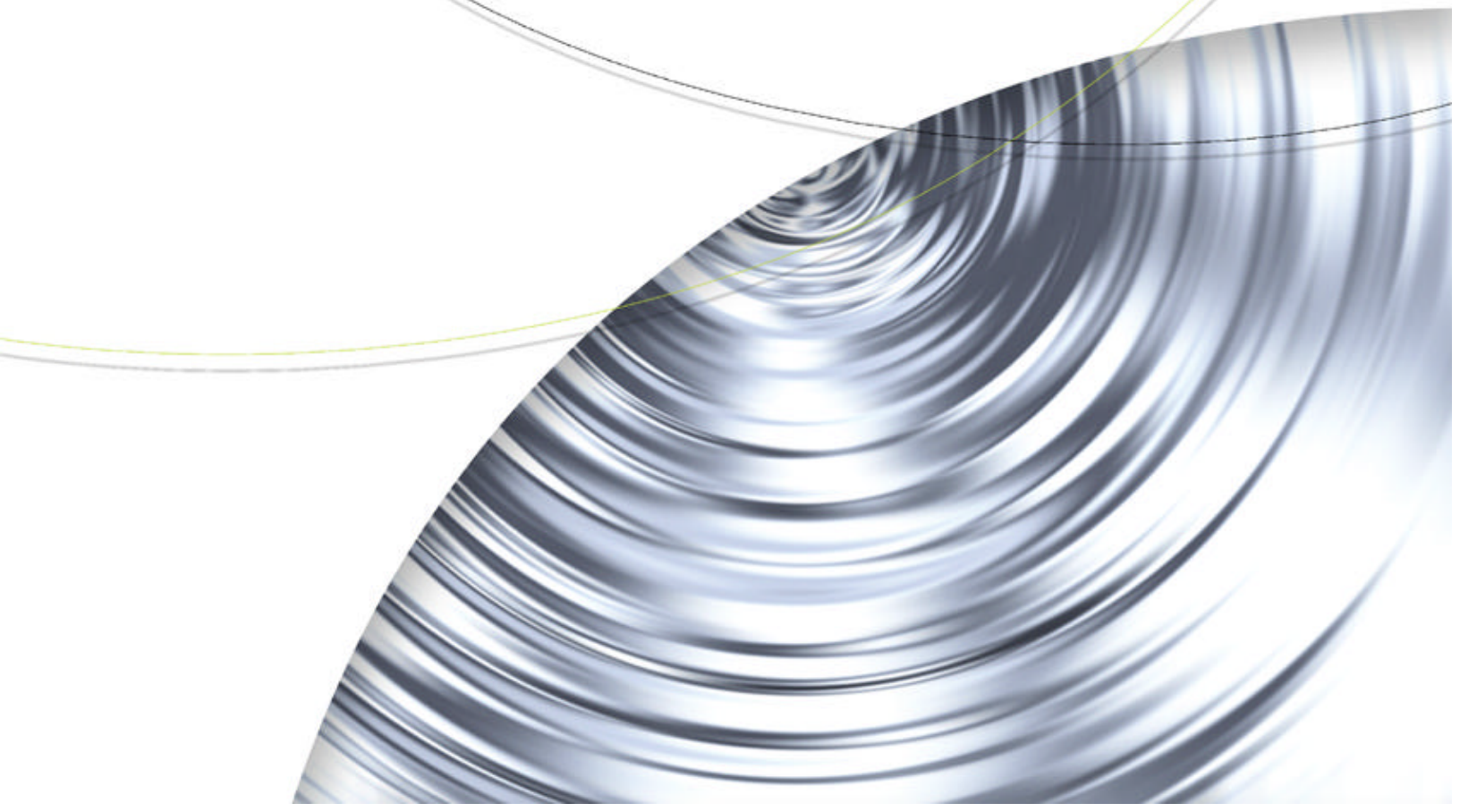
Application Note

nForce 220/420 Platform

Installing nForce Core Drivers Under Windows 98



Installing Core Drivers Under Windows 98

This application note provides instructions to install the NVIDIA nForce core drivers (GART, Ethernet, Audio, Audio Utilities, SMBUS and Memory Controller) under Windows 98. Currently, the NVIDIA installer supports Windows XP, Windows 2000 and Windows ME. Use the following procedure to install all NVIDIA devices under Windows 98 until the release of Windows 98 installer support.

