Sun Ultra™ 20 M2 Workstation Product Notes

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Sun Ultra 20 M2 Workstation Product Notes

This document contains known issues and late-breaking information about the Sun Ultra™ 20 M2 workstation.

These Product Notes contain the following sections:

- "General Information" on page 2
- "Hardware and BIOS Issues" on page 4
- "Solaris OS Issues" on page 6
- "Linux Issues" on page 9
- "Windows Issues" on page 13

General Information

Support for the Sun Ultra 20 M2 Workstation

For support information visit the following URL:
http://www.sun.com/desktop/workstation/ultra20/support.xml

Documentation

The following is a list of the available Sun Ultra 20 M2 documentation:

- 819-6586 *Sun Ultra 20 M2 Workstation Product Notes*
- 819-6587 *Sun Ultra 20 M2 Workstation Installation Guide*
- 819-6583 *Sun Ultra 20 M2 Workstation Operating System Installation Guide*
- 819-6584 *Sun Ultra 20 M2 Workstation Service Manual*
- 819-6585 *Sun Ultra 20 M2 Workstation Safety and Compliance Guide*
- 819-6582 *Where to Find Sun Ultra 20 M2 Workstation Documentation*

The latest version of these Sun Ultra 20 Workstation documentation are available at:

http://docs.sun.com/app/docs/prod/ultra20m2.ws#hic

Supported Operating Systems

Sun supports the following operating systems for the Sun Ultra 20 M2 Workstation:

- Solaris 10 6/06 and later
- RHEL 3 U7 and later (32-bit and 64-bit)
- RHEL 4 U3 and later (32-bit and 64-bit)
- RHEL 5 Client (32-bit and 64-bit)
- SLES 9 SP3 and later (64-bit)
- SLED 10 (64-bit)
- Windows XP Professional x64 Edition SP0 and later
- Windows XP Professional SP2 and later
- Windows Vista Ultimate

- Windows Server 2003 SP2 and later

For more information on supported operating systems, go to:

http://www.sun.com/desktop/workstation/ultra20/os.jsp

Latest Firmware and System Software Updates

As new features and fixes become available, system software and firmware updates will be released. You can find out more information regarding Sun Ultra 20 M2 updates on the Sun software download site at:

http://www.sun.com/desktop/workstation/ultra20/downloads.jsp

Hardware and BIOS Issues

The following hardware issues apply to the Sun Ultra™ 20 M2 Workstation, regardless of the operating system (OS) installed on the workstation.

- "Some Legacy Audio Cards Do Not Work" on page 4
- "IEEE 1394 CD-ROM Drive Cannot Boot Tools and Drivers CD" on page 4
- "Older CRT Monitors Might Require NVIDIA Card" on page 4
- "Location of Drivers for Single-port PCI-Express NIC Cards X4218A" on page 5

Some Legacy Audio Cards Do Not Work

PCI audio cards that require a -12V connection do not work on the Ultra 20 M2. To workaround this issue, use the on-board High Definition Audio.

IEEE 1394 CD-ROM Drive Cannot Boot Tools and Drivers CD

The system cannot boot the Sun Ultra 20 M2 Workstation Tools and Drivers CD from an externally attached IEEE 1394 CD-ROM drive. Use the internal DVD drive to boot the Tools and Drivers CD.

Older CRT Monitors Might Require NVIDIA Card

Some older monitors might not be compatible with the onboard ATI graphics controller. You might need to replace the monitor or the install a compatible NVIDIA graphics card. If nothing appears on the screen during the BIOS or OS portion of the boot cycle, perform the following troubleshooting sequence:

1. **Verify that the monitor is connected to the correct graphics connector.**

Note – When an NVIDIA video card is installed in a PCIe slot, the onboard ATI graphics controller is disabled.

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2. **Try powering down the system and restarting.**

3. **If the screen stops displaying content during the Linux or Solaris OS portion of the boot cycle, edit the Xorg configuration file.**

   Ensure that the monitor settings in the file are consistent with your monitor.

