

Chapter 2

AMI® BIOS USER'S GUIDE

The system configuration information and chipset register information is stored in the CMOS RAM. This information is retained by a battery when the power is off. Enter the BIOS setup (if needed) to modify this information.

The following pages will describe how to enter BIOS setup, and all about options.

Enter BIOS Setup

Enter the AMI® setup Program's Main Menu as follows:

1. Turn on or reboot the system. The following screen appears with a series of diagnostic check.

```
AMIBIOS (C) 1999 American Megatrends Inc.  
A6309 VXXX XXXXXX
```

```
Hit <DEL> if you want to run setup
```

```
(C) American Megatrends Inc.  
61-XXXX-001169-00111111-071592-i82440FX-H
```

2. When the "Hit " message appears, press key to enter the BIOS setup screen.
3. After pressing key, the BIOS setup screen will appear.

Note: *If you don't want to modify CMOS original setting, then don't press any key during the system boot.*

AMIBIOS SIMPLE SETUP UTILITIES - VERSION 1.30 (C) 1999 American Megatrends, Inc. All Rights Reserved	
Standard CMOS Setup BIOS Features Setup Chipset Features Setup Power Management Setup PNP/PCI Configuration Load Setup Defaults Load BIOS Defaults	Integrated Peripherals Hardware Monitor Setup Supervisor Password User Password IDE HDD Auto Detection Save and Exit Setup Exit Without Saving
Esc :Quit ↑↓→← : Select Item (Shift)F2: Change Color F5: Old Values F6 :Load BIOS Defaults F7 :Load Setup Defaults F10: Save & Exit	
Standard CMOS Setup for changing time, date , hard disk, etc.	

4. Use the <Up> and <Down> key to move the highlight scroll up or down.
5. For optimal setting, select Load Setup Defaults.
6. Use the <ENTER> key to select the option.
7. To exit, press <ESC>. To save and exit, press <F10>.

Standard CMOS Setup

- 1. Press <ENTER> on “Standard CMOS Setup” of the main menu screen .

AMIBIOS SETUP - STANDARD CMOS SETUP										
(C)1999 American Megatrends, Inc. All Rights Reserved										
Date (mm/dd/yyyy):		Fri Oct 29, 1999								
Time (hh/mm/ss):		17:09:25								
	Type	Size	Cyln	Head	WPcom	Sec	LBA Mode	Blk Mode	PIO Mode	32Bit Mode
Pri Master	:Auto						ON	ON	AUTO	ON
Pri Slave	:Auto						ON	ON	AUTO	ON
Sec Master	:Auto						ON	ON	AUTO	ON
Sec Slave	:Auto						ON	ON	AUTO	ON
Floppy Drive A:		1.44 MB		3 1/2		<div>Base Memory : 0 Kb Other Memory : 384 Kb Extended Memory : 0 Mb Total Memory : 1 Mb</div>				
Floppy Drive B:		Not Installed								
Boot Sector Virus Protection Disabled										
Available Options:							ESC:Exit			
Disabled							↑↓:Select Item			
Enabled							PU/PD/+/-:Modify			
							(Shift)F2:Color			

- 2. Use <Up> and <Down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the Standard CMOS Setup, press <ESC> to go back to the main menu.

BIOS Features Setup

- 1. Press <ENTER> on “BIOS Features Setup” of the main menu screen.

AMIBIOS SETUP - BIOS FEATURES SETUP			
(C) 1999 American Megatrends, Inc. All Rights Reserved			
Quick Boot	:Enabled	D800, 16K Shadow	:Disabled
1st Boot Device	:Floppy	DC00, 16K Shadow	:Disabled
2nd Boot Device	:IDE-0		
3rd Boot Device	:CDROM		
Initial Display Mode	:BIOS		
S.M.A.R.T. For Hard Disk	:Disabled		
Boot Num-Lock	:On		
Floppy Drive Swap	:Disabled		
Floppy Drive Seek	:Disabled		
Password Check	:Setup		
Boot to OS/2 > 64M	:No		
CPU Serial Number	:Enabled		
L2 Cache	:Write Back		
Cache Bus ECC	:Disabled		
System BIOS Cacheable	:Enabled	ESC:Exit	↑↓→← :Select Item
C000, 32k Shadow	:Disabled	F1 :Help	PU/PD/+/-:Modify
C800, 16K Shadow	:Disabled	F5 :Old Values(Shift)	F2:Color
CC00, 16K Shadow	:Disabled	F6 :Load BIOS Defaults	
D000, 16K Shadow	:Disabled	F7 :Load Setup Defaults	
D400, 16K Shadow	:Disabled		

- 2. Use <Up> and <Down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the BIOS Features Setup, press <ESC> to go back to the main menu.

