



Chapter 1

Introduction

Overview

The WinneX 3 green mainboard utilizes the Intel first generation integrated graphics chipset — Intel®810 Chipset, providing a fully compatible, high performance and cost-effective PC/microATX platform. The new integrated technologies, together with the software configurable AC' 97 audio and modem system give customers an advanced, multimedia solution at an extremely low price. It provides 66/100 MHz system bus support for all Intel® Pentium® III, Pentium® II, and Celeron™ Slot1 processors. 100MHz SDRAMs are supported up to 512MB. It also provides advanced features such as Wake-on-LAN, Wake-on-Modem and Keyboard Password Power-on functions. Suspend to RAM, the optimal implementation of the Advanced Configuration and Power Interface (ACPI) specification, makes the PC's power consumption drop to the lowest possible level and enable quick wakeup. ManageEasy, our system management application is also supplied to enable remote monitoring and configuration of the system.

Flexibility in Designing Cost-effective System

The Intel®810 Chipset is a high-integration chipset which consists of a Graphics and Memory Controller Hub (GMCH) Host Bridge and an I/O Controller Hub (ICH) Bridge. There are two versions of the GMCH (GMCH0/GMCH) and two versions of ICH (ICH0/ICH). The Intel®810 Chipset System provides added flexibility in designing cost-effective solutions by using different combinations of the GMCH and ICH.

The following describes the three kinds of Intel®810 chipset combination and their added features. Please identify which kind of mainboard you purchased.

1. **Intel® 810 DC-100:** GMCH (Intel®82810-DC100) + ICH (Intel®82801AA)
Added features:
 - Includes 4MB, 32-bit 100MHz SDRAM Display Cache.
 - Supports Ultra ATA/66.
2. **Intel® 810:** GMCH0 (Intel®82810) + ICH (Intel®82801AA)
Added features:
 - Supports Ultra ATA/66.
3. **Intel® 810L:** GMCH0 (Intel®82810) + ICH0 (Intel®82801AB)
This is the basic system combination.

All information contained in this manual applies to all three kinds of system, unless otherwise specified.



Key Features

Form factor

- MicroATX form factor of 244mm x 188mm.

Microprocessor

- Supports Intel® Pentium® III Processors at 450MHz and future processors with 100MHz bus speed.
- Supports Intel® Pentium® II Processors at 233/266/300/333MHz processors with 66MHz bus speed.
- Supports Intel® Pentium II® Processors at 300/350/400/450MHz processors with 100MHz bus speed.
- Supports Intel® Celeron™ Slot1 Processors at 266/300/333/366MHz and future processors with 66MHz bus speed.
- Supports 66/100MHz host bus speed.
- The CPU core voltage adjustable from 1.3V to 3.5V automatically through onboard switching voltage regulator with VID(Voltage ID).
- Provides onboard 1.5V, 1.8V, 2.5V and 3.3V standby regulator.

System memory

- Provides two 168 pin 3.3V unbuffered DIMM sockets.
- Supports 64-bit wide DIMM modules with 100MHz SDRAM devices.
- Supports 8MB to 512MB SDRAM using 16Mb/64Mb technology.
- Supports 512MB SDRAM using 128Mb technology.
- Supports suspend to RAM.

Onboard IDE

- Supports two PCI PIO and Bus Master IDE ports.
- Two fast IDE interfaces supporting four IDE devices including IDE hard disks and CD-ROM drives.
- Supports up to PIO Mode 4 timing.
- Supports "Ultra ATA/33" Synchronous DMA modes, transferring data up to 33MB/s.
- Supports "Ultra ATA/66" Synchronous DMA modes, transferring data up to 66MB/s. (for Intel® 810 and Intel® 810 DC-100 only)
- Integrated 16x32bit buffer for IDE PCI Burst Transfers.

Onboard I/O

- Winbond W83627HF LPC I/O chip.
- One floppy port supporting up to two 3.5" or 5.25" floppy drives with 360K/720K/1.2M/1.44M/2.88M format.
- Two high speed 16550 compatible UART (COM1/COM2/COM3/COM4 selective) with 16-byte send/receive FIFOs.



- USB host interface supporting 2 USB ports.
- One joystick port.
- Provides onboard MIDI/Joystick Connector.
- Infrared interface.
- All I/O ports can be enabled/disabled in the BIOS setup.

Onchip AGP

- Integrated 2D/3D Graphics Controller.
- Integrated H/W Motion Compensation Engine.
- Provides 4MB SDRAM Display Cache (for Intel®810 DC-100 only).

Onboard Sound

- Intel AC' 97 2.1 Specification Compliant.
- 18bit stereo codec.
- Multiple stereo input mixer.
- Mono and stereo volume control.
- Provides onboard Line-in Jack, Microphone-in Jack, Speaker-out Jack.