4. **If the system still does not work, use a different monitor or install an NVIDIA graphics card.**

Location of Drivers for Single-port PCI-Express NIC Cards X4218A

Drivers for Single-port PCIe NIC cards X4218A for Windows and RHEL operating systems can be found at:

http://downloadfinder.intel.com/scripts-df-external/Product_Filter.aspx?ProductID=2247&lang=eng

This card is not supported on Solaris.

Solaris OS Issues

These issues apply to a Sun Ultra 20 M2 Workstation running the Solaris 10 6/06 OS or later.

- "Flash Archive Function in Solaris Requires SATA Cable Move" on page 6
- "Nge Driver Patch Recommended" on page 6
- "Solaris 10 Telnet Vulnerability Patch" on page 7
- "Solaris 10 Might Require Assistance to Shut Down" on page 7
- "NVIDIA RAID Not Supported" on page 7
- "Security Advisory for NVIDIA 1.0-8774 Linux and Solaris Drivers" on page 7
- "Front Audio Jack Support" on page 8
- "Screen Resolution Might Require Adjustment" on page 8

Flash Archive Function in Solaris Requires SATA Cable Move

If you use the Flash archive function to update Solaris, and you have two identical SATA disks, you need to move one disk to another bus.

To do this:

1. **Shut down the system.**
2. **Open the cover.**
3. **Locate the two red SATA Cables on the lower right side of the mother board.**
4. **Move the cable with the green connector to one of the black SATA connectors (right next to its current connector) on the motherboard.**
5. **Replace the cover and reboot.**

Nge Driver Patch Recommended

Install patch #122530-06 to resolve issues related to nge NIC link negotiation. The patch is available at `http://sunsolve.sun.com`. Use Patchfinder to locate the patch.

Solaris 10 Telnet Vulnerability Patch

Solaris 10 security vulnerability in the in.telnetd(1M) daemon might allow unauthorized remote users to gain access to a Solaris Host. For more information, please refer to Sun Security Alert 102802.

Patch 120069-03 addresses the Solaris 10 6/06 and 11/06 telnet vulnerability issue. Apply the patch manually or run the `install.sh` script on all Solaris 10 6/06 and 11/06 distributions. This patch is available on the Sun Ultra 20 M2 Workstation Tools and Drivers CD v1.6 and will be incorporated into the Solaris preinstall image at a later date. For information on accessing the Tools and Drivers CD ISO image, see "Latest Firmware and System Software Updates" on page 3.

Solaris 10 Might Require Assistance to Shut Down

The OS might not shut down properly after a `shutdown` command, regardless of whether the command is issued through a terminal window or through the GUI. If this occurs, press the front Reset/Power button on the system and hold it for 4 seconds.

NVIDIA RAID Not Supported

This feature is not currently supported in Solaris 10.

Security Advisory for NVIDIA 1.0-8774 Linux and Solaris Drivers

A Security Advisory for the 8774 Nvidia graphics driver for Solaris and Linux is posted at `http://download2.rapid7.com/r7-0025/`.

To address this issue update to the minimum 1.0-8776 driver, which is available on the latest Tools and Drivers CD (see "Latest Firmware and System Software Updates" on page 3). Additionally, you can get the most current Nvidia graphics drivers and installation procedures at `http://www.nvidia.com/object/unix.html`.

Front Audio Jack Support

Solaris support for the front audio jack is available on the latest version of the Tools and Drivers CD. To add support:

1. **Download and burn the ISO image on to a CD.**

   For information on accessing BIOS and the Tools and Drivers CD ISO image, see "Latest Firmware and System Software Updates" on page 3

2. **With Solaris running, insert the CD, and navigate to:**
   `/cdrom/1_1_tools_drivers/drivers/solx86`

3. **From the above directory, there are two ways to install the audio driver:**

- Choice 1: Run the `install.sh` script.

  This requires a `sys-unconfig`, and installs audio, video and chipset support. This is recommended for a fresh installation of Solaris. The system will reboot and you will need to re-enter system name, ip configuration data, etc. See the OS installation guide for details.

- Choice 2: Install the audio package only.

