

1. Product Overview

GeForce 8 Series

Features

- Nvidia® unified architecture with GigaThread technology
- Full Microsoft® DirectX® 10 Shader Model 4.0 support
- Nvidia® SLI ready
- True 128-bit floating point high dynamic-range (HDR) lighting
- Nvidia® Quantum Effects physics processing technology
- Dual-link DVI support up to 2560x1600
- Integrated HDTV supporting resolution up to 1024x768 when using an S-Video TV-out connector and up to 1920x1080i when using a HDTV adapter
- OpenGL 2.0 Optimizations and Support
- Built for Microsoft® Windows Vista

GeForce 7 Series

Features

- Nvidia® CineFX™ 4.0 engine powers the next generation of cinematic realism, delivering faster and smoother gameplay.
- Nvidia® UltraShadow™ II technology delivers more shadow processing power.
- Nvidia® Intellisample 4.0 technology delivers ultra-realistic visuals
- True High Dynamic-Range (HDR) rendering support
- Dual Integrated 400MHz RAMDAC
- Integrated HDTV support
- Microsoft® DirectX® 9.0 Shader Model 3.0 support ensures compatibility and performance for all DirectX® 9 applications and game titles
- Dual-link DVI support up to 2560x1600
- OpenGL 2.0 Optimizations and Support
- Windows Vista™ Ready

GeForce 6 Series

Features

- Nvidia® CineFX™ 3.0 engine powers the next generation of cinematic realism, delivering faster and smoother gameplay.
- Nvidia® UltraShadow™ II technology delivers more shadow processing power.
- Nvidia® Intellisample 3.0 technology delivers ultra-realistic visuals
- Dual Integrated 400MHz RAMDAC
- Integrated HDTV support
- Microsoft® DirectX® 9.0 Shader Model 3.0 support
- OpenGL 1.5 Optimizations and Support
- Windows Vista™ Ready

Geforce Family Overview

	Bus	Frame Buffer size	RAM type
GeForce 6200TC	PCI Express	128MB memory support	DDR1, DDR2
GeForce 6600LE	PCI Express	128MB\256MB	DDR1, DDR2, GDDR3
GeForce 6600	PCI Express	128MB\256MB	DDR1, DDR2, GDDR3
GeForce 6200A	AGP8x	128MB\256MB	DDR1, DDR2
GeForce 7100GS	PCI Express	128MB\256MB	DDR1, DDR2
GeForce 7300LE	PCI Express	128MB\256MB	DDR1, DDR2
GeForce 7300GS	PCI Express	128MB\256MB	DDR1, DDR2
GeForce 7300GT	PCI Express	128MB\256MB\512MB	DDR2, GDDR3
GeForce 7600GS	PCI Express	128MB\256MB\512MB	DDR2, GDDR3
GeForce 7600GT	PCI Express	128MB\256MB	GDDR3
GeForce 7300GT AGP	AGP 8x	256MB	DDR2
GeForce 7600GT AGP	AGP 8x	256MB	DDR2
GeForce 7900GS	PCI Express	256MB\512MB	GDDR3
GeForce 8500GT	PCI Express	256MB	DDR2
GeForce 8600GT	PCI Express	256MB\512MB	GDDR3
GeForce 8800GTS	PCI Express	320MB\640MB	GDDR3
GeForce 8800GTX	PCI Express	768MB	GDDR3

2. System Requirements for PCI Express graphics cards

- Intel Pentium 4, Intel Celeron, AMD Athlon64, AMD Sempron or compatible
- PCI Express x16 slot
- Windows XP or Windows 2000
- 128MB of system memory or above
- Installation software requires CD-ROM drive
- DVD playback requires DVD drive

3. System Requirements for AGP graphics cards

- Intel Pentium 4, Intel Celeron, AMD Athlon64, AMD Sempron or compatible
- AGP slot
- Windows 98SE or Windows XP or Windows 2000
- 128MB of system memory or above
- Installation software requires CD-ROM drive
- DVD playback requires DVD drive

