

DPSD BIOS ENGINEERING

Intel Corporation, 5200 NE Elam Young Parkway Hillsboro, OR 97124-6497

DATE: April 25, 2003

PRODUCT: Silver Reef/Cannonville Standard BIOS

P09-0017 (P09, build 0017)

About This Release:

- April 25, 2003
- SV84510A.86A.0017.P09.0304251748
- UNDI 4.1.09

New Fixes/Features:

• Banner change to P09.

Known Errata:

• None

Notes to Validation:

• None

B10-0016(Beta 10, build 0016)

About This Release

- April 24, 2003
- SV84510A.86A.0016.B10.0304241911
- UNDI 4.1.09

New Fixes/Features:

• Updated with new system configuration data.

Known Errata:

None

B09-0015 (Beta 09, build 0015)

About This Release

- April 22, 2003
- SV84510A.86A.0015.B09.0304221636
- UNDI 4.1.09

New Fixes/Features:

- Fixed the problem where BIOS Hardware Health Monitor displays incorrect Fan speed.
- Fixed loss of mouse control after BIOS updates.

- Added 4 new options to the Hard Disk Pre-Delay question.
- Fixed issue where Adaptec 1200A IDE RAID card is not bootable.
- Fixed system hang when booting to the MS-DOS 6.22 Installation disk.

Known Errata:

None

P08-0013 (Production 08, build 0013)

About This Release

- March 18, 2003
- SV84510A.86A.0013.P08.0303171920
- UNDI 4.1.09

New Fixes/Features:

• Change build ID to production release.

Known Errata:

None

B08-0012 (Beta 08, build 0012)

About This Release

- March 17, 2003
- SV84510A.86A.0012.B08.0303170149
- UNDI 4.1.09

New Fixes/Features:

- Added APM 1.2 minimum support.
- Fixed the NSC SIO Floppy Recovery support.

Known Errata:

None

About This Release

- **BIOS String:** SV84510A.86A.0011.P07.0302101150
- UNDI PXE Version: ICH2 PXE 2.1 Build 083

Features/Errata Fixed in This Release

P07-0011

- Fixed WHQL, HCT11 failure "FADT RESET_REG Register Bit Width can only be 8. Value: 0"
- Added string translation and correct spelling error on "Aggressive"
- Fixed issue with password.
- Fixed an issue of ADC self test fail on MCH register FC BIT2. Also fixed the 3D Lab card issue
- Upgraded Intel(R) Boot Agent to v4.1.09
- Activated and deactivated the MS and KB on S1 as recommended by NS to solve S1 issue.
- Program FANMON_EN on F0h register at Logical Device 9 of NS.

- Fixed failure on 48bit LBA accessing
- Updated latest translation string for hardware monitoring screen
- Updated processor frequency display in POST and in Setup to handle newest processors.
- Added support to newest processors.
- Added control function to check for Heceta before adding Hardware Monitor in Setup
- Fixed an issue where a CMOS checksum was not being cleared in the next BOOT.
- Adding on-screen POST code support
- Implemented Dynamic date update for Copyright.
- Fixed the problem where with Logitech USB keyboard, the system entered BIOS setup after Ctrl-Alt-Del reset.
- Fixed a problem where the system failed to boot TEAC USB FDD.
- Fixed issue where PS/2 mouse was non-functional after resuming from S3 in Windows 98 SE/ME while pressing multiple keys on the PS/2 keyboard.
- Fixed issue where Warning Message for SPD Tolerant memory was displaying incorrect information.

P06-0010

- Updated from AMI Core 08.00.05 to 08.00.07.
- Fixed the issue where the time in setup being reset to 0 if MFG jumper is installed.
- Unlock Heceta 6 when in manufacturing mode.
- Fixed issue where flashing the previous BIOS through EBU in Windows XP generated CMOS checksum errors.
- Added Hardware Monitoring screen for setup.
- Added MPS 1.4 support
- Fixed issue where the MFG CMOS defaults did not match the DFT spec.
- Fixed issue where when an HT processor and Hyper-Threading disabled in Setup, XP still showed 2 processors in Task Manager.
- Various HT fixes (NMI handling, Int2, Int12, machine check, MSR etc.)
- Added support for USB security sensor devices.
- Added BBS 3.2 support
- Fixed floppy issue with floppy 3-mode enabled.
- Fixed issue where Warning Message for SPD Tolerant memory was displaying incorrect information.
- Fixed the issues with USB Floppy boot.
- Added support to newest P4 CPU.

P05-0009

- Added HT splash screen.
- Hide frame buffer size option in Windows based iTK.
- Added new cache size descriptor for new processor.