To install the nForce integrated video driver, use the standard Windows installation steps for 'Updating a Video Driver.'

Driver Package Contents

It is recommended to have the following nForce drivers before proceeding:

- GART Driver
- Audio Drivers with Audio Utilities
- Ethernet Driver
- SMBUS Driver (System Management Bus)
- Memory Controller Driver

Installing GART Drivers

When a Windows 98 operating system is installed, there are a series of unknown devices in Windows 98 Device Manager. To install the nForce GART drivers, use the following procedure:

1. Extract the GART driver package to a temporary location.
   GART Manager is present in Device Manager under: PCI Standard Host CPU Bridge. Microsoft Generic Drivers are used until you upgrade with the proper GART drivers.
2. Go to the Device Manager (START➢CONTROL PANEL➢SYSTEM➢DEVICE MANAGER).
3. Look for the following devices:
   - NVIDIA nForce GART Manager
   - PCI Standard Host CPU Bridge
   - PCI standard PCI-to-PCI bridge device
4. Update the drivers using the ones saved into the temporary location in step 1.
5. Restart your system.

Installing the Audio Drivers

Use the following procedure to install nForce Audio drivers:

1. Extract the Audio driver package to a temporary location.
   Use the drivers from Audio Driver package to enumerate all unknown media class devices.
2. Go to the Device Manager (START➢CONTROL PANEL➢SYSTEM➢DEVICE MANAGER).
3. Look for the following devices:
   Unknown Drivers
   - NVIDIA Audio Codec Interface
   - NVIDIA Media Controller Processor
   Sound, Video, and Game Controllers
   - NVIDIA nForce Audio Codec Interface
   - NVIDIA nForce MCP Audio Processing Unit

   Note: Various nForce Audio items Under Sound, Video and Game Controllers will be replaced when the System Devices are updated.
4. Update the drivers using the ones saved into the temporary location in step 1.
5. Restart your system.

Installing Ethernet Drivers

Use the following procedure to install Ethernet drivers:

1. Extract the Ethernet driver package to a temporary location.
   Use the drivers from the Ethernet Driver package to enumerate the unknown Ethernet Device.
2. Go to the Device Manager (START➢CONTROL PANEL➢SYSTEM➢DEVICE MANAGER).
3. Look for the following devices:
   Unknown Drivers
   - NVIDIA Ethernet Device
   Network Adapters
   - NVIDIA nForce MCP Networking Adapter
4. Update the drivers using the ones saved into the temporary location in step 1.
5. Restart your system.

Installing SMBus Drivers

Use the following procedure to install Ethernet drivers:

1. Extract the SMBus driver package to a temporary location.
   SMBus needs to be enabled for DDC to function correctly and system management functions to be enabled.
2. Go to the Device Manager (START➢CONTROL PANEL➢SYSTEM➢DEVICE MANAGER).
3. Go to **Unknown Devices / PCI System Management Bus**
4. Update the drivers using the ones saved into the temporary location in step 1.
5. Restart your system.

Updating Memory Controller Drivers

1. Extract the files from the (os)\ memory directory of the driver package to a temporary location.
   Microsoft Generic Drivers will be used. To replace the Microsoft drivers with NVIDIA drivers, continue with Step 2.

> **Note:** Several instances of Memory Controller may be present in Device Manager under:
> - Windows 9x/ME or Windows 2000/XP
> - PCI Standard RAM Controller

2. Go to the Device Manager (START➢CONTROL PANEL➢SYSTEM➢DEVICE MANAGER).
3. Look for the following devices:
   System Devices
   - PCI Standard RAM Controller
   - NVIDIA nForce 420 Memory Controller
   - NVIDIA nForce 220/420 Memory Controller
4. Update *all* instances of these drivers using the ones saved into the temporary location in step 1.
5. Restart your system.

> **Note:** It is important to restart your computer after all drivers are installed.

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