4. Special Memory Requirements for GeForce 6200TC PCI Express

- 512MB of system memory or above

5. Hardware installation

1. Power down the computer and unplug all power cords.
2. Remove the cover from the computer case.
3. Locate the PCI Express x16 slot.
4. Remove the corresponding bracket next to the expansion slot.
5. Install the VGA card in the expansion slot and allow the card to sit firmly in position.
6. Some graphics cards are equipped with a 4-pin Power Connector. The user has to connect a power plug from the power supply of the computer directly to the on-board Power Connector of the graphics card.
7. Install the cover of the computer case.
8. All display devices (such as the CRT or the TV) should be powered off.
9. Connect the signal cable to the respective ports (CRT, DVI, TV).
10. Power up the all display devices.
11. Power up the computer unit.

Precaution: The TV-cable should always be connected between the TV set and the graphics card **BEFORE** the computer unit is powered up.

6. Software installation (building a new computer system)

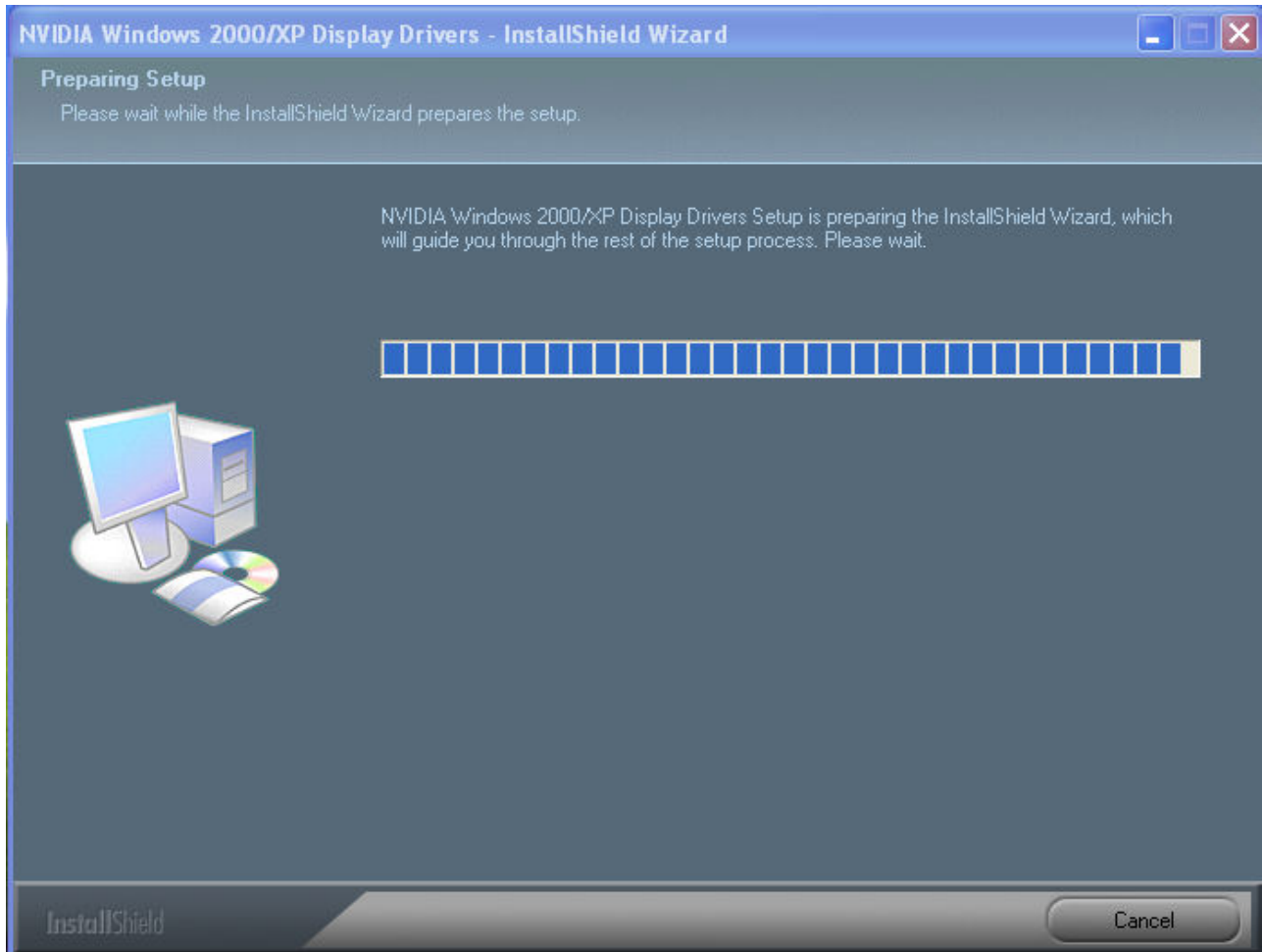
1. Allow the system to boot and load Windows.
2. The Windows system will detect a new graphics device and prompt the user to enter the path location of the driver paths.
3. Select "CANCEL" to abort the process.
4. Place the accompanying driver CD into the CD-ROM drive.
5. The following menu is displayed.