Advanced features

- PCI 2.2 Specification Compliant.
- Provides Trend ChipAwayVirus® On Guard.
- Supports Windows 95/98 software power-down.
- Supports Wake-on-LAN and Wake-on-Modem.
- Supports Keyboard Password Power-on function.
- Onboard I/O Winbond 83627HF supports system monitoring (monitors CPU and system temperatures, system voltages, chassis intrusion and fan speed).
- Supports management applications such as LDCM (LANDesk® Client Manager) or QDI's ManageEasy. (manufacturing option)
- Provides onboard 3.3V regulator to support ATX power supply without 3.3V output.
- System status resumes after AC power failure.
- Supports QDI's innovations such as SpeedEasy, RecoveryEasy etc.
- Protects the system BIOS from being attacked by severe virus such as CIH.
- Supports Suspend to RAM.

BIOS

- Licensed advanced AWARD BIOS, supports flash ROM with 4Mb memory size, plug and play ready.
- Supports IDE CD-ROM or SCSI boot up.

Green function

- Supports ACPI (Advanced Configuration and Power Interface) and ODPM (OS Directed Power Management).
- Supports four ACPI power states: Full-on, Stop Grant, Suspend to RAM, and soft-off.



Expansion slots

- 3 PCI slots.
- 1 AMR.

Introduction to New Features

FWH(Firmware Hub) Protection

The BIOS of the mainboard is inside the FWH. Some severe viruses such as CIH virus are so dangerous that it may overwrite the BIOS of the mainboard. If the BIOS has been damaged, the system will be unable to boot. We provide the following solution which protects the system BIOS from being attacked by such viruses.

Here are two choices which implements this function.

1. Set the jumper (JAV) as closed, the BIOS can not be overwritten.
2. Set the jumper (JAV) as open, meanwhile set "Flash Write Protect" as Enabled in AWARD BIOS CMOS Setup. In this way, the BIOS can not be overwritten, but the DMI information can be updated.

Refer to page **16** for detailed information on jumper setting, and page **26** for related BIOS setting.

Suspend to RAM

Suspend to RAM is a cost-effective, optimal implementation of the Advanced Configuration and Power Interface (ACPI) 1.0 specification, which makes a PC's power consumption drop to the lowest possible level and enables quick wakeup. When the system is in Suspend-to-RAM status, the system context is maintained in system memory, the system consumes only a small fraction of the power used for full operation. Instead of shutting down the system to save power when not in use and then having to reboot later, Suspend-to-RAM solution enables the system to quickly wake up, restoring all applications and features, enabling operation in a few seconds.

To implement this function, the following requirements are essential:

1. Power supply requirements: The current of 5VSB line of the power supply should be more than 0.75A.
2. The BIOS option "ACPI function" should be enabled, and "ACPI Suspend Type" should be set as S3 in AWARD BIOS CMOS setup. Refer to page **28** for detailed information.



3. An ACPI-enabled operating system such as Windows 98 or Windows 2000 family is needed.

a. In order to install ACPI-enabled Windows 98 operating system, the setup command should be typed as shown below:

D:\SETUP /P J

(This manual assumes that your CD-ROM device driver letter is D:).

b. In order to install ACPI-enabled Windows 2000 Bata 3(build 2031) operating system, just set the BIOS option 'ACPI function' item as 'enabled' in 'Power Management Setup'.

c. If your installed Windows 98 system is in APM mode, you could enter ACPI mode through updating your system, follow the steps as below,

Choose "Plug and Play BIOS" in "System Device", follow the prompt to update device driver, in "Update Device Driver Wizard", select the "Display a list of all the drivers in a specific location, so you can select the driver you want" and press the "Next" button, then select the "Show all hardware" item -> select the "Advance Configuration and Power Interface (ACPI) BIOS" and press "Next" button, follow the prompt and restart your computer when finish, then your system will start up using the ACPI mode.

4. Three ways to enter Suspend-to-RAM status:
 - Under Windows 98/Windows 2000, clicking Start - Shut down - Standby enables the system to enter Suspend-to-RAM status.
 - Under Windows 98/Windows 2000, click Start - Setup - Control Panel - Power Management - Advanced and choose Standby item, the system will enter Suspend-to-RAM status when you press power button.
 - Under Windows 98/Windows 2000, from Power Management Properties in Control Panel, set the latency time in System Standby, the system will enter Suspend-to-RAM status when time out.

The same ways used to power up the system can be used to wake up the system from Suspend-to-RAM status. For example, pushing the power button, through the Wake-on-LAN, Wake-on-Modem function or RTC Alarm. If the keyboard password power-on function is enabled, the keyboard password should be used to wake up the system instead of pushing the power button.