Chipset Features Setup

1. Press <ENTER> on “Chipset Features Setup” of the main menu screen.

AMIBIOS SETUP - CHIPSET FEATURES SETUP	
(C) 1999 American Megatrends, Inc. All Rights Reserved	
Set SDRAM Timing by SPD	:Disabled
DRAM Frequency	:100Mhz
SDRAM CAS# Latency	:3
DRAM Integrity Mode	:Disabled
CPU In Order Queue	:4-Level
Memory Hole	:Disabled
AGP Mode	:Auto
AGP Comp. Driving	:Auto
Manual AGP Comp. Driving	:CB
AGP Aperture Size	:64MB
Manual AGP Comp. Driving	:CB
USB Controller	:USB Port 0&1
USB KB/Mouse Legacy	:Disabled
USB 60/64 Port Emulation	:Disabled
ESC:Exit ↑↓→← :Select Item F1 :Help PU/PD/+/-:Modify F5 :Old Values(Shift)F2:Color F6 :Load BIOS Defaults F7 :Load Setup Defaults	

2. Use <Up> and <Down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
3. After you have finished with the Chipset Features Setup, press <ESC> to go back to the main menu.

Power Management Setup

- 1. Press <ENTER> on “Power Management Setup” of the main menu screen.

AMIBIOS SETUP - POWER MANAGEMENT SETUP			
(C) 1999 American Megatrends, Inc. All Rights Reserved			
Compliance With O/S	:Yes	System Thermal	:Ignore
ACPI Standby State	:S1/POS	Thermal Slow Clock Ratio	:50%-56.25%
Power Management/APM	:Enabled	Power Button Function	:On/Off
Green PC LED Status	:Dual Color	Restore on AC/Power Loss	:Last State
Video Power Down Mode	:Suspend	Resume On Ring/LAN	:Enabled
Hard Disk Power Down Mode	:Stand-by	Resume On PME#	:Disabled
Standby Time Out (Minute)	:Disabled	Resume On RTC Alarm	:Disabled
Suspend Time Out (Minute)	:Disabled	RTC Alarm Date	:15
Throttle Slow Clock Ratio	:50%-56.25%	RTC Alarm Hour	:12
Display Activity	:Ignore	RTC Alarm Minute	:30
IRQ3	:Monitor	RTC Alarm Second	:30
IRQ4	:Monitor		
IRQ5	:Ignore		
IRQ7	:Monitor		
IRQ9	:Ignore	ESC:Exit	↑↓→← :Select Item
IRQ10	:Ignore	F1 :Help	PU/PD/+/-:Modify
IRQ11	:Ignore	F5 :Old Values(Shift)F2:Color	
IRQ13	:Ignore	F6 :Load BIOS Defaults	
IRQ14	:Monitor	F7 :Load Setup Defaults	
IRQ15	:Ignore		

- 2. Use <Up> and <Down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the Power Management Setup, press <ESC> to go back to the main menu.

PNP/PCI Configuration

- 1. Press <ENTER> on “PNP/PCI Configuration” of the main menu screen.

AMIBIOS SETUP - PNP/PCI CONFIGURATION		
(C) 1999 American Megatrends, Inc. All Rights Reserved		
PnP Aware O/S	:No	
Clear NVRAM	:No	
PCI Latency Timer	:64	
Primary Graphics Adapter	:PCI	
PCI VGA Palette Snoop	:Disabled	
DMA Channel 0	:PnP	
DMA Channel 1	:PnP	
DMA Channel 3	:PnP	
DMA Channel 5	:PnP	
DMA Channel 6	:PnP	
DMA Channel 7	:PnP	
IRQ3	:PCI/PnP	
IRQ4	:PCI/PnP	
IRQ5	:PCI/PnP	
IRQ7	:PCI/PnP	
IRQ9	:PCI/PnP	
IRQ10	:PCI/PnP	
IRQ11	:PCI/PnP	
IRQ14	:PCI/PnP	
IRQ15	:PCI/PnP	
		ESC:Exit ↑↓→← :Select Item
		F1 :Help PU/PD/+/-:Modify
		F5 :Old Values(Shift)F2:Color
		F6 :Load BIOS Defaults
		F7 :Load Setup Defaults

- 2. Use <Up> and <Down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the PNP/PCI Configuration, press <ESC> to go back to the main menu.