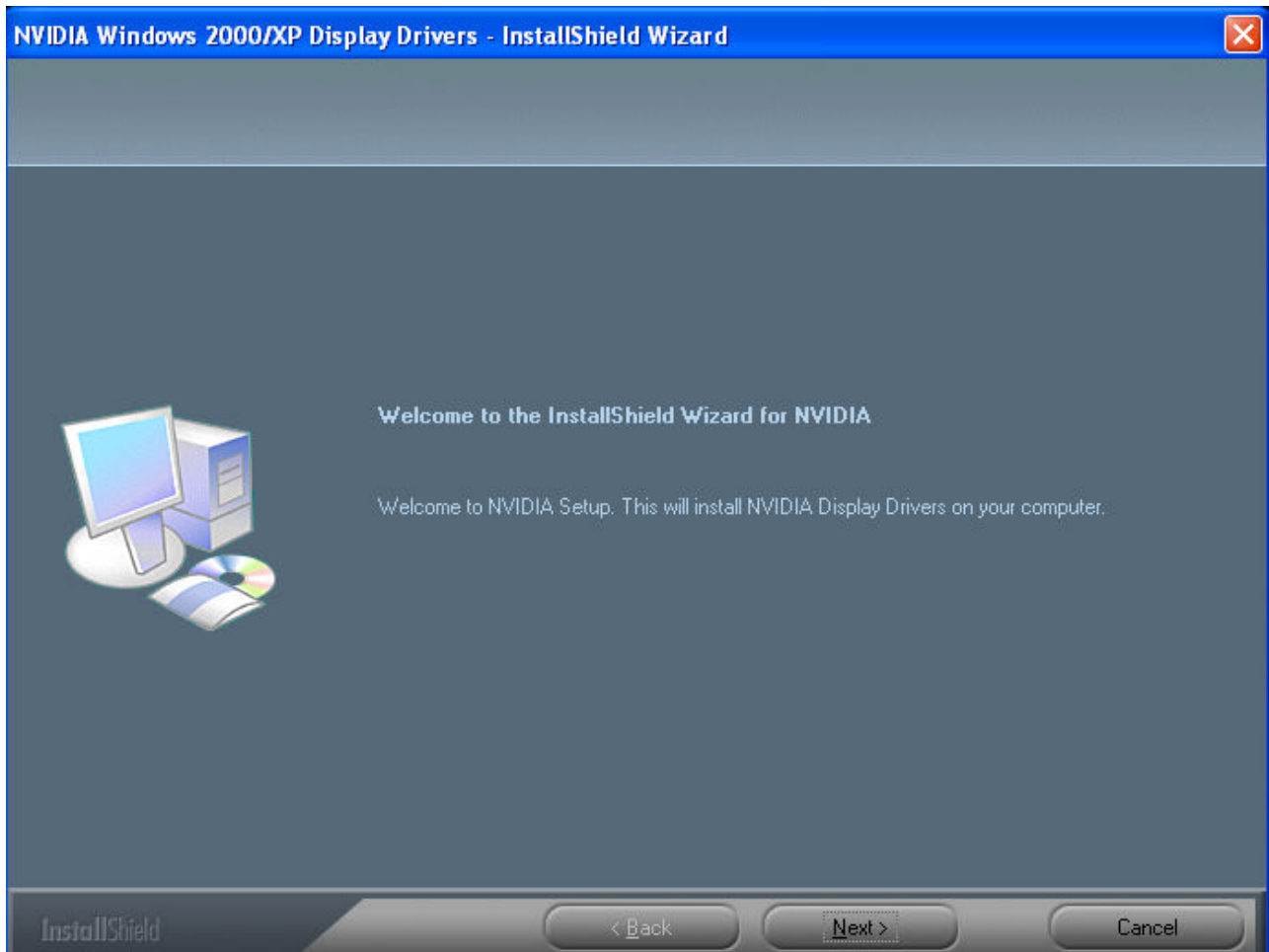
6. Select **Install Software**

7. Click the appropriate operating system in the corresponding GeForce family.

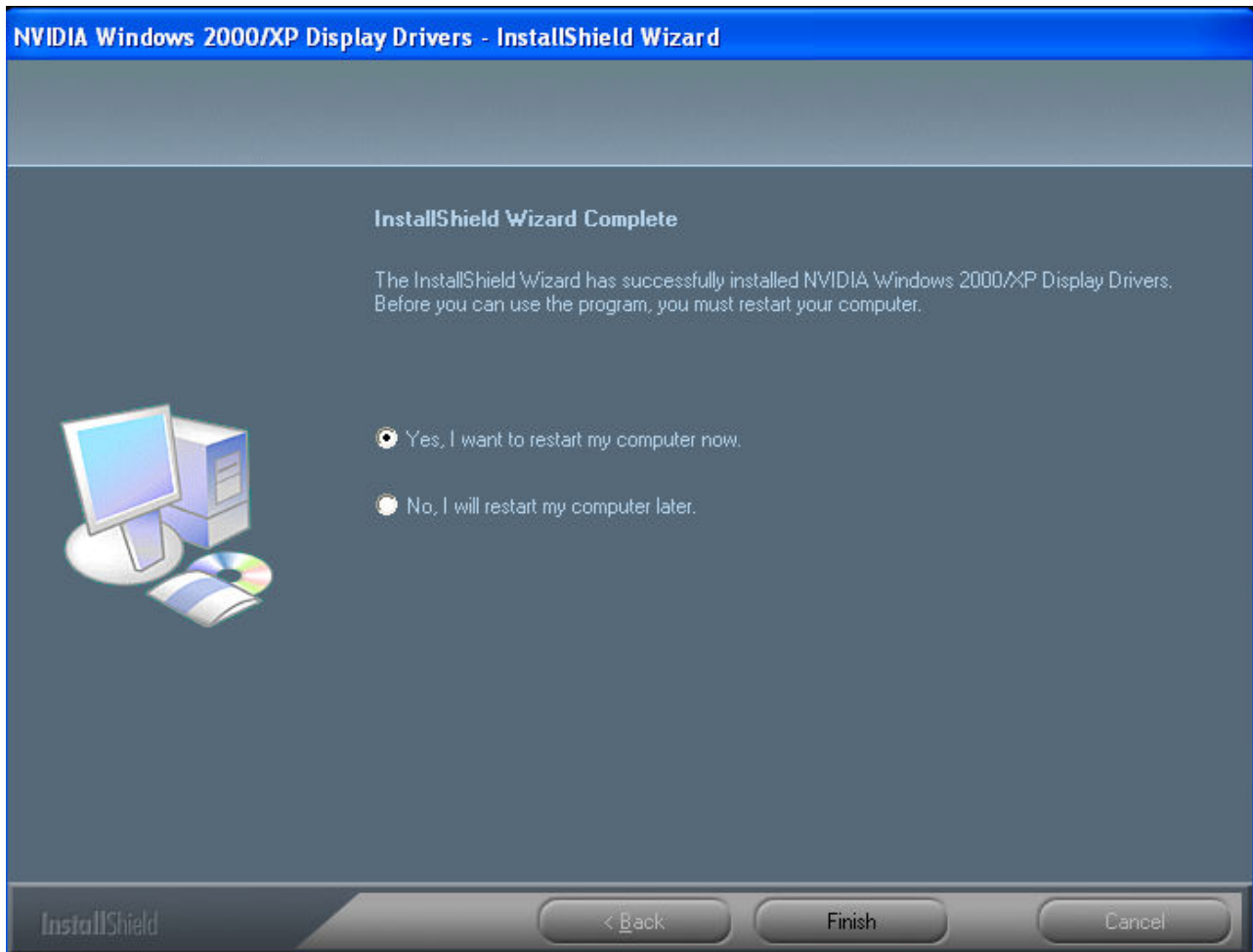




8. Click **next**.



9. Allow the system to restart

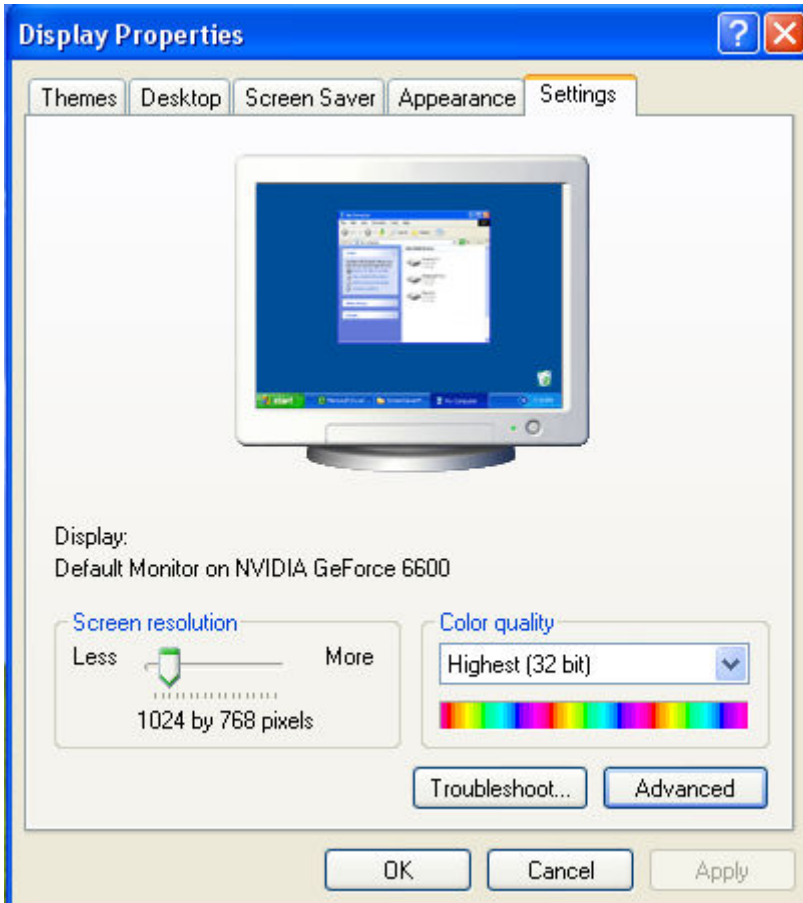


7. Software installation (upgrading the graphics card; replacing the existing card by the Nvidia GeForce graphics card)

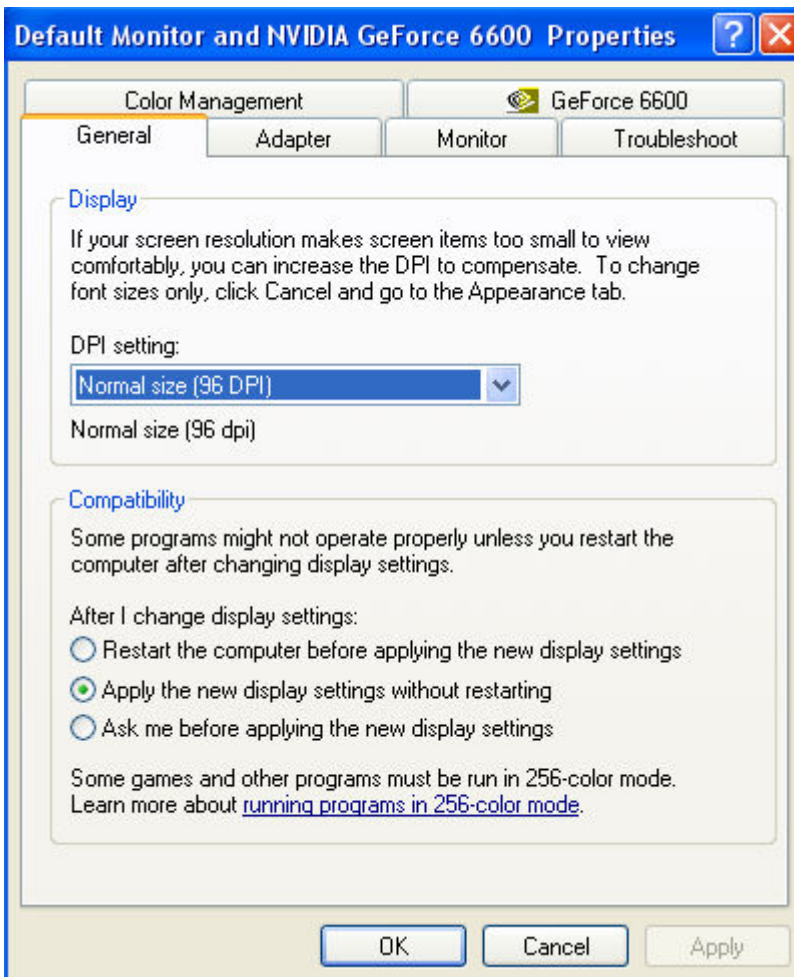
1. Power up the desktop computer.
2. Change the display driver to the **“standard VGA display driver”**.
3. Power down the computer and all display devices
4. Remove the cover of the computer case.
5. Remove the existing graphics card from the expansion slot.
6. Install the newly unpacked Nvidia VGA card in the expansion slot and allow the card to sit firmly in position.
7. Install the cover of the computer case.
8. All display devices (such as the CRT or the TV) should be powered off.
9. Connect the signal cable to the respective ports (CRT, DVI, TV).
10. Power up the all display devices.
11. Power up the computer unit.
12. Follow the steps outlined in the previous section **“Software installation (building a new desktop computer unit)”**.

8. Customizing the display properties

1. On the Windows desktop, hit the right button of the mouse.
2. Choose the "Properties".
3. Click the "Settings" tab to proceed to the next step.