Ultra ATA/66 (for Intel®810 and Intel®810 DC-100 only)

According to the previous ATA/IDE hard drive data transfer protocol, the signaling way to send data was in synchronous strobe mode by using the rising edge of the strobe signal. The Ultra ATA/33 protocol doubles the burst transfer rate from 16.6MB/s to 33.3MB/s, by using both the rising and falling edges of the strobe signal, this time Ultra ATA/66 doubles the Ultra ATA burst transfer rate once again (from 33.3MB/s to 66.6MB/s) by reducing setup times and increasing the strobe rate. The faster strobe rate increases EMI, which



cannot be eliminated by the standard 40-pin cable used by ATA and Ultra ATA. To eliminate this increase in EMI, a new 40-pin, 80-conductor cable is needed. This cable adds 40 additional ground lines between each of the original 40 ground and signal lines. The additional 40 lines help shield the signal from EMI, reduce crosstalk and improve signal integrity.

Ultra ATA/33 introduced CRC (Cyclical Redundancy Check), a new feature of IDE that provides data integrity and reliability. Ultra ATA/66 uses the same process. The CRC value is calculated by both the host and the hard drive. After the host-request data is sent, the host sends its CRC to the hard drive, and the hard drive compares it to its own CRC value. If the hard drive reports errors to the host, then the host retries the command containing the CRC error.

Ultra ATA/66 technology increases both performance and data integrity. However there are basically five requirements for your system to run in Ultra ATA/66 mode:

1. The system board must have a special Ultra ATA/66 detect circuit, such as WinneX 3 mainboard(for Intel®810 and Intel®810 DC-100 only).
2. The system BIOS must also support Ultra ATA/66.
3. The operating system must be capable of DMA transfers. Win95 (OSR2) and Win98 are capable.
4. An Ultra ATA/66 capable, 40-pin, 80-conductor cable is required.
5. Ultra ATA/66 compatible IDE device such as a hard drive or CD-ROM drive.



Chapter 2

Installation Instructions

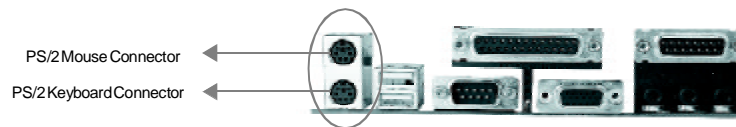
This section covers External Connectors and Jumper Settings. Refer to the mainboard layout chart for locations of all jumpers, external connectors, slots and I/O ports. Furthermore, this section lists all necessary connector pin assignments for your reference. The particular state of the jumpers, connectors and ports are illustrated in the following figures. Before setting the jumpers or inserting these connectors, please pay attention to the directions.

Be sure to unplug the AC power supply before adding or removing expansion cards or other system peripherals, otherwise your mainboard and expansion cards might be seriously damaged.

External Connectors

PS/2 Keyboard Connector, PS/2 Mouse Connector

PS/2 keyboard connector is for the usage of PS/2 keyboard. If using a standard AT size keyboard, an adapter should be used to fit this connector. PS/2 mouse connector is for the usage of PS/2 mouse.



USB1, USB2

Two USB ports are available for connecting USB devices.



Parallel Port Connector and Serial Port Connector (UART1, UART2)

The parallel port connector can be connected to a parallel device such as a printer, while the serial port connectors can be connected to serial port devices such as a serial port mouse. You can enable/disable them and choose the IRQ or I/O address in "Integrated Peripherals" from AWARD BIOS SETUP.





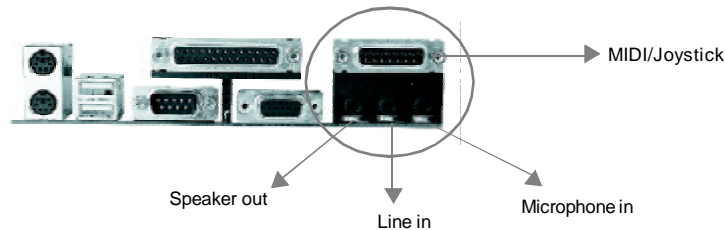
The serial port UART2 is not available on the back panel. Therefore, we provide a 9-pin ribbon cable with bracket for UART2 port. (manufacturing option)



Line-in Jack, Microphone-in Jack, Speaker-out Jack and MIDI/Joystick Connector

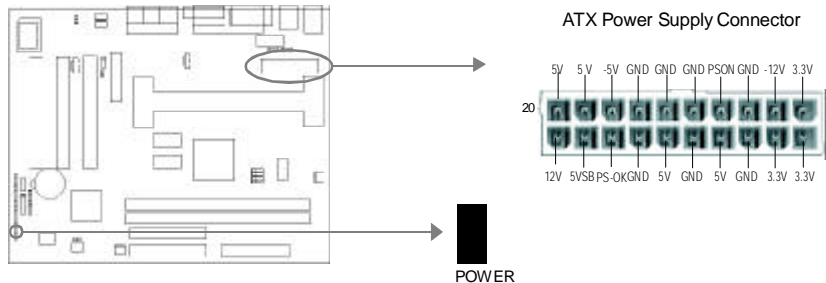
The Line-in jack can be connected to devices such as a cassette or minidisc player for playback or recording. The Microphone-in jack can be connected to a microphone for voice input. The Speaker-out jack allows you to connect speakers or headphones for audio output from the internal amplifier.

The MIDI/Joystick connector allows you to connect a game joystick or a MIDI device.



ATX Power Supply Connector & Power Switch (POWER)

Be sure to connect the power supply plug to this connector in its proper orientation. The power switch (POWER) should be connected to a momentary switch. When powering up your system, first turn on the mechanical switch of the power supply (if one is provided), then push once the power switch. When powering off the system, you needn't turn off the mechanical switch, just **Push once** the power switch.



**Note:**

If you change “Soft-off by PWR-BTTN” from default “Instant-off” to “Delay 4 Secs” in the “POWER MANAGEMENT SETUP” section of the BIOS, the power switch should be pressed for more than 4 seconds before the system powers down.

Hard Disk LED Connector (HDLED)

The connector connects to the case's IDE indicator LED indicating the activity status of IDE hard disk. The connector has an orientation. If one way doesn't work, try the other way.

Reset Switch (RESET)

The connector connects to the case's reset switch. Press the switch once, the system resets.

Speaker Connector (SPEAKER)

The connector can be connected to the speaker on the case.

Power LED Connector (PWR_LED)

The power LED has two status. When the system is in power-off status, the LED is off. When the system is powered up, the LED is on. The connector has an orientation.

Key-Lock Connector (KEY_L)

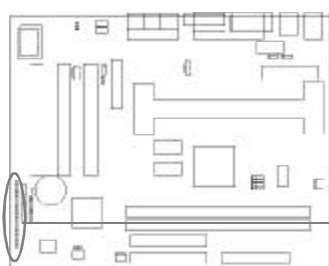
The connector can be connected to the keyboard lock switch on the case for locking the keyboard.

ACPI LED Connector (GREEN_LED)

The ACPI LED has four status. When the system is in power-off status, the LED is off. When first time plug in the 220V power supply, the LED is dimmish. When the system is powered up, the LED is on. When the system enters suspend mode(including Suspend to RAM status), the LED will flash. The connector has an orientation.

Hardware Green Connector (SLEEP)

Push once the switch connected to this header, the system enters suspend mode.



LED+	HDLED
LED -	
RESET	RESET
GND	
SPKDATA	
NC	SPEAKER
GND	
VCC	
SIGNAL IN	POWER
POWER	
LED+	POWER_LED
LED -	
LED -	
KEYLOCK	KEY-L
GND	
LED+	GREEN_LED
LED -	
LED -	
SLEEP	SLEEP
GND	



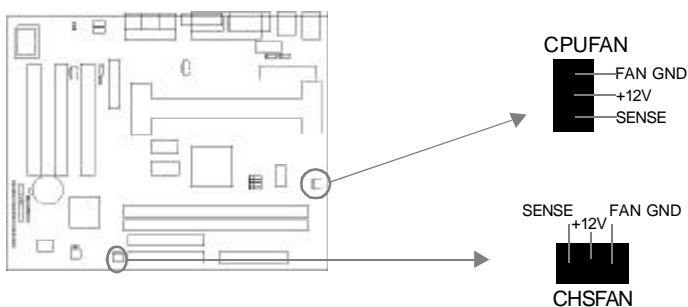
Infrared Header (IrDA)

This connector supports wireless transmitting and receiving. When using this function, configure the settings for IR Address, IR Mode and IR IRQ from the “INTEGRATED PERIPHERALS” section of the BIOS.



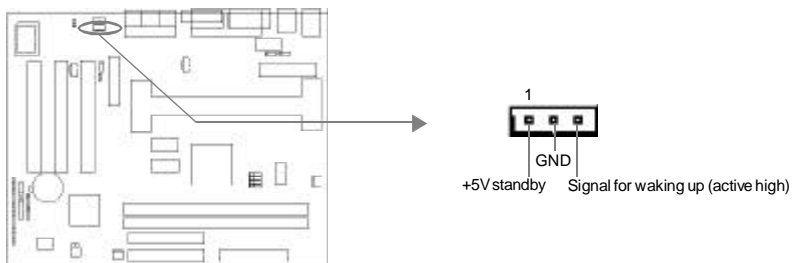
Fan Connector (CPUFAN, CHSFAN)

The fan speed of these two fans can be detected and viewed in “PC Health” section of the BIOS. These two fans will be automatically turned off after the system enters suspend mode.



