KBI-6130/
KBI-6130-V

MAINBOARD
MANUAL

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Part No. : 25-10891-20

Handling Precautions

Warning :
1. Static electricity may cause damage to the integrated circuits on the motherboard.
Before handling any motherboard outside of its protective packaging,
ensure that there is no static electric charge in your body**.**
2. There is a danger of explosion if the battery is incorrectly replaced.
Replace only with the same or an equivalent type recommended by the manufacturer.
3. Discard used batteries according to the manufacturer instructions.

Observe the following basic precautions when handling the motherboard or other computer components:

- Wear a static wrist strap which fits around your wrist and is connected to a natural earth ground.
- Touch a grounded or anti-static surface or a metal fixture such as a water pipe.
- Avoid contacting the components on add-on cards, boards and modules with the golden finger connectors plugged into the expansion slot. It is best to handle system components by their mounting bracket.

The above methods prevent static build-up and cause it to be discharged properly.

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Installation

The mainboard has several user-adjustable jumpers/switches on the board that allow you to configure your system to suit your requirements. This chapter contains information on the various hardware settings on your mainboard.

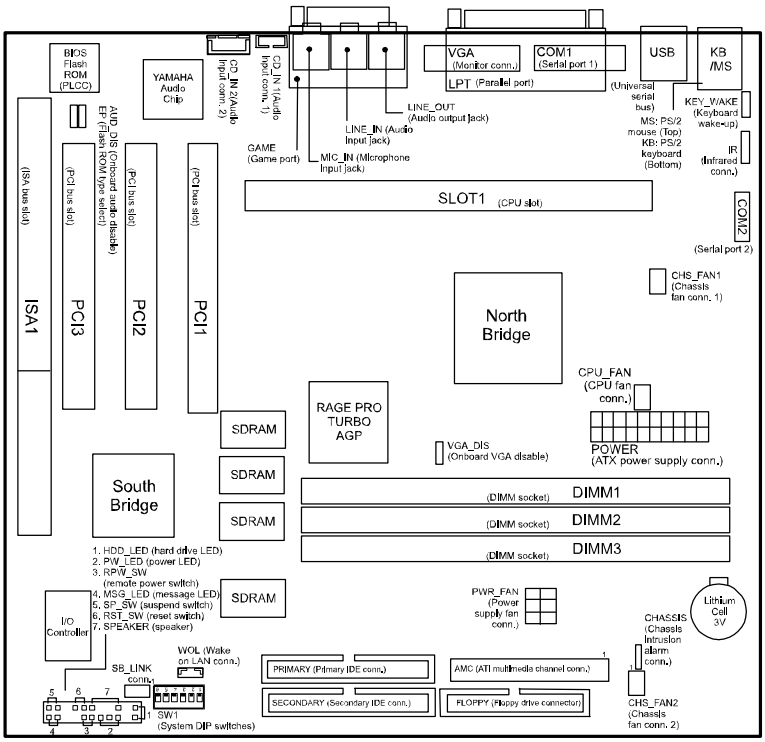
To set up your computer, you should follow these installation steps:

- Step 1 - Set system jumpers/switches
- Step 2 - Install memory modules
- Step 3 - Install the CPU
- Step 4 - Install expansion cards
- Step 5 - Connect devices
- Step 6 - Set up BIOS feature
- Step 7 - Set up software utilities

CAUTION: If you use an electric drill to install this Mainboard on your chassis, please wear a static wrist strap. The recommended electric drill torque is from 5.0 to 8.0 kg/cm to avoid damaging the chips' pins.

Chapter 2 Installation

Mainboard Layout



Onboard Mark	FUNCTION	PAGE
SW1-5	Clear CMOS Data	10
SW1-6	Clear Password	10
EP	Flash ROM Type Select	11
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FLOPPY	Floppy Disk Drive Connector	26
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PRIMARY/ SECONDARY	IDE HDD Device Connector	27
POWER	ATX Power Connector	27
PWR_FAN	Power Supply Fan Connector	28
CPU_FAN	CPU Fan Connector	28
WOL	Wake-On-LAN Connector	29
Front Panel Block Connector	Connectors to Front Panel	29
USB0/1/2	Universal Serial Bus Connector	31
SB_LINK	PCI Audio Card Connector	31
IR	Infrared Port Module Connector	32
CD_IN1/2	CD Drive Audio-out Connector	32
DFP	Digital Flat Panel Connector (optional)	32
GAME	Joystick/MIDI Connector	33
L_IN/L_OUT	Audio Line-In Jack/Audio Line-Out Jack	33
MIC_IN	Audio Microphone Jack	33
VGA	Video Graphics Accelerator	34
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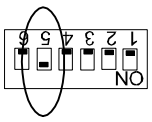
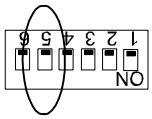
1). Set System Jumpers/Switches

Clear CMOS: SW1-5

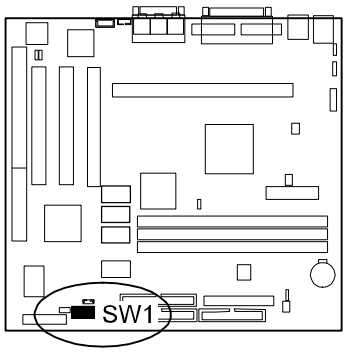
The CMOS RAM is powered by the onboard button cell battery. To clear the RTC data: (1) Turn off your computer, (2) Move the CMOS Clear switch SW1-5 to n" (Enabled), (3) Turn on your computer, (4) Hold down the <**Delete**> key during bootup and enter BIOS Setup to re-enter user preferences, (5) Turn off your computer, (6) Move the CMOS Clear switch SW1-5 to ff" (Disabled), (7) Turn on your computer.



Enable
(Clear CMOS)

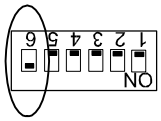


Disable (Default)

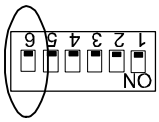


Clear Password: SW1-6

This switch allows you to enable or disable the password configuration. You may need to enable this switch by moving it to the n" (Enabled) position if you forget your password. To clear the password setting: (1) Turn off your computer, (2) Move the Clear Password switch SW1-6 to n" (Enabled), (3) Turn on your computer, (4) Hold down the <**Delete**> key during bootup and enter BIOS Setup to re-enter user preferences, (5) Turn off your computer, (6) Move the Clear Password switch SW1-6 to ff" (Disabled), (7) Turn on your computer for the new settings to take effect.



Enable
(Clear Password)



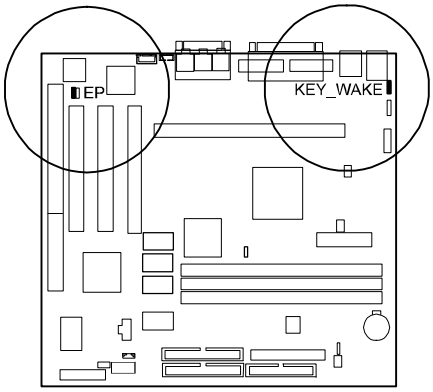
Disable (Default)

Flash ROM Type Selection: EP

The jumper allows you to configure the type of flash ROM chip. This jumper setting is correct by manufactory default. If you want to know the flash ROM type installed on this board, remove the sticker from the chip to see its type.

2MB
MXIC 28F2000

SST 29EE020
ATMEL 29C020
AMD 28F020



Keyboard Wake-up Selection: KEY_WAKE

The 3-pin jumper allows you to use your keyboard to power-on or wake-up your system.