  This does not require a `sys-unconfig`. To do this, run the following steps:

  a. **Remove the old audio package by entering:**

     ```
     pkgrm SUNWaudiohd
     ```

  b. **Copy the new audio package into place:**

     ```
     cd audio
     cp -r SUNWaudiohd /var/spool/pkg/
     ```

  c. **Install the new package:**

     ```
     cd /var/spool/pkg
     pkgadd SUNWaudiohd
     ```

  d. **Reboot. The new package can be tested by insuring that the speaker is not muted and that the volume is up, and then entering:**

     ```
     cd /usr/share/sounds
     audioplay phone.wav
     ```

Screen Resolution Might Require Adjustment

If your screen resolution is not satisfactory, right-click on the desktop and choose the Change Desktop Resolution option to change the resolution.

Linux Issues

The following issues apply to a Sun Ultra 20 M2 Workstation running a Linux OS.

- "RHEL 5 Occasional Failure to Install with Multiple disks" on page 9
- "Linux NVRAID Support RHEL 5 Only" on page 9
- "X-Windows Gets Stuck in Upper Left Corner in Linux GNOME interface:" on page 10
- "Security Advisory for NVIDIA 1.0-8774 Linux and Solaris Drivers" on page 10
- "For Red Hat 3 U7, Ignore NVIDIA Graphics Card After Running `install.sh` Script" on page 11
- "RHEL 3 U7 Requires BIOS v1.06 or Later" on page 11
- "RHEL 3 Might Not Fully Support Some USB Storage Devices" on page 11
- "RHEL 3 No Microphone Support" on page 11
- "For RHEL 4 U3 64-Bit Use `nommconf` when Memory is Greater than 4 GB" on page 12
- "In SLES 9 Screen Resolution Might Require Adjustment" on page 12
- "XpReburn and 2003 Reburn on Linux" on page 12
- "Graceful Shutdown Not Available on Non-ACPI Supported Linux Operating Systems (6278514)" on page 12

RHEL 5 Occasional Failure to Install with Multiple disks

RHEL 5 might fail to install when there are multiple SATA disks (non-RAID) in the system. If this occurs, install the OS with one disk, add the other disk(s) when the installation is complete, and reboot.

Linux NVRAID Support RHEL 5 Only

Linux support for NVRAID (RAID 0 and 1) is available with RHEL 5. Spanning is not supported.

X-Windows Gets Stuck in Upper Left Corner in Linux GNOME interface:

Linux GNOME windows get stuck on the upper left corner of the screen when using the GNOME interface. This is the default interface for RHEL 5 and SLED/SLES10. To fix the problem there are two solutions:

- Use the KDE interface rather than GNOME:

  a. **At the login prompt, click on the Session area and pick KDE rather than GNOME.**

  b. **Log in and the problem should not occur.**

-or-

- Change NVIDIA video drivers to 8776, which do not have this problem. To load these drivers:

  a. **Boot the system.**

  b. **Open a terminal and enter the following command:**

     `init 3`

     This stops X-Windows and puts you in text mode.

  c. **Login in to text mode.**

  d. **Insert the latest Tools and Drivers CD.**

  e. **Mount the CD by entering the following command:**

     `mount /dev/cdrom /`*`mnt_location`*`/cdrom`

  f. **Change directories using the following command:**

     `cd /`*`mnt_location`*`/cdrom/drivers/linux/display/8776`

  g. **Change to the appropriate 32- or 64-bit subdirectory.**

  h. **Install the driver by entering the following command:**

     `sh NVIDIA*.run`

  i. **Follow the instructions to install. Reboot when done.**

Security Advisory for NVIDIA 1.0-8774 Linux and Solaris Drivers

A Security Advisory for the 8774 Nvidia graphics driver for Solaris and Linux is posted at http://download2.rapid7.com/r7-0025/.

To address this issue update to the minimum driver 1.0-8776 , which is available on the latest Tools and Drivers CD (see "Latest Firmware and System Software Updates" on page 3). Additionally, you can get the most current Nvidia graphics drivers and installation procedures at `http://www.nvidia.com/object/unix.html`.