Wake-Up On LAN (WOL)

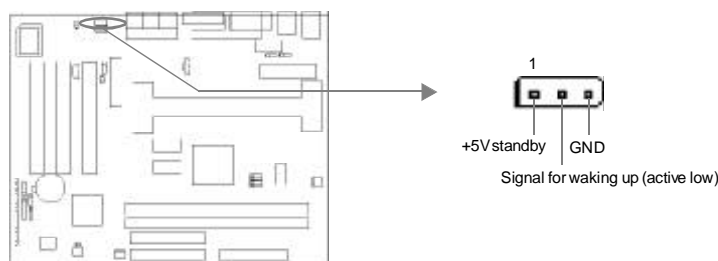
Through the Wake-Up On LAN function, a wake event occurring from the network can wake up the system. If this function is to be used, please be sure an ATX 2.01 power supply of which 5VSB line is capable of delivering 720mA, and a LAN adapter which supports this function is used. Then connect this header to the relevant connector on the LAN adapter, set “Wake-Up by LAN/Ring” as Enabled in the “POWER MANAGEMENT SETUP” section of the BIOS. Save & exit, then boot the operating system once to make sure this function takes effect.





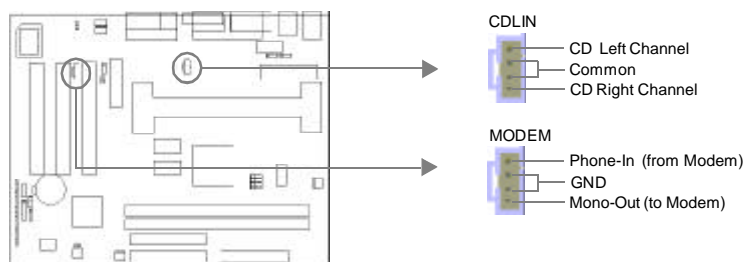
Wake-Up On Internal Modem (WOM)

Through the Wake-Up On Internal Modem function, the system which is in the power-off status can be powered on by a ring signal received from the internal modem. If this function is to be used, be sure an internal modem card which supports this function is used. Then connect this header to the relevant connector on the modem card, set "Wake-Up by LAN/Ring" to Enabled in the "POWER MANAGEMENT SETUP" section of the BIOS. Save & exit, then boot the operating system once to make sure this function takes effect.



Audio Connector (CDLIN, MODEM)

CDLIN is a Sony standard CD audio connector, it can be connected to a CD-ROM drive through a CD audio cable. The MODEM connector allows the onboard audio to interface with a voice modem card with a similar connector. It also allows the sharing of mono_in (such as a phone) and mono_out (such as a speaker) between the onboard audio and the voice modem card.



4 pin SMBus Connector(SMBUS)

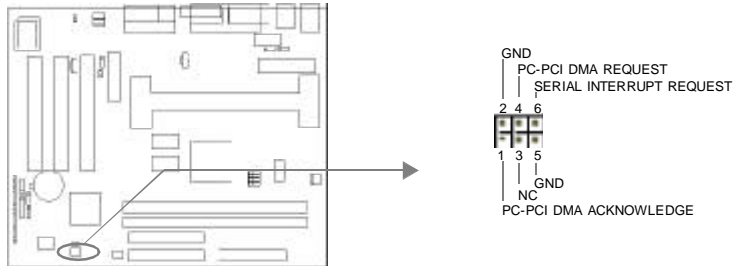
This connector allows you to connect SMBus devices. SMBus devices communicate by means of the SMBus with an SMBus host and/or other SMBus devices. The SMBus or System Management Bus is a specific implementation of an I²C bus, which is a multi-master bus, that is, multiple chips can be connected to the same bus and each one can act as a master by initiating data transfer.





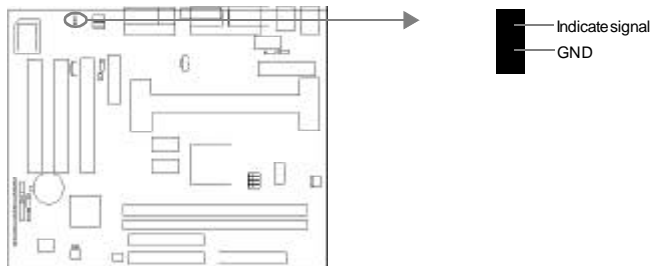
Sound Connector (PC-PCI)

This connector provides a bridge between the mainboard and PCI sound card to deliver sound compatibility under DOS real-mode environment.