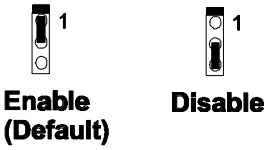
Enable

Disable (Default)

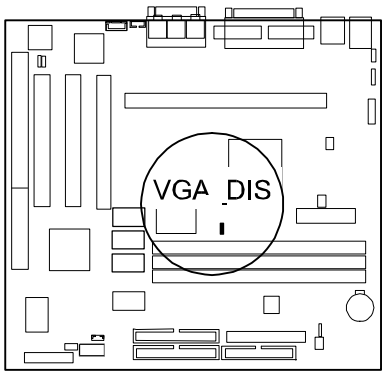
NOTE: For the mainboard to use the Keyboard Wake-up + Wake-on-LAN function, the ATX power supply used should have a current of 1AMP at 5V Stand-By. To use the Keyboard Wake-up function only without using the Wake-on-LAN function, the ATX power supply used should have a current of 400milliAmpere at 5V Stand-By.

Onboard VGA Feature Selection: VGA_DIS

This 3-pin jumper allows you use another add-on PCI VGA card instead of the onboard AGP VGA feature.



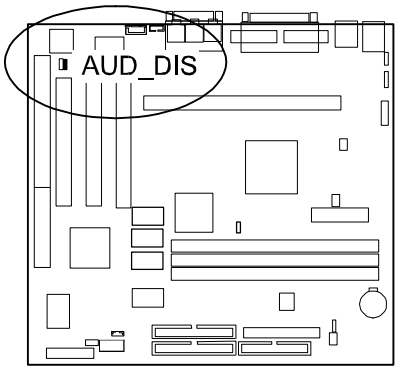
Enable (Default) **Disable**



Onboard Audio Feature Selection: AUD_DIS

This 3-pin jumper allows you to use another add-on PCI sound card instead of the onboard audio feature.

Enable (Default) **Disable**



2). Install RAM Modules

SDRAM Memory

The working space of the computer is the Random Access Memory (RAM). The system cannot act upon data unless it is loaded into RAM. When more memory is added, the working memory of the computer is larger, thereby increasing total performance. Occasionally the system must break apart data files because the entire file does not fit into the RAM area. Consequently, when the system needs data that is not in RAM, it must access the disk where the balance of the data is stored.

Compared to the lightning speed access of the system has to RAM, accessing a mechanical disk drive is a slow process. The board RAM is comprised of three industry standard 168-pin Dual In-line Memory Modules (DIMMs). Each DIMM socket is able to support up to 256MB 3.3V (unbuffered) with data access time of 12ns, 10ns, 8ns or less EDO DRAM or lightning-fast SDRAM. ECC memory and parity check are also supported. If the DIMM runs at the speed of 100MHz, it must meet the PC100 specifications. Use the same memory size of DIMM on each socket for better performance. The maximum total memory supported is up to 768MB* (a RAM module of this size was not available for testing).

PC100 DIMMs may have a serial EEPROM containing a number of critical timing parameters and data regarding the chip and DIMM vendor. This guarantees that the onboard core chipset will properly recognize the DIMM by reading all of the important timing parameters specified in the EEPROM on the serial presence detect interface. The DIMM supplier must understand these differences in detail and provide the correct information so that the core chipset will be programmed properly to control memory. Before making SDRAM upgrades, you should verify the type and speed of the RAM currently installed from your dealer. Installing mixtures of RAM types other than those described in this manual, will have unpredictable results.

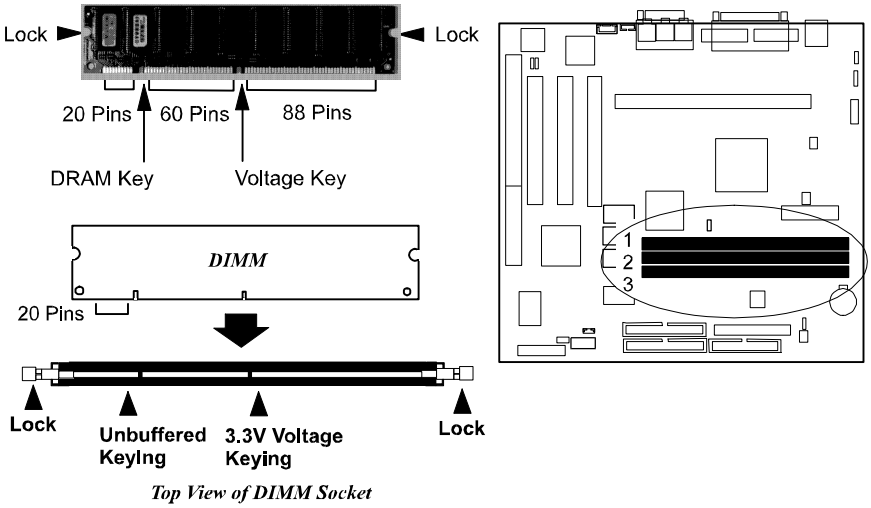
Socket	*Acceptable Memory Module*		*Total Memory*
1	8/16/32/64/128/256MB 168-pin 3.3V SDRAM	x1	
2	8/16/32/64/128/256MB 168-pin 3.3V SDRAM	x1	
3	8/16/32/64/128/256MB 168-pin 3.3V SDRAM	x1	
	Total System Memory allowed up to 768MB	=	

Install and Remove DIMMs

This mainboard supports 100MHz SDRAM DIMMs; when the system frequency set to 100MHz, PC100-compliant SDRAM should be used.

Complete the following procedures to install DIMMs:

1. Locate the DIMM slots on the mainboard.



Top View of DIMM Socket

2. Install the DIMM straight down into the DIMM slot with both hands.

3. The clips of the slot will close up to hold the DIMM in place when the DIMM touches the slot bottom.

Press the clips with both hands to remove the DIMM.

3). Install the CPU

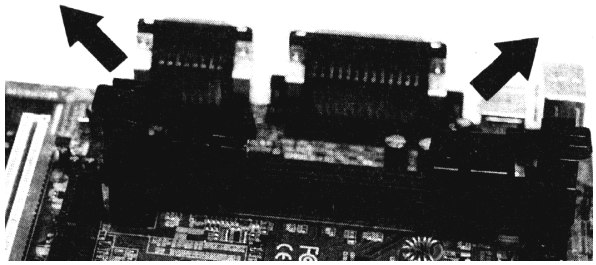
Two options of Retention Mechanism Assembly are offered for installing your CPU on this board. One is installed on the board by the manufacturer. The assemblies are foldable for saving space when shipping and packing.

The other option is the non-foldable Retention Mechanism Assembly (two pieces) and two Retention Mechanism Attachment Mount (two pieces) that are packed in a plastic bag with the board. You need to mount them before installing the CPU module.

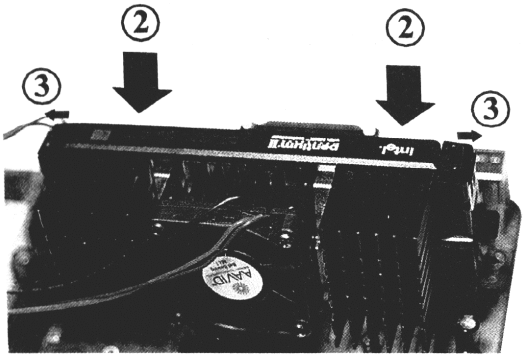
This section introduces you on how to install these devices.