For Red Hat 3 U7, Ignore NVIDIA Graphics Card After Running `install.sh` Script

When you reboot after running the `install.sh` script, the system recognizes the NVIDIA video card. When asked if you want to configure the video card, choose the Ignore option.

If you already installed the NVIDIA graphics card, by choosing Configure, edit the Xorg configuration file (either `/etc/X11/xorg.conf` or `/etc/X11/XF86Config`) to list the driver under the Videocard entry as `nvidia`.

RHEL 3 U7 Requires BIOS v1.06 or Later

RHEL 3 U7 requires BIOS v1.06 or later. Do not load an earlier BIOS. If you have already loaded an earlier BIOS version, reload v1.06 or later, and reset the time and date, per the instructions in"Location of Drivers for Single-port PCI-Express NIC Cards X4218A" on page 5.

RHEL 3 Might Not Fully Support Some USB Storage Devices

In RHEL 3 versions, some storage devices might not be recognized by the system after hot removal and insertion, or after the system reboots.

If this occurs, reboot the workstation again.

RHEL 3 No Microphone Support

The microphone function is not supported in RHEL 3.

For RHEL 4 U3 64-Bit Use `nommconf` when Memory is Greater than 4 GB

If you have 4 GB or more memory in your system, you must use the `nommcomf` parameter to install Red Hat 4 U3 64-bit. Follow these steps during the installation:

1. **When the install screen prompts for Text or Graphical install, enter the following at the prompt:**

   `linux pci=nommconf`

   At the end of the install, the system might reboot.

2. **When the grub boot loader comes up, follow the prompts to edit, as directed by the boot loader. Add the following to the kernel line of the top grub entry:**

   `pci=nommconf`

3. **Once booted, edit `/etc/grub.conf` to add the following to the kernel line:**

   `pci=nommconf`

In SLES 9 Screen Resolution Might Require Adjustment

On some monitors, when installing SLES 9, you might need to reduce the default screen resolution. To do this, press the F2 key at the initial resolution prompt, and select the lowest resolution.

XpReburn and 2003 Reburn on Linux

Using Reburn scripts with the `-b` option, which allows for the automatic burning of an ISO image to CD, might not work with Linux. Run the script without the `-b` option, and burn the CD in a separatly.

Graceful Shutdown Not Available on Non-ACPI Supported Linux Operating Systems (6278514)

Some Linux operating systems, such as RHEL 3, do not support the Advanced Configuration and Power Interface (ACPI) which allows a graceful system shutdown. On systems running non-ACPI Linux operating systems, only a forceful shutdown is available.

Windows Issues

The following issues apply to a Sun Ultra 20 M2 Workstation running the Windows XP Professional 32-bit (SP2) or 64-bit OS.

- "Windows 2003 and Vista Support" on page 13
- "Windows Hotfix for HD Audio Devices" on page 13
- "Windows XP 64-Bit: S4 Sleep Option Not Available with 4 GB or More Memory" on page 13

Windows 2003 and Vista Support

The Sun Ultra 20 M2 Workstation Tools and Drivers CD contains drivers for both Windows 2003 and Vista. For information on accessing the Tools and Drivers CD, see "Latest Firmware and System Software Updates" on page 3.

Windows Hotfix for HD Audio Devices

After installing Windows XP Professional 64-bit, or Windows 2003, the Device Manager might indicate an error for the High Definition Audio device listed under UAA Bus Drivers. This might also causes errors when loading the video driver.

To resolve this issue, go to the Microsoft web site at:
`http://support.microsoft.com` and search for KB901105

Download and run the file:

```
WindowsServer2003.WindowsXP-KB901105-v3-x64-ENU.exe
```

This fix is required *before* loading the audio drivers for Windows XP 64-bit.

Windows XP 64-Bit: S4 Sleep Option Not Available with 4 GB or More Memory

The S4 sleep state does not work properly in a system with 4 GB or more of memory. For more information, search for Article # 888575 at the Microsoft web site (`http://www.microsoft.com`).