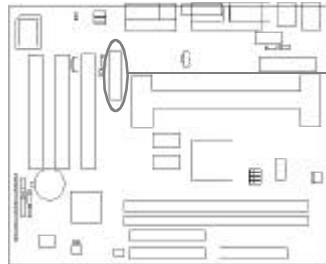
Chassis Security Switch (CHSSEC)

The connector connects to the chassis security switch on the case. The system can detect the chassis intrusion through the status of this connector. If the connector has been closed once, the system will record the status and indicate the chassis has been opened. You can receive this information from QDI ManageEasy software.



Audio/Modem Riser Interface Connector (AMR)

The AMR Interface Connector is the interface between the mainboard and the Audio/Modem Riser card. The connector provides all necessary signals which supports several different configurations of audio and modem in the system, such as audio and modem on the Riser, audio on the mainboard and modem on the Riser, or no audio with modem on the Riser. WinneX 3 mainboard provides you with audio onboard solution, onboard audio can be enabled/disabled. Either AMR (Audio/Modem Riser) card or MR (Modem Riser) card can be used on this system. If you choose to use the audio on AMR card, the onboard audio can be set as disabled. This software configurable AC' 97 audio and modem sub-system gives customers an advanced, multimedia solution at an extremely low price.



AMR Interface Connector

Expansion Slots & I/O Ports Description

Slot / Port	Description
PCI1	First PCI slot
PCI2	Second PCI slot
PCI3	Third PCI slot
IDE 1	Primary IDE port
IDE 2	Secondary IDE port
AMR	AMR slot
FLOPPY	Floppy Drive Port

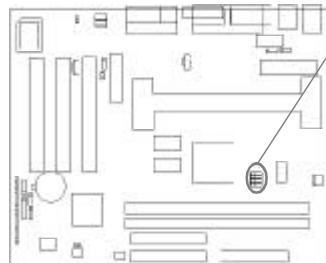
Jumper Settings

Jumpers are located on the mainboard, they represent, clear CMOS jumper JCC, enable keyboard password power-on function jumper JKB, and enable/disable onboard audio jumper JSD etc. Pin 1 for all jumpers are located on the side with a thick white line (Pin1→), referring to the mainboard's silkscreen. Jumpers with three pins will be shown as to represent pin1 & pin2 connected and to represent pin2 & pin3 connected. For default jumper settings, please refer to the following table:

JFS0	1-2 (Auto)	JKB	1-2 (Enable KB Power-on)
JFS1	1-2 (Auto)	JUSB	2-3 (Optional)
JCC	2-3 (Normal Status)	JSB	Closed (Connect PCI 3.3Vsb)
JSD	2-3 (Enable Audio)	JAV	Open (Enable Flash BIOS)

Overclocking Jumper Setting (JFS0, JFS1)

Jumpers labeled JFS0 and JFS1 are located on the mainboard providing users with CPU overclocking feature. The host bus speed can be set as 66/100/133MHz or AUTO select. Refer to the chart below for the location of these jumpers, and the table for information on how to set them.



CPU FSB	66MHz	100MHz	133MHz	AUTO
JFS1	2-3	2-3	OPEN	1-2
JFS0	2-3	OPEN	OPEN	1-2

' 1-2' represents pin1 & pin2 closed.

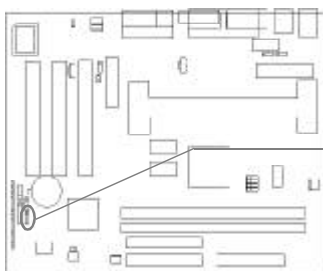
' 2-3' represents pin2 & pin3 closed.



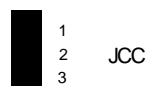
If CPU FSB is set as default setting Auto, the system detects the CPU front side bus automatically. If CPU FSB is set as 100MHz, the system will run at 100MHz even if a processor with 66MHz FSB is installed. Setting up to 133MHz is also supported. However, whether or not the system can be overclocked depends on your processor's capability. Whether the processor is bus ratio locked or unlocked should also be taken into account. For bus ratio unlocked processor, this overclocking feature can be implemented by setting CPU FSB as 100/133MHz, meanwhile adjusting the bus ratio(multiplier) lower in "CPU SpeedEasy Setup" in AWARD BIOS CMOS Setup. We do not guarantee the overclocking system to be stable.

Clear CMOS (JCC)

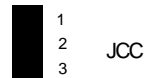
If you want to clear CMOS, unplug the AC power supply first, close JCC (pin1 & pin2) once, set JCC back to the normal status with pin2 & pin3 connected, then power on the system.



