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## **CHAPTER 1: INTRODUCTION**

### **1.1 BEFORE YOU START**

Thank you for choosing our product. Before you start installing the motherboard, please make sure you follow the instructions below:

- Prepare a dry and stable working environment with sufficient lighting.
- Always disconnect the computer from power outlet before operation.
- Before you take the motherboard out from anti-static bag, ground yourself properly by touching any safely grounded appliance, or use grounded wrist strap to remove the static charge.
- Avoid touching the components on motherboard or the rear side of the board unless necessary. Hold the board on the edge, do not try to bend or flex the board.
- Do not leave any unfastened small parts inside the case after installation. Loose parts will cause short circuits which may damage the equipment.
- Keep the computer from dangerous area, such as heat source, humid air and water.

### **1.2 PACKAGE CHECKLIST**

- ✚ HDD Cable X 1
- ✚ Serial ATA Cable X 2
- ✚ Rear I/O Panel for ATX Case X 1
- ✚ User's Manual X 1
- ✚ Fully Setup Driver CD X 1
- ✚ FDD Cable X 1 (optional)
- ✚ USB 2.0 Cable X1 (optional)
- ✚ S/PDIF out Cable X 1 (optional)
- ✚ Serial ATA Power Cable X 1 (optional)

**Note:** The package contents may differ by area or your motherboard version.

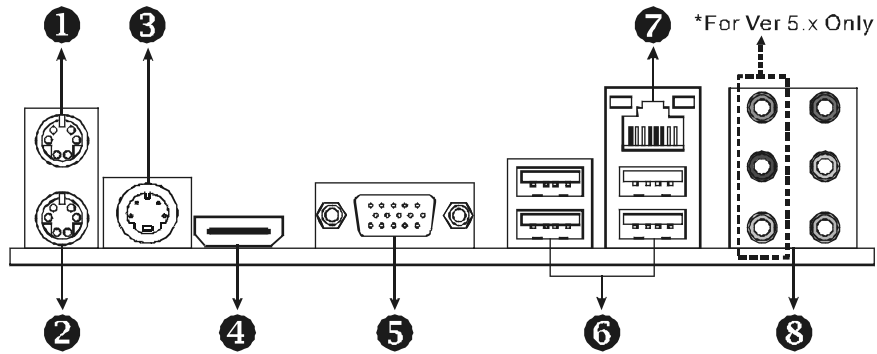
### 1.3 MOTHERBOARD FEATURES

	<i>TF7050-M2</i>	<i>TF7025-M2</i>
CPU	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron processors AMD 64 Architecture enables 32 and 64 bit computing Supports Hyper Transport and Cool'n'Quiet	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron processors AMD 64 Architecture enables 32 and 64 bit computing Supports Hyper Transport and Cool'n'Quiet
FSB	Supports up to 1 GHz Bandwidth Support HyperTransport	Supports up to 1 GHz Bandwidth Support HyperTransport
Chipset	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Super I/O	ITE 8716F Provides the most commonly used legacy Super I/O functionality. Low Pin Count Interface Environment Control initiatives, H/W Monitor Fan Speed Controller ITE's "Smart Guardian" function	ITE 8716F Provides the most commonly used legacy Super I/O functionality. Low Pin Count Interface Environment Control initiatives, H/W Monitor Fan Speed Controller ITE's "Smart Guardian" function
Main Memory	DDR2 DIMM Slots x 4 Max Memory Capacity 8GB Each DIMM supports 256/512MB/1GB/2GB DDR2 Dual Channel Mode DDR2 memory module Supports DDR2 400/ 533 / 667 / 800 Registered DIMM and ECC DIMM is not supported	DDR2 DIMM Slots x 4 Max Memory Capacity 8GB Each DIMM supports 256/512MB/1GB/2GB DDR2 Dual Channel Mode DDR2 memory module Supports DDR2 400/ 533 / 667 / 800 Registered DIMM and ECC DIMM is not supported
Graphics	Integrated in GeForce 7050PV/NF630a Chipset Max Shared Video Memory is 256MB	Integrated in GeForce 7025/NF630a Chipset Max Shared Video Memory is 256MB
IDE	Integrated IDE Controller Ultra DMA 33 / 66 / 100 / 133 Bus Master Mode supports PIO Mode 0~4,	Integrated IDE Controller Ultra DMA 33 / 66 / 100 / 133 Bus Master Mode supports PIO Mode 0~4,
SATA II	Integrated Serial ATA Controller Data transfer rates up to 3 Gb/s. SATA Version 2.0 specification compliant.	Integrated Serial ATA Controller Data transfer rates up to 3 Gb/s. SATA Version 2.0 specification compliant.
LAN	Realtek RTL 8111B / 8101E (optional) 10 / 100 Mb/s / 1Gb/s auto negotiation (Gigabit bandwidth is for RTL 8111B only) Half / