of both Intel Sandy Bridge processors and AMD A-Series APUs, providing no combined graphics performance above the capabilities of the NVIDIA GPU.

Dual Graphics Competitive Benchmarks

Play DirectX® 11 games up to 50% faster with an AMD A8 APU-based PC featuring AMD Radeon™ HD 6690D2 dual graphics compared to an Intel Core i5 and Nvidia discrete graphics-based PC.³

AMD Radeon™ Dual Graphics requires an AMD "A" series APU plus an AMD Radeon™ discrete graphics configuration and is available on Windows® 7 Professional, Windows 7 Ultimate, Windows® 7 Home Premium, and/or Windows® 7 Home Basic OS. Linux OS supports manual switching which requires restart of X-Server to engage and/or disengage the discrete graphics processor for dual graphics capabilities. With AMD Radeon™ Dual Graphics, full enablement of all discrete graphics video and display features may not be supported on all systems and may depend on the master device to which the display is connected.



1. Boost visual performance up to 123% when you combine this AMD Quad-Core A8 APU with the AMD Radeon™ HD 6670 graphics card. Testing done in AMD Performance Labs using 3DMark Vantage – Performance Benchmark as a metric for visual performance, in the best of 3 runs. The AMD A8 APU-based system scored 4038 marks while the AMD A8 APU-based Dual Graphics system scored 9021 marks. All scores rounded to the nearest whole number. The AMD A8 Dual Graphics-based system consists of an AMD Quad-Core A8-3850 APU with AMD Radeon™ HD 6690D2 Dual Graphics (AMD Radeon HD 6550 Discrete-Class graphics plus AMD Radeon™ HD 6670 discrete graphics), 8GB DDR3-1600 system memory, a Real SSD C300 hard drive (256G) and Microsoft Windows Ultimate 64-bit. DTLY-I7

2. AMD Eyefinity technology works with games that support non-standard aspect ratios, which is required for panning across multipledisplays. To enable more than two displays, additional panels with native DisplayPort™ connectors, and/or DisplayPort™ compliant active adapters to convert your monitor's native input to your card's DisplayPort™ or Mini-DisplayPort™ connector(s), are required. SLS (Single Large Surface) functionality requires an identical display resolution on all configured displays. AMD Radeon™ "G" series and AMD Radeon™ "G2" Dual Graphics series do not support AMD Eyefinity technology. Check with your component or system manufacturer for specific mode capabilities and supported technologies..

3. Testing done in AMD Performance Labs measuring frames per second (fps) while playing DIRT 2 using mainstream settings at a resolution of 1680x1050. The AMD A8 Dual Graphics-based PC reported 60 fps while the Intel Core i5 with Nvidia graphics-based PC reported 40 fps. Scores report the average fps, rounded to the nearest whole frame, of the best of 3 runs. The AMD A8 Dual Graphics-based system consists of an AMD Quad-Core A8-3850 APU with AMD Radeon™ HD 6690D2 Dual Graphics (AMD Radeon HD 6550 Discrete-Class graphics plus AMD Radeon™ HD 6670 discrete graphics), 8GB DDR3-1600 system memory, a Real SSD C300 hard drive (256G) and Microsoft Windows Ultimate 64-bit. The Intel Core i5 2500k CPU desktop platform consists of the Intel Core i5-2500k CPU (Sandy Bridge), Nvidia GT440 discrete graphics, Intel P67 Express Chipset, 8GB (4x2GB), DDR3-1333 system memory, a Real SSD C300 hard drive (256G) and Microsoft Windows Ultimate 64-bit. DTLY-C14

Supported AMD Radeon™ Dual Graphics Technology Combinations




Desktop

AMD Desktop APU + AMD Desktop Discrete Graphics = AMD Dual Graphics			
APU Series*	Discrete Class AMD Radeon™ Graphics	Recommended AMD Radeon™ Discrete Graphics	AMD Radeon™ Dual Graphics
	AMD Radeon™ HD 6550D	AMD Radeon™ HD 6670	AMD Radeon™ HD 6690D2
		AMD Radeon™ HD 6570	AMD Radeon™ HD 6630D2
		AMD Radeon™ HD 6450	AMD Radeon™ HD 6550D2
	AMD Radeon™ HD 6530D	AMD Radeon™ HD 6670	AMD Radeon™ HD 6690D2
		AMD Radeon™ HD 6570	AMD Radeon™ HD 6610D2
		AMD Radeon™ HD 6450	AMD Radeon™ HD 6550D2

NOTE: AMD A4 APU SKUs not listed. Recommendation is to upsell from A4 to A6 rather than sell AMD A4 APU with Dual Graphics.

* Only available on select models

Notebook

AMD Notebook APU + AMD Notebook Discrete Graphics = AMD Notebook Dual Graphics			
APU Series	Discrete Class AMD Radeon™ Graphics	AMD Radeon™ Discrete Graphics Card	AMD Radeon™ Dual Graphics
	AMD Radeon™ HD 6620G	AMD Radeon™ HD 6770M	AMD Radeon™ HD 6775G2
		AMD Radeon™ HD 6750M	AMD Radeon™ HD 6755G2
		AMD Radeon™ HD 6730M	AMD Radeon™ HD 6760G2
		AMD Radeon™ HD 6650M	AMD Radeon™ HD 6740G2
		AMD Radeon™ HD 6630M	AMD Radeon™ HD 6690G2
		AMD Radeon™ HD 6490M	AMD Radeon™ HD 6645G2
		AMD Radeon™ HD 6470M	AMD Radeon™ HD 6640G2
	AMD Radeon™ HD 6520G	AMD Radeon™ HD 6450M	AMD Radeon™ HD 6640G2
		AMD Radeon™ HD 6770M	AMD Radeon™ HD 6775G2
		AMD Radeon™ HD 6750M	AMD Radeon™ HD 6755G2
		AMD Radeon™ HD 6730M	AMD Radeon™ HD 6740G2
		AMD Radeon™ HD 6650M	AMD Radeon™ HD 6720G2
		AMD Radeon™ HD 6630M	AMD Radeon™ HD 6680G2
		AMD Radeon™ HD 6490M	AMD Radeon™ HD 6545G2
		AMD Radeon™ HD 6470M	AMD Radeon™ HD 6540G2
	AMD Radeon™ HD 6480G	AMD Radeon™ HD 6450M	AMD Radeon™ HD 6540G2
		AMD Radeon™ HD 6490M	AMD Radeon™ HD 6515G2
		AMD Radeon™ HD 6470M	AMD Radeon™ HD 6510G2
		AMD Radeon™ HD 6430M	AMD Radeon™ HD 6510G2

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