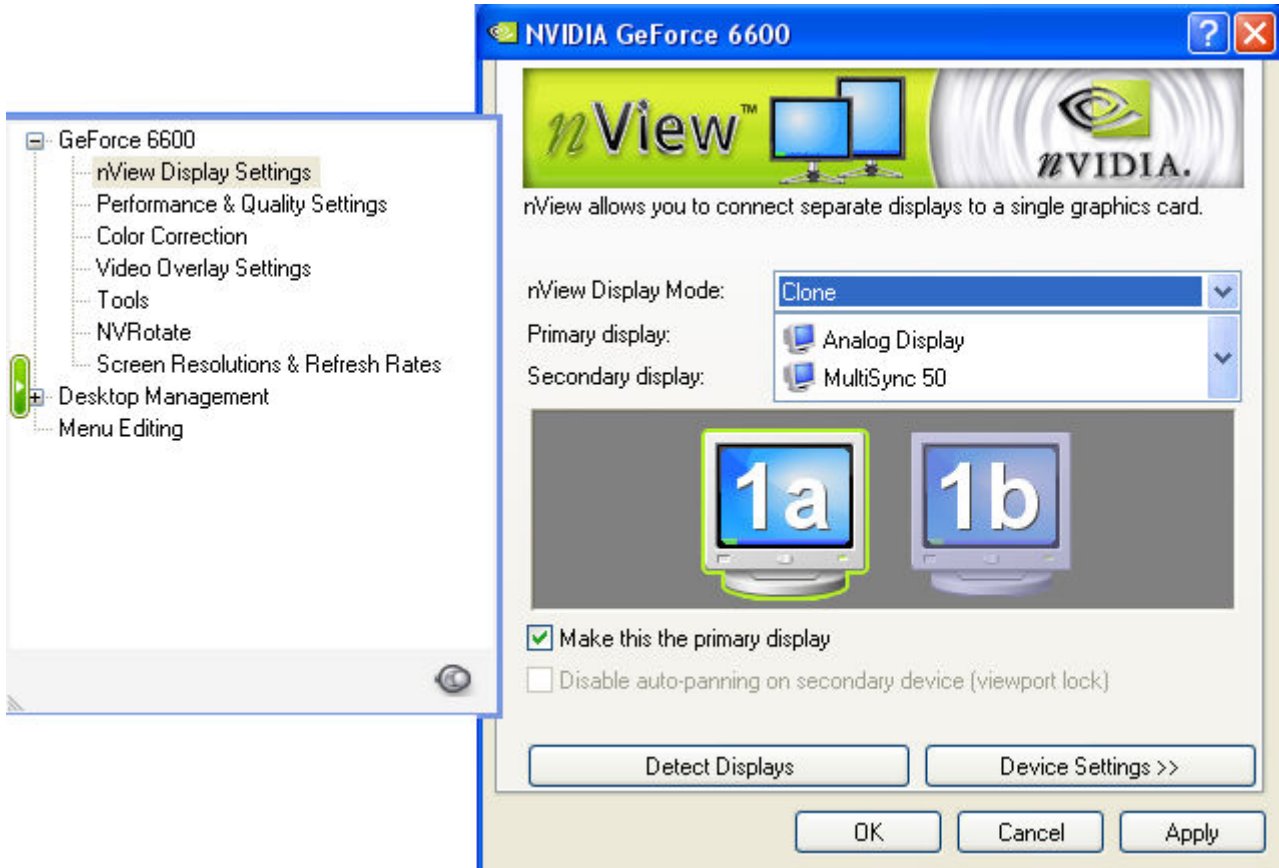


Click **Advanced** and the following menu is displayed:



■ *nView Display Settings*

Click the “GeForce 6XXX” tab (for example, **GeForce 6600**). Select the “**nView Display Settings**” to activate the following menu which allows the user to define primary and secondary display devices in a multi-display configuration.



9. Trouble-shooting Notes

The monitor does not display anything when the computer boots up.

- ◆ Make sure the graphics card is properly seated in the expansion slot.
The user is advised to remove the computer case and remove the graphics card. The card is then re-inserted into the expansion slot again. (The gold-fingers of the card edge should be free from any foreign particles or any adhesive materials which result in poor card-edge contact).
- ◆ Make sure that all signal cable is properly connected to the respective display devices.
- ◆ Make sure that electrical power has been applied to all the display devices.

How can the user know the BIOS version and the driver version?


1. On the Windows desktop, hit the right button of the mouse.
2. Choose the "Properties".
3. Click the "Settings" tab to proceed to the next step.
4. Click the "Options" tab and then click **Advanced**
5. Select the "GeForce 6xxx" tab to display the BIOS information and the driver version.

- GeForce 6600
 - Screen Adjustment
 - Display Mode Timing
 - Performance & Quality Settings
 - Color Correction
 - Video Overlay Settings
 - Tools
 - NVRotate
 - Screen Resolutions & Refresh Rates
 - Desktop Management
 - Menu Editing

Default Monitor and NVIDIA GeForce 6600 Proper... ? X

General Adapter Monitor Troubleshoot

Color Management GeForce 6600



Information about your NVIDIA-based graphics card and the system it is running on.

System information

Processor:	Intel(R) Pentium(R) 4 CPU 2.60GHz
Operating system:	Windows XP ()
DirectX version:	DirectX 8.1

Graphics card information

Processor:	GeForce 6600
Video BIOS version:	5.43.02.41
IRQ:	16
Bus:	PCI x0
Memory:	128 MB
ForceWare version:	71.81
TV Encoder Type:	NVIDIA integrated