I). Install with Foldable Retention Mechanism Assembly

1. Pull out two sets of the Retention Mechanism Assembly upward to the right position.

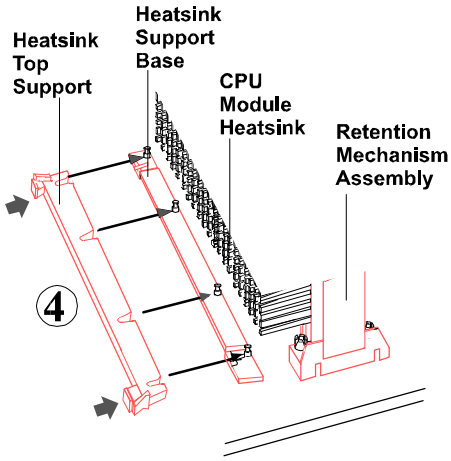


2. Insert he CPU module onto the SLOT1 along the Retention Mechanism Assembly.



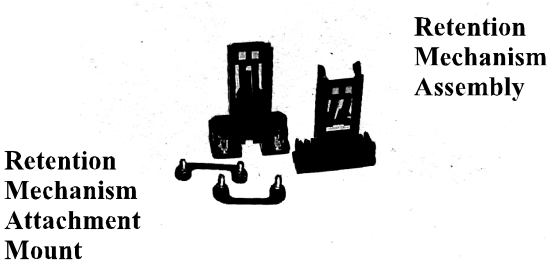
3. Pull the buttons outwards until click to the right positions.

4. Hook the Heatsink Top Support to the Heatsink Support Base to affix the CPU module.

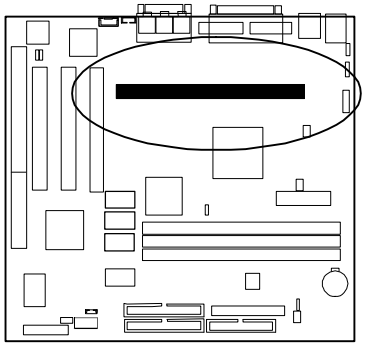


II). Install with Non-Foldable Retention Mechanism Assembly

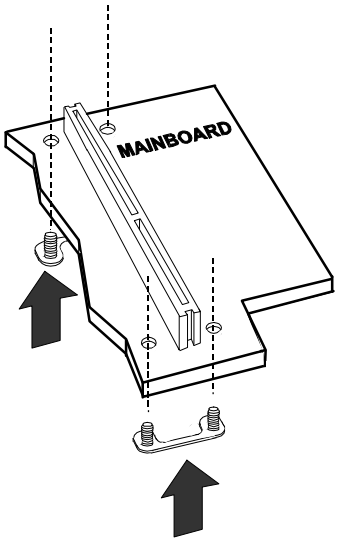
1. Unpack the plastic bag. Take out the Retention Mechanism Assembly (two pieces) and Retention Mechanism Attachment Mount (two pieces).



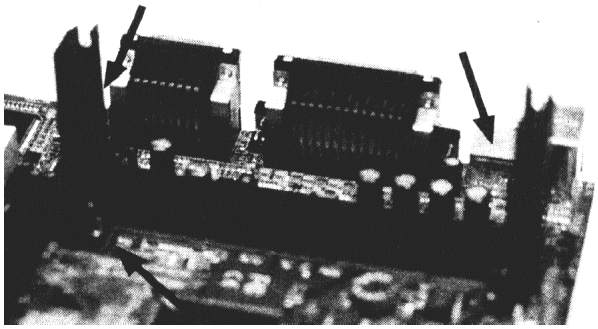
2. Locate SLOT1 on the Mainboard.



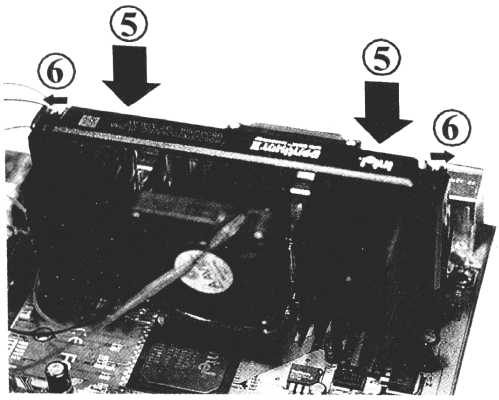
3. Install two Retention Mechanism Attachment Mounts on the board.



4. Place the Retention Mechanism Assembly on the board, on top of the Retention Mechanism Attachment Mounts.
   Affix the Retention Mechanism Assembly with four screws.
   (As the arrows point.)

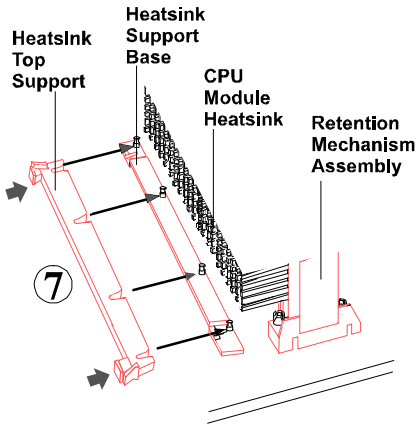


5. Insert the CPU module onto the SLOT1 along the Retention Mechanism Assembly.



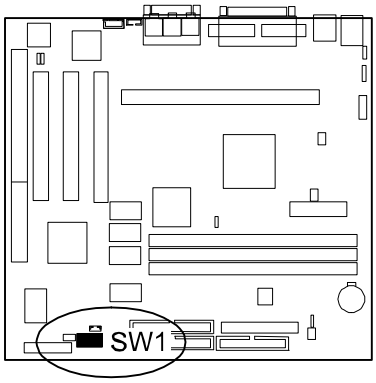
6. Pull the buttons outwards until click to the right positions.

7. Hook the Heatsink Top Support to the Heatsink Support Base to affix the CPU module.



CPU Internal Frequency Selection: SW1-1, SW1-2, SW1-3, SW1-4

These four switches are used to decide the internal frequency of the CPU.

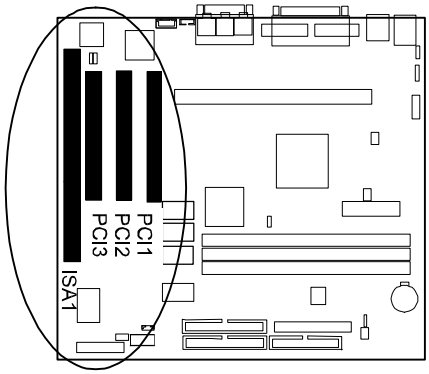


Ratio	CPU Speed		SW1-1	SW1-2	SW1-3	SW1-4
	100MHz	66MHz				
3.5 x	350MHz	233MHz	ON	ON	OFF	OFF
4.0 x	400MHz	266MHz	ON	OFF	ON	ON
4.5 x	450MHz	300MHz	ON	OFF	ON	OFF
5.0 x	500MHz	333MHz	ON	OFF	OFF	ON
5.5 x	550MHz	366MHz	ON	OFF	OFF	OFF
6.0 x	600MHz	400MHz	OFF	ON	ON	ON
6.5 x	650MHz	433MHz	OFF	ON	ON	OFF
7.0 x	700MHz	466MHz	OFF	OFF	ON	ON
7.5 x	750MHz	500MHz	OFF	OFF	ON	OFF

4). Install Expansion Cards

This section describes how to connect an expansion card to one of your system's expansion slots. Expansion cards are printed circuit boards that, when connected to the mainboard, increase the capabilities of your system.

For example, expansion cards can provide video and sound capabilities. This mainboard features one 16-bit ISA bus, and three 32-bit PCI bus expansion slots. (PCI3 is shared with ISA1.)



To install an expansion card, do the following:

1. the computer chassis cover and select an empty expansion slot.

2. Remove the corresponding slot cover from the computer chassis. Unscrew the mounting screw that secures the slot cover and pull the slot cover out from the computer chassis. Keep the slot cover mounting screw nearby.

3. Holding the edge of the peripheral card, carefully align the edge connector with the expansion slot.

4. Push the card firmly into the slot. Push down on one end of the expansion card, then the other. Use this rocking motion until the add n card is firmly seated inside the expansion slot.

5. Secure the board with the mounting screw removed in Step 2. Make sure that the card has been placed evenly and completely into the expansion slot.