Integrated Peripherals

- 1. Press <ENTER> on “Integrated Peripherals” of the main menu screen.

AMIBIOS SETUP - INTEGRATED PERIPHERALS		
(C) 1999 American Megatrends, Inc. All Rights Reserved		
Onboard IDE	:Both	
Onboard FDC	:Auto	
Onboard Serial Port 1	:Auto	
Onboard Serial Port 2	:Auto	
Duplex Mode	:N/A	
Onboard Parallel Port	:Auto	
Parallel Port Mode	:ECP	
EPP Version	:N/A	
Parallel Port DMA	:Auto	
Parallel Port IRQ	:Auto	
Onboard AC'97 Audio	:Enabled	
Onboard MC'97 Modem	:Disabled	
Codec Variable Rate	:Enabled	
		ESC:Exit ↑↓→← :Select Item
		F1 :Help PU/PD/+/-:Modify
		F5 :Old Values(Shift)F2:Color
		F6 :Load BIOS Defaults
		F7 :Load Setup Defaults

- 2. Use <up> and <down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the Integrated Peripherals, press <ESC> to go back to the main menu.

Hardware Monitor Setup

- 1. Press <ENTER> on “Hardware Monitor Setup” of the main menu screen.

AMIBIOS SETUP - Hardware Monitor Setup		
(C) 1999 American Megatrends, Inc. All Rights Reserved		
ClkGen Spread Spectrum	:Enabled	
CPU Host/PCI Clock (MHz)	:Auto	
-- System Monitor --		
Current CPU Temperature	:45°C/113°F	
Current System Temperature	:32°C/89°F	
Current CPU Fan Speed	:5200 RPM	
Current Chassis Fan Speed	:0 RPM	
Vcore	:2.112V	
+2.500V	:2.575V	
+3.300V	:3.373V	
+5.000V	:4.946V	
+12.000V	:11.986V	
ESC:Exit ↑↓→← :Select Item		
F1 :Help PU/PD/+/-:Modify		
F5 :Old Values(Shift)F2:Color		
F6 :Load BIOS Defaults		
F7 :Load Setup Defaults		

- 2. Use <up> and <down> to choose the item and <PgUp> and <PgDn> keys to modify the highlighted item.
- 3. After you have finished with the Peripheral Setup, press <ESC> to go back to the main menu.

IDE HDD Auto Detection

You can use this utility to automatically detect the characteristics of most hard drives.

<p align="center">AMIBIOS SETUP - STANDARD CMOS SETUP (C)1999 American Megatrends, Inc. All Rights Reserved</p>											
<p>Date (mm/dd/yyyy): Fri Oct 29, 1999 Time (hh/mm/ss): 17:09:25</p>											
	Type	Size	Cyln	Head	WPcom	Sec	LBA Mode	Blk Mode	PIO Mode	32Bit Mode	
Pri Master	:Auto						ON	ON	AUTO	ON	
Pri Slave	:Auto						ON	ON	AUTO	ON	
Sec Master	:Auto						ON	ON	AUTO	ON	
Sec Slave	:Auto						ON	ON	AUTO	ON	
Floppy Drive A: 1.44 MB 3 1/2							<p align="center">Base Memory : 0 Kb Other Memory : 384 Kb Extended Memory : 0 Mb Total Memory : 1 Mb</p>				
Floppy Drive B: Not Installed											
Boot Sector Virus Protection Disabled											
Available Options:							ESC:Exit				
Disabled							↑↓:Select Item				
Enabled							PU/PD/+/-:Modify				
							(Shift)F2:Color				

Supervisor/User Password

This Main Menu item lets you configure the system so that a password is required each time the system boots or an attempt is made to enter the Setup program. Supervisor Password allows you to change all CMOS settings but the User Password setting doesn't have this function. The way to set up the passwords for both Supervisor and User are as follow:

1. Choose "Supervisor/User Password" in the Main Menu and press <Enter>. The following message appears:

"Enter New Supervisor/User Password:"

2. The first time you run this option, enter your password up to 6 characters only and press <Enter>. The screen will not display the entered characters. For no password, just press <Enter>.
3. After you enter the password, the following message appears prompting you to confirm the password:

"Retype New Supervisor/User Password:"

4. Enter exactly the same password you just typed in to confirm the password and press <Enter>.
5. Move the cursor to Save and Exit Setup to save the password.
6. If you need to delete the password you entered before, choose the Supervisor/User Password and press <Enter>. It will delete the password that you had before.
7. Move the cursor to Save and Exit Setup to save the option you did. Otherwise, the old password will still be there when you turn on your machine next time.