

Hybrid SLI

Supplementary Guide

E4563 / February, 2009

1. NVIDIA[®] Hybrid SLI[®] Technology

The NVIDIA[®] Hybrid SLI[®] technology includes two primary features: GeForce[®] Boost and HybridPower[™]. GeForce[®] Boost enables the NVIDIA[®] discrete Graphics Process Unit (dGPU) to work with the NVIDIA[®] motherboard Graphics Process Unit (mGPU) to increase the dGPU's performance. HybridPower[™] enables low-power operation when the performance of the dGPU is not required. You can switch off the dGPU for a quiet, powersaving computer environment.

- Only Windows® Vista OS supports the NVIDIA® Hybrid SLI® technology.
- GeForce[®] Boost supports up to two displays simultaneously (both connected to either the mGPU or the dGPU).
- The Additional Displays mode allows you to connect two or more displays to both the mGPU and the dGPU. In the Additional Displays mode, up to four displays can be connected (up to two mGPU-driven displays and up to two dGPU-driven displays).
- HybridPower[™] requires displays to be connected to the mGPU. HybridPower[™] cannot be enabled on dGPU-driven displays.
- Refer to <u>www.nvidia.com/hybridsli</u> for the list of GPUs that support NVIDIA[®] Hybrid SLI[®].

2. System requirements

Before using Hybrid SLI®, check if your system meets the following requirements:

For best GeForce Boost performance

- AMD[®] Phenom[™] 9600 CPU (operating at 1800Mhz or higher)
- 2 x 1024MB DDR2-800 DRAM
- Discrete GPU recommended for GeForce Boost
- At least 256MB frame buffer size for the motherboard GPU

For best HybridPower benefits

- AMD[®] Athlon[™] X2 3800+ CPU (operating at 1800Mhz or higher)
- 2 x 1024MB DDR2-667 DRAM
- Discrete GPU recommended for HybridPower
- At least 256MB frame buffer size for the motherboard GPU

Enabling Hybrid SLI



3.

- Before enabling GeForce[®] Boost or HybridPower[™], ensure that you have installed the recommended dGPU for GeForce[®] Boost or HybridPower[™] on your motherboard.
- Ensure that you have connected your display to the dGPU. Otherwise, the motherboard cannot detect your display and no image appears.
- The BIOS setup screens are for reference only. They may not exactly match what you see on your screen.

To enable Hybrid SLI:

- 1. Turn on the system and hold down **** during the Power-On Self-Test (POST) to enter the BIOS Setup program.
- Go to Advanced > Chipset > SouthBridge Configuration. Set the Primary Graphics Adapter item to [Internal VGA First], and [Hybrid SLI Mode] item to [mGPU always enable].

	Advanced	IOS SETUP UTILITY		
	SouthBridge chipset Configuration			
	Primary Graphics Adapter Hybrid SLI Mode Hybrid SLI Frame buffer Size	[Internal VGA Firs] [mGPU always enable] [128MB]	PCI Inte PCIE	VGA Card First ornal VGA First VGA Card First
I	PCIE 2.0 Support	[Auto]		
	AZALIA Audio Front Panel Select	[Internal codec+E} [HD Audio]		
	Onboard LAN OnBoard LAN Boot ROM SouthBridge ACPI HPET TABLE	[Auto] [Disabled] [Enabled]	+→ ↑↓ +- F1	Select Screen Select Item Change Option General Help

- 3. Press <F10> to save the changes and exit the BIOS Setup program.
- Turn off the system, disconnect your display from the dGPU, and connect your display to the onboard VGA port at the rear panel.
- Turn on the system and hold down during POST to enter the BIOS Setup program.
- Go to Advanced > Chipset > SouthBridge Configuration. Set the [Hybrid SLI Frame buffer Size] item to [256MB].

	Advanced	IOS SETUP UTILITY			
I	SouthBridge chipset Configuration				
	Primary Graphics Adapter Hybrid SLI Mode Hybrid SLI Frame buffer Size	[Internal VGA Firs] [mGPU always enable] [256MB]	PCI Inte PCIE	VGA Card First rnal VGA First VGA Card First	
	PCIE 2.0 Support	[Auto]			
	AZALIA Audio Front Panel Select	[Internal codec+E} [HD Audio]			
	Onboard LAN OnBoard LAN Boot ROM SouthBridge ACPI HPET TABLE	[Auto] [Disabled] [Enabled]	↔ 1↓ +- R1	Select Screen Select Item Change Option General Helm	
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- 7. Press <F10> to save the changes, then the system reboots.
- 8. From the Windows[®] Vista desktop, go to **Start > Control Panel > User Accounts and Family Safety**, then turn off User Account Control.
- Place the Support DVD into the optical drive, and go to the **Drivers** menu to install the NVIDIA Chipset Driver Program.
- 10. Restart the system.
- 11. If the driver is installed correctly, you will find the Hybrid SLI icon in the system tray.

The Hybrid SLI icon indicates that the system is in the **Boost Performance** mode and that GeForce Boost is enabled. The mGPU shares the rendering load with the dGPU and boost the dGPU's performance.

12. Click the Hybrid SLI icon and select Save Power.

The icon changes from to the indicating that the system is in the **Save Power** mode. In this mode, the dGPU is switched off and the mGPU is both rendering and displaying.

When the **Save Power** mode is enabled, the dGPU does not appear in the Windows[®] Device Manager.

Second Computer Management				
File Action View Help				
Computer Management (Local	M3N-HTDELUXE-PC			
System Tools Scheduler	B B B B			
 B Event Viewer Shared Folders Local Users and Groups Reliability and Performe 	The Second			
Device Manager Storage Disk Management Services and Applications	Hoppy disk drives Getail Floppy drive controllers Getail Floppy drive controllers Getail Floppy drive controllers Getail DE ATA/ATAPI controllers			

When the Save Power mode is disabled, both the mGPU and dGPU appear in the Device Manager.





When the Save Power mode is enabled, the dGPU is switched off and does not appear in the Device Manager.