6. Replace the computer system cover.

7. Setup the BIOS if necessary.

8. Install the necessary software drivers for the expansion card.

5). Connect Devices

Connectors

NOTE: Some pins are used for connectors or power sources. These are clearly separated from jumpers. Placing jumper caps over these will cause damage to the mainboard.

Ribbon cables should always be connected with the red stripe on the Pin 1 side of the connector. The four corners of the connectors are labeled on the board. Pin 1 is the side closest to the power connector on hard drives and floppy drives.

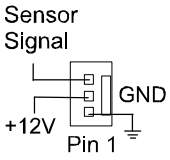
IDE ribbon cable must be less than 18in. (46cm), with the second drive connector no more than 6in. (15cm) from the first connector.

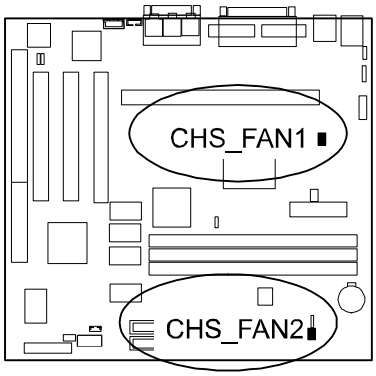
Connectors allow the board to link electronically with other parts of the system. Some malfunctions encountered may be caused by loosed or improper connections. Ensure that all connections are in place and firmly attached.

System Case Fan Connector: CHS_FAN1, CHS_FAN2

These two 3-pin connector links to your cooling fan on the system case to lower the system temperature. Depending on the fan manufacturer, the wiring and plug may be different. Connect the fan plug to the mainboard taking into consideration the polarity of the connector.

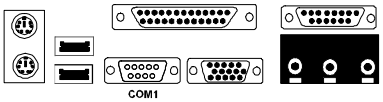
CAUTION: Without sufficient air circulation, the CPU cartridge may overheat and cause damage to both the CPU cartridge and the mainboard. Damage may occur to the mainboard and/or the CPU fan if these pins are incorrectly used. These are not jumpers, do not place jumper caps over these pins.

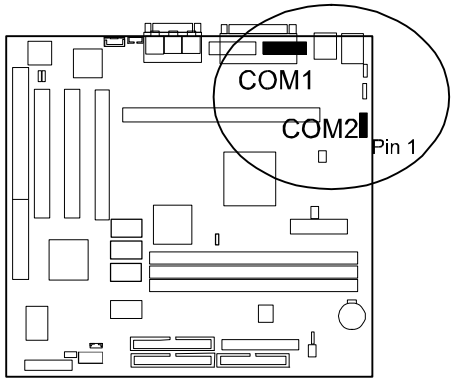




Serial Port Connectors: COM1, COM2

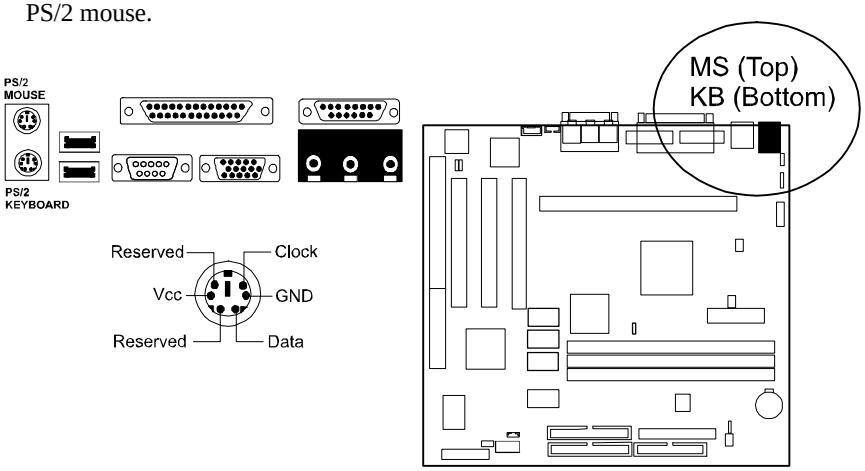
COM1 (9-pin D-sub male connector) and COM2 (9-pin male connector) allow you to connect with your devices that use serial ports, such as a serial mouse or a modem.





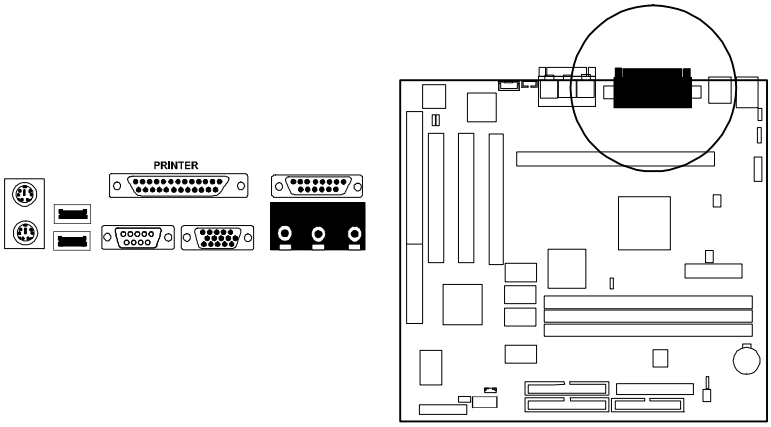
PS/2 Keyboard and Mouse Connector: KB, MS

These two 6-pin female connectors are used for your PS/2 keyboard and PS/2 mouse.



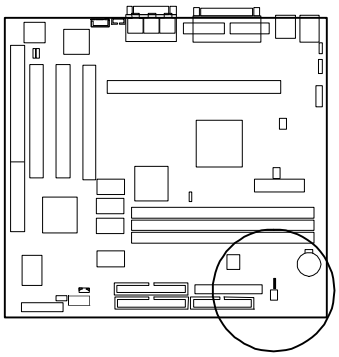
Printer Connector: LPT

This 25-pin D-Sub female connector is attached to your printer.



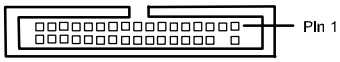
System Chassis Open Alarm Connector: CHASSIS

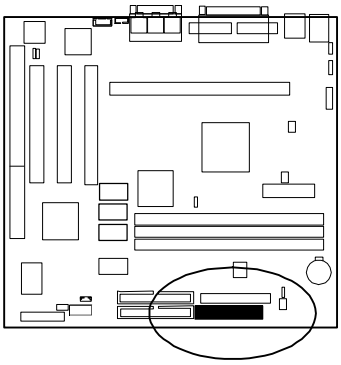
The 3-pin male connector allows you to enable (or disable) system alarm activation if and when the system outer casing is being removed. A high level signal to the connector will indicate to the system that the chassis has been opened.



Floppy Diskette Drive Connector: FLOPPY

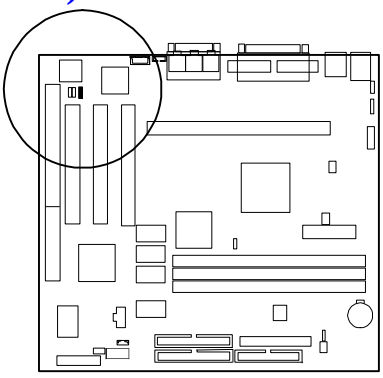
This connector provides the connection with your floppy disk drive. The red stripe of the ribbon cable must be the same side with the Pin 1.