Normal status:



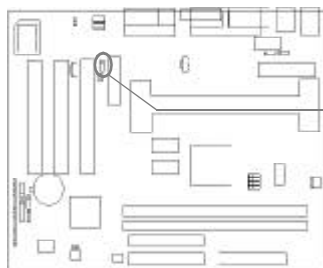
Clear CMOS:



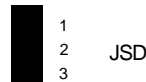
(Unplug the AC power supply)

Enable/Disable On-board Audio CODEC (JSD)

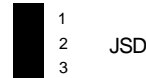
If you want to use the on-board audio CODEC, set JSD with pin2 & pin3 closed (default). Otherwise, set JSD with pin1 & pin2 closed for disabling this function.



Enable on-board audio:

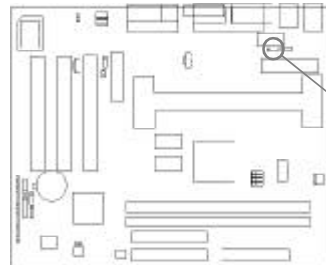


Disable on-board audio:



Enable Keyboard Password Power-on Function (JKB)

The mainboard provides the advanced keyboard password power-on function. Before using this function, set JKB with pin1 & pin2 closed. Otherwise, set JKB with pin2 & pin3 closed for disabling.



Disable:  JKB
1 2 3

Enable:  JKB
1 2 3

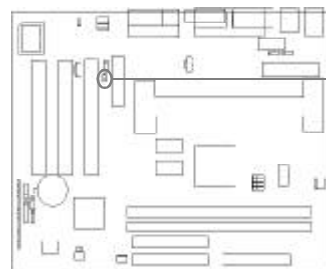
Furthermore in order to implement this function, set "POWER ON Function" to Password and enter the keyboard power-on password in the "INTEGRATED PERIPHERALS" section of the BIOS. Save and exit, then power off your system. In this case, the power button's power-on function has been disabled.


Note:


1. If using this function, 5VSB line of the power supply should be capable of delivering enough current (eg. 200mA) for all the devices connected to the keyboard port, if not, you will be unable to power up the system using the keyboard.
2. If you set JKB with pin2 & pin3 closed, set "POWER ON Function" to **BUTTON ONLY**, don't set it to Password, or you'll be unable to power up your system by the keyboard or the power button.
3. If you encounter the above problems, clear CMOS and set the jumper and BIOS option again.

PCI 3.3VSB Voltage Jumper (JSB)

Setting JSB open can disconnect the 3.3VSB voltage to PCI slots. This can prevent the mainboard from being damaged if you add or remove expansion cards without unplugging the AC power supply. However, if you want to use the PCI 2.2 specification compliant expansion cards to wake up the system, for example, a network card which supports wake-up on LAN function but without the WOL header, set JSB as closed, meanwhile set "Wake-Up by PCI card" as enabled in "Power Management Setup" section of the BIOS.



Disconnect PCI 3.3VSB  JSB

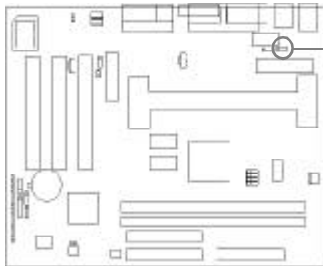
Connect PCI 3.3VSB
(Default)  JSB

Note: If AMR card is used, this jumper must be set as default setting closed.



Enable USB Device Wake-up Function (JUSB)

The mainboard provides the advanced USB device wake-up function. The system can be waken up from its power saving including ACPI S3 by activating USB device. Before using this function, set JUSB with pin1 & pin2 closed. Otherwise, set JUSB with pin2 & pin3 closed for disabling.



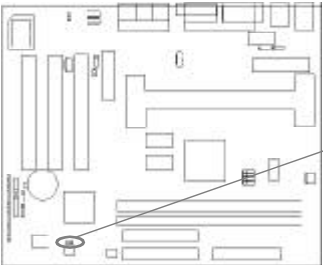
Disable:  JUSB
1 2 3


Enable:  JUSB
1 2 3

Note: Not all system (BIOS) support this optional function. Please contact your mainboard provider or visit our website to get the latest information.

FWH Protection Jumper (JAV)

The BIOS of the mainboard is inside the FWH. If the jumper JAV is set as closed, you will be unable to flash the BIOS to the mainboard. However in this status, the system BIOS is protected from being attacked by serious virus such as CIH virus.



Flash Write Disabled  JAV

Flash Write Enabled  JAV

Setting the jumper JAV as open (default), meanwhile disabling the “Flash Write Protect” item in AWARD BIOS CMOS Setup, allows you to flash the BIOS to the flash ROM in FWH.

The DMI (Desktop Management Interface) system information such as the CPU type/speed, memory size, and expansion cards will be detected by the onboard BIOS and stored in the flash ROM in FWH. Whenever the system hardware configuration is changed, DMI information will be updated automatically. However, setting jumper JAV as closed makes flashing BIOS and updating DMI information impossible.

Refer to page 4 for the two choices to implement FWH Protection function.



Installation of All Drivers

A QDI Mainboard Utility CD-ROM is supplied with each mainboard. All drivers can be installed from this CD-ROM. Before installing all the drivers, check the system requirements such as the enough system memory (at least 32MB for Windows 95/98 system or 64MB for Windows 2000 system) and enough disk space. Windows 95 or Windows 98 must be fully installed and running on the system. All running applications should be closed before installing these drivers.

1. Install INF File for Intel® 810 Chipset

The INF Files for Intel® Chipset 810 contains Windows device installation (*.INF) files that outline to the operating system how the chipset components shall be configured for the proper functionality. Under Windows 95/98, run \ChipDrv\Intel\Whitney\inf\Setup.exe for installation. Please refer to README.TXT in the directory \ChipDrv\Intel\Whitney\inf\ for more information.

2. Install INF Utility Files for Intel® 810 Chipset

Under Windows 95/98, run \ChipDrv\Intel\Whitney\inf utility\Setup.exe for installation. Please refer to README.TXT in the directory \ChipDrv\Intel\Whitney\inf utility\ for more information.

3. Install VGA Drivers

Under Windows 95/98 English version, run \ChipDrv\Intel\Whitney\Display\win9x\Graphics\Setup.exe for installation.

Under Windows 95/98 Chinese version, the VGA driver should be installed manually from the **Display Properties** Window. Locate the directory to \ChipDrv\Intel\Whitney\Display\win9x\Graphics\Win9x when prompted.

Please refer to README.TXT in the directory \ChipDrv\Intel\Whitney\Display\win9x for more information.

Under Windows NT 4.0, run \ChipDrv\Intel\Whitney\Display\NT40\Graphics\Setup.exe for installation.

Please refer to README.TXT in the directory \ChipDrv\Intel\Whitney\Display\NT40\ for more information.

Under Win2000, the VGA driver should be installed manually. For installation guide, refer to README.TXT in the directory \ChipDrv\Intel\Whitney\Display\win2k.

4. Install Sound Drivers

Under Windows 95, run \DevDrv\Codec\ad1881\95\driver\Setup.exe for installation.

For WaveSynth MIDI function under Windows 95, ich.inf contained in the directory \DevDrv\Codec\ad1881\95\95synth should be installed. (Point to the file ich.inf --- Right click the mouse --- select install).

Under Windows 98, run \DevDrv\Codec\ad1881\98\Setup.exe for installation.



Under Windows NT 4.0, run \DevDrv\Codec\ad1881\nt40\driver\Setup.exe for installation. Regarding the WaveSynth MIDI function under Windows NT 4.0, please refer to README.TXT in the directory \DevDrv\Codec\ad1881\nt40\MIDI.

PC-cillin 98

New viruses are appearing frequently; the chance of your PC being infected increases; antivirus softwares are becoming a must. PC-cillin 98 offers you full-time active virus protection as well as manual scans, plus virus clean capability. Keeping up to date on the latest threats and updating significant files are crucial in keeping antivirus software effective. PC-cillin 98 provides Free Virus Pattern File Updates from the Trend Micro Website:

<http://www.trend.com/download/pattern.htm> or
<http://www.antivirus.com/download/pattern.htm>.

Installation of PC-cillin 98

For Windows 95/98 English version, run Setup.exe for installation from the utility CD directory \Pccillin\Win9x.

For Windows 95/98 Chinese version, run Setup.exe for installation from the utility CD directory \Pccillin\PWIn9x.

For Windows NT 4.0, run Setup.exe for installation from the utility CD directory \Pccillin\WinNT4.0.

S/N is PN EF-9991-6558-5857-5535.

QDI ManageEasy

It is well known that guaranteeing the computer's security and reliability is essential. Especially today, effectively managing and monitoring the computer's hardware is even more important; because processing and exchanging critical data through computer and network are happening everyday. Moving with the computer's development, the system of the computer will become more and more complex; at the same time, the control of computer's hardware will be strengthened. Today, it is possible to monitor and manage your complex hardware from Windows 9X and Windows NT. QDI ManageEasy is a system tool, like a bridge between the complex hardware and OS, used to access hardware status and to execute some control functions. It supports stronger functions for Windows 9X and Windows NT. These functions enables you to view more than one hundred of the basic information about your computer and monitor some key reference data about computer health in real time. QDI ManageEasy also helps you to use remote access and control computers in your local area network. With QDI ManageEasy, you can improve your management level.

Installation of QDI ManageEasy V2.0

Run Setup.exe from the utility CD directory \QME2 to install the QDI ManageEasy V2.0. The QDI ManageEasy Setup Wizard will guide you through the installation process.

For detailed information on how to use QDI ManageEasy V2.0, please refer to the QDI ManageEasy V2.0 online help.