Additional Properties... NVIDIA Information >>

OK Cancel Apply

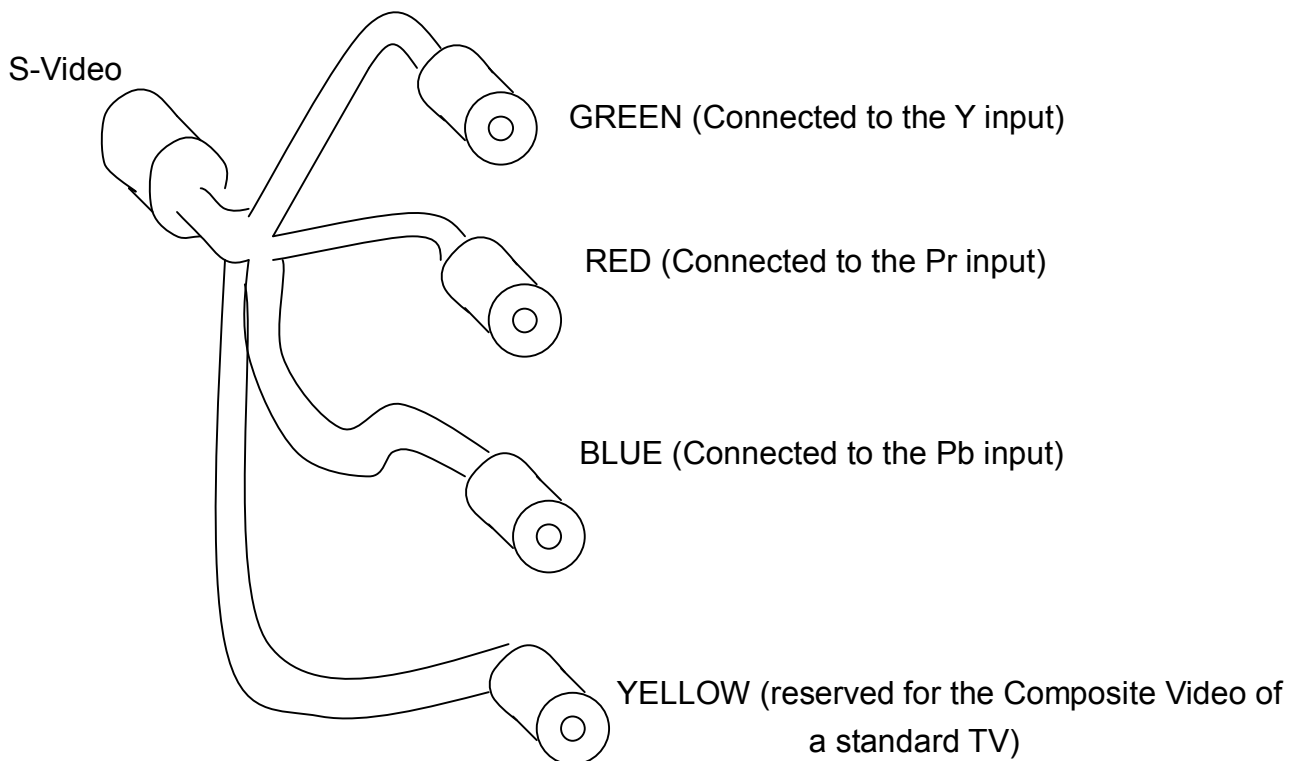
Why are Win98 and WinME drivers NOT provided for PCI Express graphics cards?

The user is advised to upgrade to Windows XP or Windows 2000 OS platform. Nvidia is not going to provide VGA drivers in legacy OS platform like Windows 98 and Windows ME. PCI Express is a new technology with potential strength that can only be unlocked in advanced Windows platforms. Similarly, new motherboards based on PCI Express core-logic chipsets are only equipped with WinXP and Win2000 drivers.

How should the optional HDTV Breakout Cable be connected to a High Definition TV?

The 7-pin S-Video Connector of the Breakout Cable should be connected to the S-Video Connector of the GeForce graphics card.

The user should obtain three more pieces of RCA cable to connect the Green terminal, the Red terminal and the Blue terminal of the Breakout cable to the Y, Pr, Pb inputs of the High Definition TV respectively.



Useful links

www.nvidia.com is a resource of technical information about the NVIDIA graphics technology and the site offers detailed product specifications for the full spectrum of NVIDIA graphics accelerators.

www.microsoft.com is helpful in providing end-users with software upgrades and OS service packs.