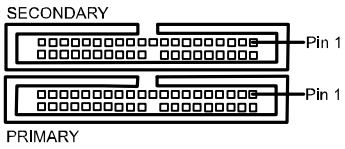
SPDIF Connector: SPDIF (optional)

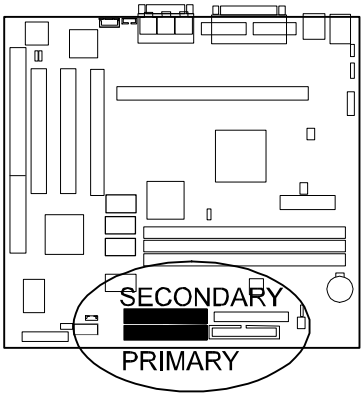
The connector allows this mainboard to connect to an AC-3 decorder with amplifier with 5.1-channel speakers



IDE HDD Device Connectors: PRIMARY, SECONDARY

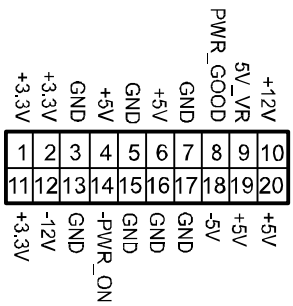
These two connectors are used for your IDE hard disk drives, CD drives, LS-120 drives, or IDE ZIP drives.
The red stripe of the ribbon cable must be the same side with the Pin 1.

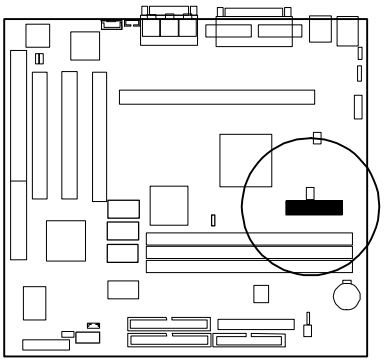




ATX Power Connector: POWER

This connector is connected to the ATX power supply.

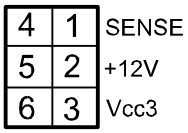


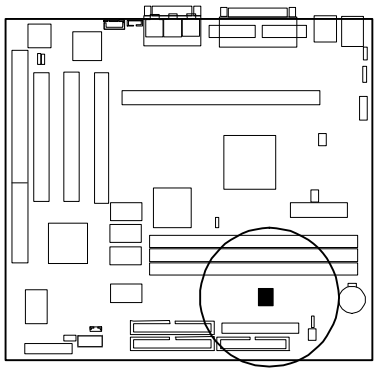


Chapter 2 Installation

Power Fan Connector: PWR_FAN

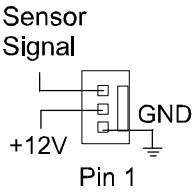
This connector is connected with your power supply that supported a 6-wire plug to lower the power supply temperature. The signal which comes from the hardware monitor chip lowers the temperature of the power supply.

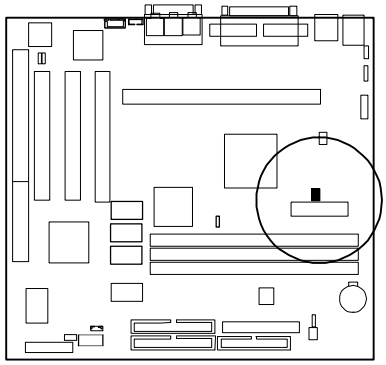




CPU Fan Connector: CPU_FAN

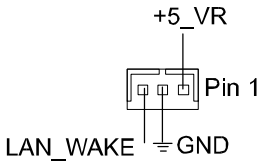
This connector is linked to the CPU fan for cooling the processor temperature. When the system enters the suspend mode, the CPU fan will shut off. Please read the CPU fan installation guide before connection.

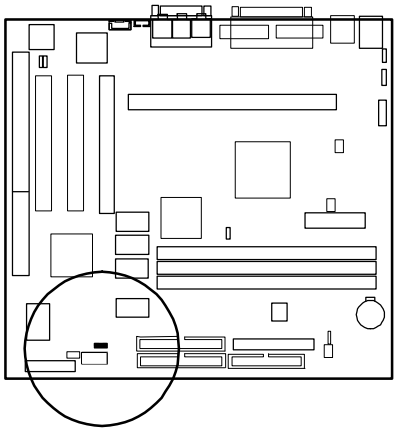




Wake-On-LAN Connector: WOL

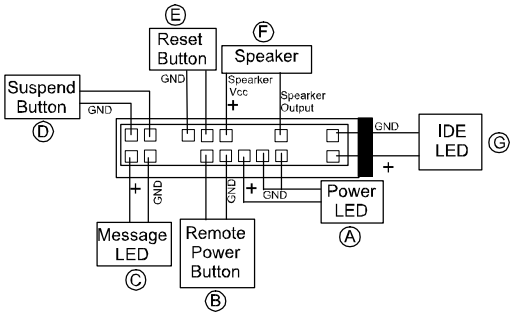
This 3-pin connector allows remote LAN servers to manage the system that installed this board via a network adapter which also supports WOL. When you install a adapter with WOL connector, please read the network adapter card installation guide for details.

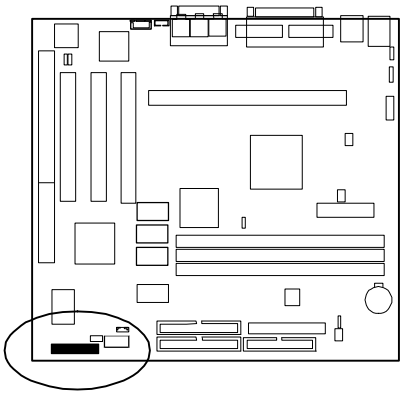




Front Panel Block Connector

This block connector concludes the connectors for linking with IDE LED, power LED, remote power button, message LED, suspend button, reset button and speaker on the front panel of the system case. Please identify polarities of plug wires for the case speaker and LEDs. Please ask vendor about this information when you buy them and install the system by yourself. The plug wires' polarities of this buttons will not affect the function.





Power LED (A) is connected with the system power indicator to indicate whether the system is on/off. When the system enter the suspend mode, it blinks.

Remote Power Button (B) is connected with remote power (soft power) switch. Push this switch will turn off and on the system instead of turning the power switch on the power supply.

Message LED (C) is connected with the message LED. When the system is running normally, the indicator is off. It is controlled by the operating system or application software.

Suspend Button (D) is connected with suspend mode switch.

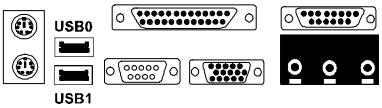
Reset Button (E) is connected to the reset switch. Push this switch to reboot the system instead of turning power switch off and on.

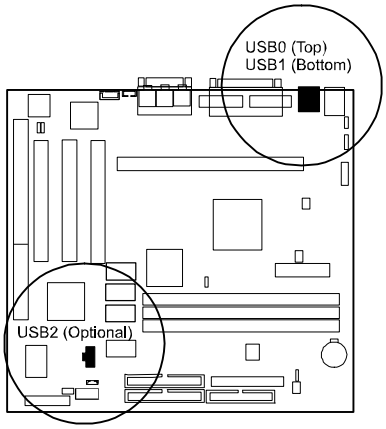
Speaker (F) is connected with the case speaker.

IDE LED (G) is connected IDE device indicator. This LED will blink when the hard disk drives are activated.

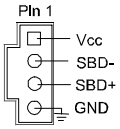
Universal Serial Bus Connectors: USB0, USB1, USB2 (optional)

These two connectors that integrated on the edge of the board are used for linking with USB peripheral devices. Also, this board provides an manufacturing optional connector USB2 for linking with the USB socket on the front panel of some system cases. If USB2 connector is used, it will make either USB0 or USB1 disabled. Your operating system must support USB features, such as MS Windows 98, MS Windows 95 OSR2.5 with USB Supplement.



