AMI Provisioning

Product Overview

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Extending Beyond BIOS & UEFI

MegaRAC_SP Service Processor & Firmware Solutions (IPMI & I-KVM & SMASH & WSMAN)

XMS Manageability Solutions (Sx, Hx, Vx, Px, Cx, Tx)

MG_90XX Backplane Controller (SGPIO & SES-2 & IBPI & IPMI)

NTG Advanced BIOS/Mobile Solutions (Multimedia, smart phone, virtualization)

HTG Advanced USB & ASIC devices (AMI DebugRx, test automation, power management)

StorTrends Storage Solutions (NAS, I-SCSI, SafeTrends)

Aptio & AMIBIOS8 (UEFI & Legacy)

AMIDiag Diagnostic tools for DOS, Windows, UEFI & embedded in BIOS ROM
Global Support Infrastructure

Core is available, 24 hours a day for all projects, globally
Support available 24 hours a day, globally

Synchronized every minute
Moving “beyond BIOS” with UEFI

• AMI’s progress with Aptio shows how UEFI creates more flexible firmware
  ❖ Standards-based development in C
  ❖ eModule component architecture
  ❖ Enhanced debug capabilities

• The experience continues with AMI Provisioning
  ❖ Add graphical pre-boot applications
  ❖ Create a unique platform value-add that doesn’t reply on any specific operating system
AMI Provisioning

Graphical user interface, based on the AMI Graphical Execution Environment (GEE) for UEFI

Choose from applications developed by AMI, or develop custom applications using AMI Provisioning libraries

Designed to work on more than Aptio ... use AMI Provisioning with any UEFI 2.x implementation

Graphical themes, which can be customized for a unique look and feel
AMI Provisioning: Usage Models

• Retire the “Factory DVD”
  ❖ Launch UEFI pre-boot applications from flash memory or a hidden disk partition

• Reduce Unnecessary RMA Exchanges
  ❖ Run tests without booting to the OS
  ❖ Embed diagnostics and recovery utilities
  ❖ Create OEM specific applications that always travel with the platform

• Manage Platform Firmware
  ❖ Update any platform firmware, not just BIOS
    ➢ IPMI BMC, RAID, SATA/SCSI, …
  ❖ GUI & web-based firmware updates without booting to the operating system
AMI Provisioning

- Framework for deploying graphical UEFI pre-boot applications
- Runs from UEFI pre-boot or UEFI Shell
- Built on AMI Graphical Execution Environment (GEE) technology
- Major features:
  - Firmware Configuration, based on AMI GSE
  - Firmware Update
  - Integrate tests from AMIDiag for UEFI

Highlights …
- UEFI 2.x (IA32 & x64)
- Customize look & feel
- Multilanguage support
- Context sensitive help
- Network support
  - CIFS / NFS / FTP / HTTP
- Verify digital signatures to avoid using “tampered” updates
- Firmware Update
  - Update all firmware components
  - Update from local file, network share, HTTP or FTP
  - Verify the authenticity and compatibility of firmware image
Utilities & Diagnostics under UEFI

- AMI uses the power of UEFI as an application space
  - Pre-Boot Diagnostics
  - Firmware Update
  - Support Applications
- Easily expanded …
  - System recovery & rescue applications
  - OS installation wizard
  - OEM & 3rd party apps
Full testing without an OS install
- Menu driven user interface with scripting & batch modes
- Condensed scripted, scripted, and batch mode testing
- Test progress reporting
- Create & view error log files
- Add 3rd party tests developed with the AMIDiag for UEFI SDK
- Perfect for burn-in and system integration testing

Upcoming Features
- Manufacturing configuration, managed via local network
- Graphical interface (optional)
- UEFI Setup/HII Interfaces
AMIGraphicalSetupEnvironment(GSE)

- Provide a graphical interface for Aptio
- OEMs customize the drivers, applications and images in GSE
- Customization of images, background and page layouts
- Add GSE to Aptio 4.x projects as a more user-friendly setup
UEFI Application Development with AMI

- The model for AMI Provisioning is to work with the OEM and create custom application suites
  - Faster time to market
  - Help from the UEFI experts at AMI
  - AMI can setup a model where the OEM application is sustainable over time

- AMI can work with your company to develop value-add UEFI applications
  - OEM look & feel with custom graphics
  - Custom applications based on OEM needs
  - Build level porting options based on customer & platform requirements

Works “out of the box” with AMI provided layout, theme and pre-boot applications.

Fully customizable by the OEM & ODM: Change themes, add applications, …