P04-0008

• Fixed a problem where the chassis fan didn't start or speed up even the temperature exceeded the preset temperature limit.

P03-0007

- Fixed a potential system hang problem after CMOS corruption and incorrect CUSTOM CMOS defaults were installed.
- Fixed the problem where BMI runtime interface could not return the correct FAN thermal data.
- Fixed issue where memory configuration info was reported incorrectly in manufacturing mode.
- Added the hard-disk pre-delay functionality.
- Removed Hyper Threading processor string as per Marketing request.
- Extended hard drive detection time out to 10sec max.
- Fixed issue where SUT will bounce back from S4 if USB devices is installed.
- Fixed issue where ITK Windows tool does not show options for audio device, modem device, & the user IDE questions.
- Fixed the problem where USB mouse stop working in Win2k when wake on S1.
- Fixed issue where Windows 98SE and Windows ME will show yellow bangs in Device Manager for PS/2 devices if the OS is not installed with PS/2 devices attached.
- Fixed issue where PC-DOS would not boot from an emulated CD-ROM image.
- Added Setup Fan configuration menu support.

- Fixed the problem where BMI runtime interface could not return the correct FAN thermal data.
- Fixed a problem where Fan configuration change warning message was not displayed when exiting Maintenance mode Setup.
- Fixed a problem where Fan configuration change warning message can be seen on Heceta 4 motherboard after updating BIOS.

P02-0006

- Added BMI Interface revision 1.1.
- Added ITK 2.0 Support.
- Sync up with Base line 01.01.01
- Updated SMBIOS TYPE 8 connector information
- Added Hyper-Threading Technology enable/disable switch in setup.
- Updated SMBIOS processor information for HT enabled CPU (Type 4)
- Only one Type 4 structure populated per physical HT processor in SMBIOS.
- Removed DDR200 support
- Enhanced thermal trip detection logic. Also added fix to correctly preserve register 70/74 across SMIs.
- Added workaround to support backward compatibility in BIOS recovery.
- Display "Intel(R) Pentium (R) 4 processor with HT Technology" during sign-on for HT CPU.
- Updated ICH PXE 2.1 Build 083 & Intel Boot Agent 4.1.0.8
- Fixed installation hang with Windows .NET when UDMA/133 drives are attached to the system.
- If no "Treliable" value is available in BMI data Flash logical block, the field is populated with 0FFh
 (as per BMI Spec 1.09c)

P01-0005

- Fix issue where chassis intruder was unable to log to event log.
- Fix issue where viewing event log will display garbage if intruder event occurred.
- Fix issue where IOMEGA Zip drive was not able to emulate as hard disk. Also added fix to disable hard disk emulation when the drive's jumper is configured as floppy (tracker #31781)
- Removed "Wake on Modem Ring" option from BIOS setup as it will be supported by default under ACPI environment.
- Removed S4/S5 Wake on Ring support as not required as per PRD.
- Fix issue where ACPI default will change from S1 to S3 if CMOS corrupted on RPG boards. (RPG Requirement)
- Added BIOS workaround for Windows 98SE and Millennium issue where the default Microsoft PS/2 mouse driver does not allow the mouse to wake the system from S3.
- Added user message if DDR333 was being down-graded to DDR266 when FSB400 CPU is installed. (RPG Requirement)
- Making sure that DDR333 down-grade & thermal trip warning will never display when CMOS checksum bad or in manufacturing mode.

B-0003

- Hide DDR333 settings for 400FSB CPU & hide DDR200 settings for 533FSB CPU (RPG Requirement)
- Fix issue where LDCM reported wrong slot for PCI devices that currently in use.
- Synch'd up with 1.4 memory reference code.
- POST hang at E1h with 3 beep sound to indicates no memory installed
- Added fix for memory timing overrides.

B-0002

- Added Hyper-Threading support.
- Program audio SSID according to board ID.
- Turn off TPM clock & 48 MHz DOT clock to eliminate EMI for Silver Reef & Cannonville (845PE)
- Fixed the issue of not being able to wake the system up in S3 using the TCPIP PING command.
- Enable S4/S5 Wake on Ring under ACPI environment.
- Corrections on memory code to handle all possible FSB/DDR/GFX clock combination & various memory failures.
- Correction on non-spd cmos checksum region to avoid random CMOS Date/time reset.
- Fixed issue where BIOS menu doesn't show DDR 333 on bank 0 and bank1

- Fixed the issue of D3h POST hang when FSB533 CPU is installed in maintenance mode.
- Fixed issue where SUT POST hang at DCh when S3 wake from 266MHz DDR Memory Speed.
- Updates all of the ACPI tables with the correct OEM Table ID based on board ID.

Known Errata with This Release