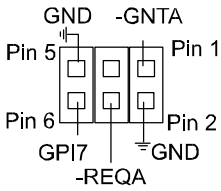


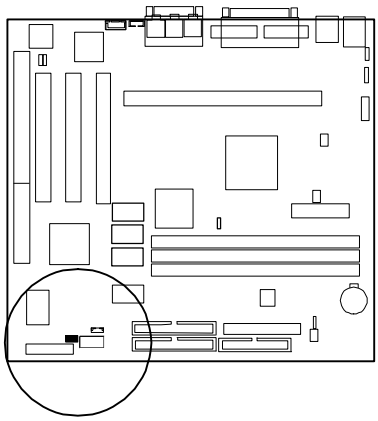
The figure below is the pin assignment of the manufacturing optional USB2 connector for front panel USB connection.



PCI Audio Card Connector: SB_LINK

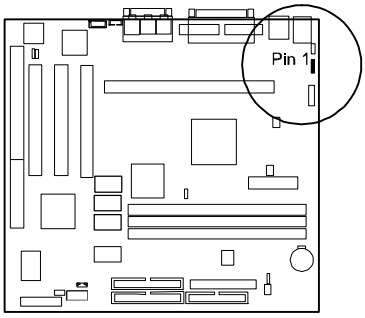
This 6-pin male connector allows you to connect to your Creative® sound card or compatible.

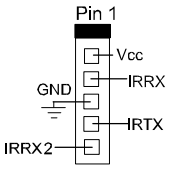




Infrared Connector: IR

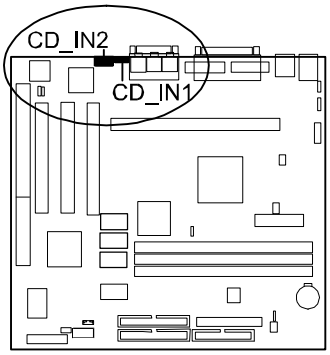
This 5-pin connector is used to link with your IR device to allow transmission of data to another system that also supports the IR feature. This module mounts to a small opening on system cases that supports this feature.





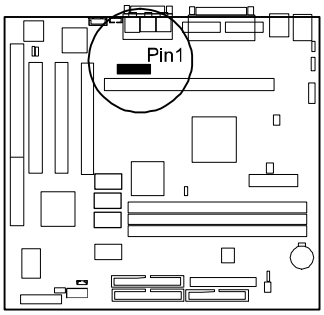
CD-ROM Drive Audio-out Connector: CD_IN1, CD_IN2

These two 4-pin block connector are used for different specifications about the AUDIO_OUT port of your CD-ROM drive by a cable which comes with it.



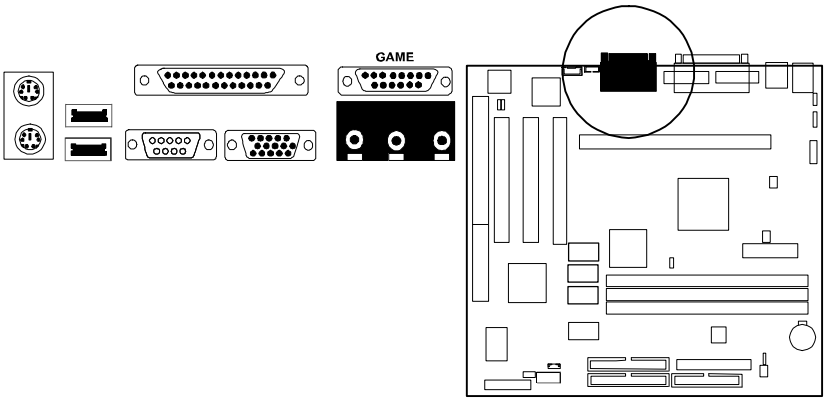
Digital Flat Panel Monitor Connector: DFP (optional)

The connector is linked to the DFP monitor by a cable. Your DFP monitor must be TFT type and supports EDID 2.0 or above.



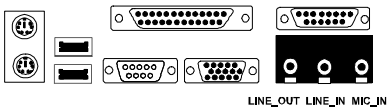
Joystick/MIDI Connector: GAME

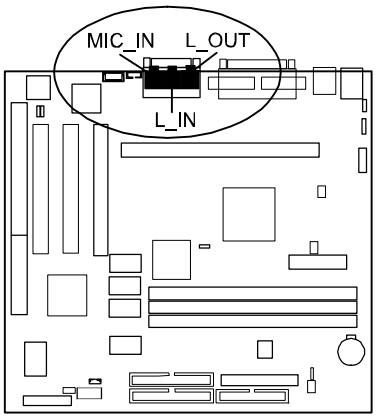
This 15-pin female connector allows you to connect game joysticks or game pads for playing games. Connect MIDI devices for playing or editing audio.



Audio I/O Jacks: L_OUT, L_IN, MIC_IN

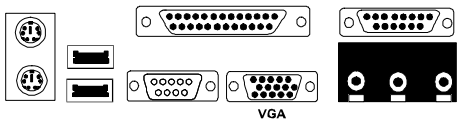
L_OUT can be connected to headphones or preferably powered speakers. L_IN allows tape players or other audio sources to be recorded by your computer or played through the L_OUT. MIC_IN allows microphones to be connected for input voice.

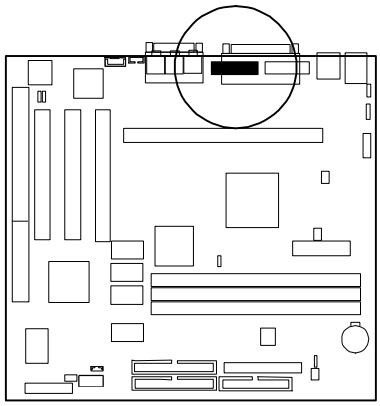




Video Graphics Accelerator: VGA

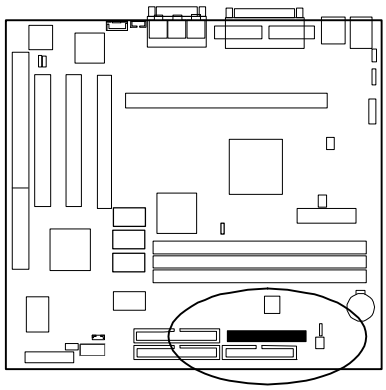
This 15-pin female D-sub connector is connected to your display monitor. If you are not using the onboard VGA feature, set the jumper VGA_DIS (VGA Disable) at Disabled (please read page 12).





ATI Multimedia Channel Connector: AMC

This bi-directional video port allows direct connection to popular video upgrades such as video capture/conferencing, hardware DVD or MPEG-2 decorder, or TV tuner with intercast support. It includes an I^2C interface for controlling AMC peripherals. If an ATI add-on card allowing an AMC interface such as ImpacTV2 is installed, this connector provides user with the linkage between the mainboard and the card. Refer to the card manual for more details.



FAQs

General FAQs

How do I know my BIOS version?

Spot it on the boot screen, click [Pause/Break] button to write it down.

How to install a PS/2 mouse?

Enable PS/2 in Advanced Setup (AMI BIOS).There is a label on the board which points to pin number one when connecting the PS/2 mouse adapter on the board. The Pin number two is not connected because the female connector (on PS/2 Mouse adapter) doesn't have wire on number two slot. The PS/2 mouse port is a 5 pins pin header which is located beside keyboard socket.

How do I know which PCB Revision my motherboard is?

Some motherboards have more than one PCB Revision. This is written in the top left corner of the motherboard, next to the ISA slots. In some cases different PCB revisions may not all support the same processors, or may require different BIOSes. This is indicated where applicable.

Can I use ECC memory?

Yes, provided your chipset supports it. Check your manual (Overview section) or consult the chipset manufacturer's Web site (Intel or VIA).

My FIC Pentium-based motherboard PCI 2.1-compliant?

Yes. All FIC Pentium-based motherboards are PCI 2.1-compliant.

How do I know which FLASH chip I have?

Partially remove the sticker from the chip and see the name of the manufacturer. Usually the jumper setting is set correctly in the factory.

What is the purpose of KB_LOCK pins located on the front panel connector?

To lock the keyboard access to the system (if short). This feature works in conjunction with keylock found on some computer cases - when it is locked, it shots the two KB_LOCK pins and prevents keyboard access to the system.

What the DMI utility is used for?

DMI Configuration Utility can be used to maintain the Management information Format database (MIFD). DMI is also able to auto-detect and record information pertinent to a computers system such as the CPU type, CPU speed and internal/external frequencies and memory size. The onboard BIOS detects as much system information as possible and stores it in a 4KB Block in the motherboards Flash EPROM and allows the DMI to retrieve data from this database. The DMI utility also allows the system integrator or end user to add additional information into the MIFD such as serial numbers, housing configuration and vendor information. Those information cannot be detected by the motherboards BIOS and has to manually entered through the DMI Configuration utility and updated into the MIFD.

Is my FIC Pentium-based motherboard PCI 2.1-compliant?

Yes. All FIC Pentium-based motherboards are PCI 2.1-compliant.

Where can I get the drivers for PCI set motherboards?

FIC motherboards are based on Intel® and VIA® chipsets, who also make the drivers. To download drivers you need, visit Drivers and Utilities Page. There you will see links to FAQs and other Web sites that explain in detail how to install the drivers.

How can I get the USB drivers?

Download Microsoft USB Supplement and a set of generic USB Drivers from Drivers and Utilities Page. You must have Windows 950B (Service Release II, "Windows97") to install these.These drivers resolve the yellow exclamation mark problem (Unknown Devices, USB) in Device Manager.

How do I use DMI Utility?

Very carefully, because otherwise your system can become totally unusable after altering and saving some configuration on DMI. DMI Utility should not be run from Windows or DOS version higher than v6.22.

If you accidentally alter some settings using DMI Utility under Windows95 (or MS-DOS that comes with it), flash the system BIOS immediately, do not reboot. In some cases, using Win95 as operating system (for applying DMI Utility) shows insufficient error message while trying to load the Flash utility, that's why we recommend to use DOS 6.22. In that case, the other option is to use the Boot Block feature on the BIOS. Use an ISA VGA card for the system to allow them to boot at least on drive "A" (using DOS 6.22 of course) so you will be able to flash the BIOS at least. If you use DMI from Windows95 DOS prompt or Restart in MS-DOS mode, you will not be able to restart the PC.

Why not update BIOS?

In 90% of cases, a BIOS update is released to address a problem with a particular piece of hardware or software.Therefore, the new BIOS gives the system some new (different) parameters to work with. Newer BIOS'es contain all fixes from previous versions. If the fix list of a new BIOS does NOT address any of problems that you may have, it is unreasonable to update BIOS only for sake of it, because you may be using a combination of hardware/software that is incompatible and yet-untested with the BIOS version you're upgrading to.

It is recommended to refrain from updating BIOS without a good reason. If you don't see your problem listed in the fix list, do not update BIOS - better go to a shareware Web site (winfiles.com, shareware.com, tucows.com) and update your software or do something les dangerous.

And finally, some 10% of BIOS updates contain new CPU ID strings and code enhancements (ACPI, etc.). For those an update is recommended only when it is necessary (i.e. the processor ID does not display properly, the system must have ACPI, etc.).

A typical situation occurs when a user wants to update BIOS because the new version supports a CPU he/she "plans" to buy sometime in the future. With some bad luck, the user ends up with a wrong BIOS (wrong PCB, or chipset, or I/O or all of them) and a fried BIOS.

BIOS FAQs

How do I flash a new BIOS?

The mainboard package provides BIOS flash software tool in the software utility CD-ROM. This software feature is provided for upgrading BIOS use. Play the CD-ROM, click on *Browse CD*, select *Flash*, then choose the BIOS vendor that provided the BIOS this board came with. Please print the relating README file and read it first. For more information about, please visit FIC Online at www.fic.com.tw.

Downloading BIOS File

Format a bootable system diskette, visit the FIC website at **www.fic.com.tw**. Click *BIOS/Drivers Update* item under **BIOS** group, then select the BIOS file you need. Download it to your bootable diskette.

Upgrading BIOS File

Place the bootable diskette containing the BIOS file in the diskette drive (Assume the diskette drive is A.), and reboot the system by A drive. At the A: > prompt, execute the BIOS upgrading procedure by entering the Flash BIOS utility and the BIOS file with its extension.

Command: {flash tool file}{space}{downloaded BIOS file} <Enter>
The other parameters are listed in the relating README file, please read it if need.

After press *Enter* key, type Y to the message **Press ” to Continue, ” to Reboot**. Press *Enter* key. When the message **Press Any Key to Reboot**, the procedure is completed. Press any key to reboot.

What is "Hardware-based intelligent virus protection"?

This is a new BIOS feature based on anti-virus (AV) softwere that protects the system from boot-time viruses. It is intellgent in the sense that it uses rules modeled after virii's behavior. For example, it can tell the difference between normal writing to HDD boot sector and virus-attempted writing. It unloads after boot-up so it does not provide total protection and is not intended to serve as replacement for regular anti-virus software.

This utility includes only Scan funcition and not Virus Delete function. It is not necessary to "update" virus definition files because there are none.

When I try to flash BIOS I get an error message saying about a wrong part number. Why?

Flash EPROM ("BIOS") chips used on FIC motherboards vary (Intel, AMD, Fujitsu, etc.). As far as this problem is concerned, there are two possible reasons:

a) you may have used a wrong BIOS or flash utility. Verify that both the BIOS file and the flash utility are the right versions.

b) the flash utility you used did not recognize the type of flash EPROM installed on your motherboard. Verify that you have the right files and if you're sure in that, ignore the warning.

I updated my BIOS and am not very much pleased with the result (slower performance, new bugs, etc.). What now?

Restore the old BIOS or wait until a newer BIOS is available. You should use the flash utility supplied with the old BIOS and NOT the flash utility you got with the new BIOS. If you do not know what flash utility it was, consult the Web support pages or contact technical support.

Windows 98 FAQs

What's the proper install prcedure for VIA-based motherboards?

There are four steps:

1) Go to BIOS Setup and enable USB

2) Install Win98 on your system

3) Download and install the VIA IrQ routing miniport driver from our Drivers and Utilities page

4) Download and install the VIA AGP driver from the same page (for MVP3 & VP3 chipsets only).

Windows98 comes with PCI Bridge patch included so you don't need to install it. In case you have more PCI devices always put the first PCI device on PCI Slot 2 and remember to enable USB in BIOS.

Why does my VIA chipset-based motherboard crash under Windows98?

This problem is caused by incorrect assignment of IRQ by Microsoft(r) Windows98. MiniPort driver released by VIA reassigns these IRQs. The driver has not been relased by FIC yet but it can be found on the FIC FTP server. Drivers approved by FIC can be downloaded from Drivers and Utilities page.

I need Windows98 drivers for my (VIA chipset-based) FIC motherboard!

Windows98 contains all drivers necessary. Therefore you need not use any of the drivers supplied on the CD-PRO/floppy.

For VIA chipset based motherboards, there is a problem with the way Windows98 assigns IRQs to devices - some may remain "invisible". This is the IRQ rooting problem desribed above (download the driver).

Another driver you might wish to update (not recommended unless you are experiencing problems) is VIA Bus Master IDE driver. It is shipped with MS Windows98 but newer versions are available for download.

Another thing you might wish to update is your VxD driver, also available on Drivers and Utilities page.

I flashed BIOS and now Windows won't boot.. I get a VxD error message.

This happens sometimes and is a software problem. You will have to reinstall Windows based on new BIOS. Windows must have found new settings (registers) different from the old BIOS, so Vxd error message will pop up if these are not found.

My Sound Blaster Live does not work under DOS. Why?

Creative Labs specifies that it does not work under DOS but it does work in DOS mode under Windows

Windows 95 FAQs

What is the proper install order of graphics-related VIA drivers?

1)Install Windows, 2) If your motherboard has an AGP port, load Vxd driver v. 2.9. 4) Load display card driver.

Why does my VIA chipset-based system crash when the system attempts to access UDMA HDD?

This problem appears under Windows 95 OSR2 and OSR 2.1. Microsoft made two updated versions of drivers that cause the problem. Please download them at

http://support.microsoft.com/support/kb/articles/q171/3/53.asp

How can I know if a software (example: WindowsNT) is compatible with FIC motherboards?

Each FIC motherboard is tested with a variety of operating systems and applications. Compatibility reports are published every time new model or updated model of a motherboard is released.Compatibility reports can be downloaded from individual motherboard support pages or from the FIC FTP Server (opens in a new window).

Windows95 shows an exclamation mark next to USB device on my motherboard. Is there any driver that canhelp me?

The only reason why you can see that Exclamation mark on USB serial Bus & PCI Bridge is that Windows95 didn't support it. You will need to install its drivers to fix it.

Intel CPU FAQs

What's the difference between Celeron(tm) CPU packages SEPP and PPGA?

Celeron SEPP is a Slot-1 version of the processor. Celeron PPGA is the type that fits on Socket 370. For more information, visit http://www.intel.com.

How do I know what Intel CPU I've got?

CPU ID is a string by which a CPU identifies itself to BIOS. Since processor marking can be changed andsome processors can run even at higher frequencies than they're manufactured for, remarked processors can be found on the market. Since they usually do run at the remarked frequency, in that case it is hard to find out what CPU you actually have. To learn what Intel CPU you really have, download Intel's utility CPUID.EXE and run it in real mode (boot from a floppy and run it under DOS).

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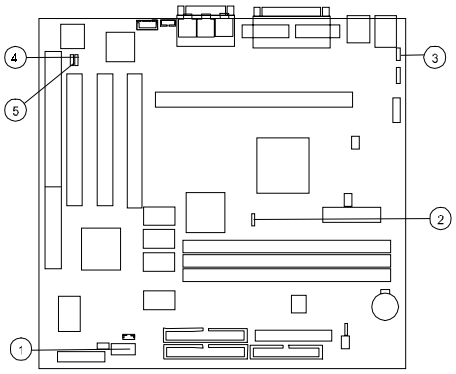
Quick Reference

KBI-6130 / KBI-6130-V

DOC No. : 16409	Date : 1, 1999
Rev. : A0	Part No. : 25-10891-00

Jumper Settings



1 SW1-1/2/3/4 (System Frequency Select)

Ratio	CPU Speed 100MHz	CPU Speed 66MHz	SW1-1	SW1-2	SW1-3	SW1-4
3.5 x	350MHz	233MHz	ON	ON	OFF	OFF
4.0 x	400MHz	266MHz	ON	OFF	ON	ON
4.5 x	450MHz	300MHz	ON	OFF	ON	OFF
5.0 x	500MHz	333MHz	ON	OFF	OFF	ON
5.5 x	550MHz	366MHz	ON	OFF	OFF	OFF
6.0 x	600MHz	400MHz	OFF	ON	ON	ON
6.5 x	650MHz	433MHz	OFF	ON	ON	OFF
7.0 x	700MHz	466MHz	OFF	OFF	ON	ON
7.5 x	750MHz	500MHz	OFF	OFF	ON	OFF

SW1-5 (Clear CMOS)

Enable (Clear CMOS)

Disable (Default)

SW1-6 (Clear Password)

Enable (Clear Password)

Disable (Default)

2 VGA_DIS (Onboard Video Feature)

Enable (Default)

Disable

4 AUD_DIS (Onboard Audio Feature)

Enable (Default)

Disable

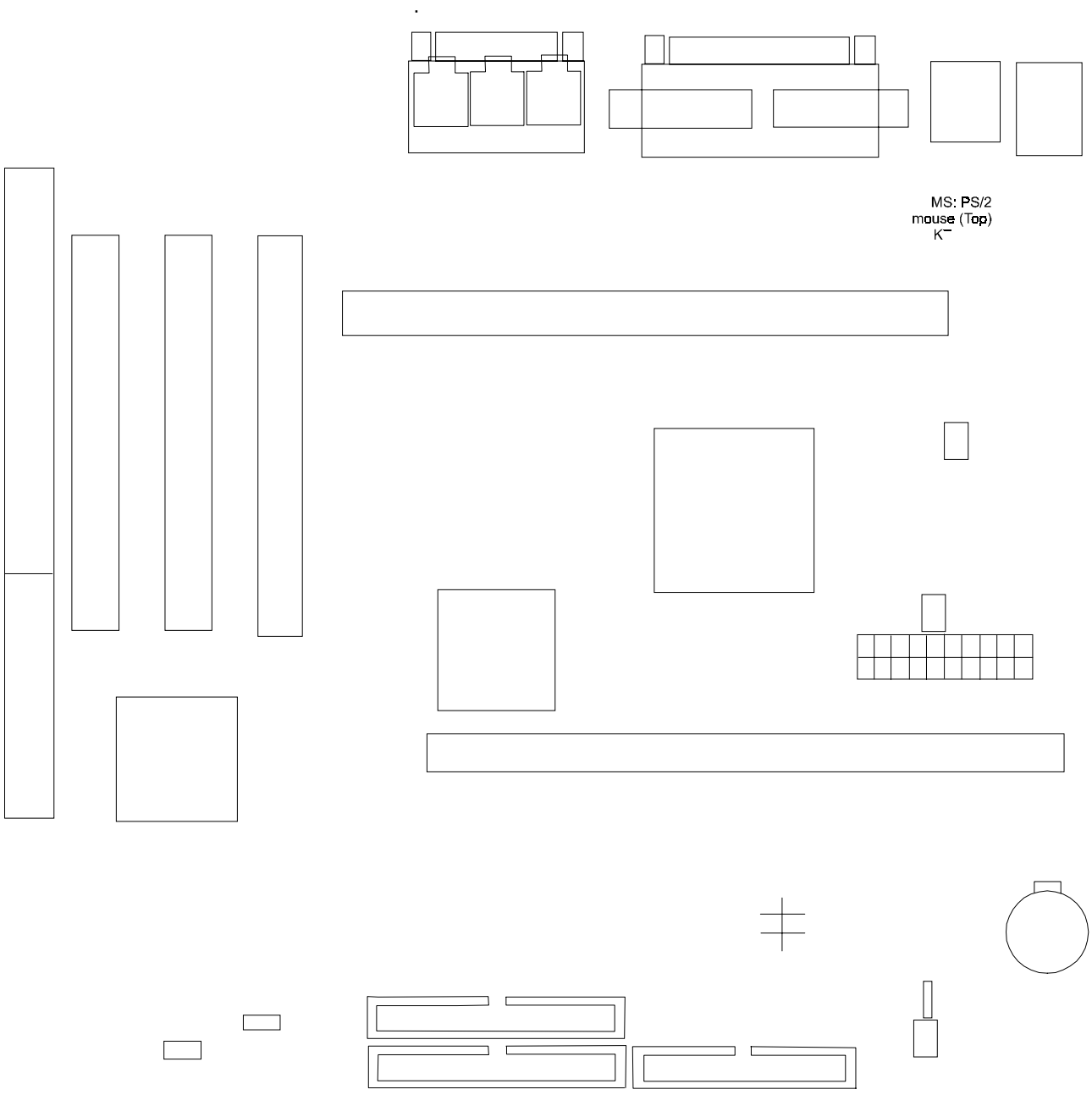
3 KEY_WAKE (Keyboard Wake-Up)

Enable

Disable (Default)

5 EP (Flash ROM Type Select)

2MB
MXIC 28F2000

SST 29EE020
ATMEL 29C020
AMD 28F020

Connectors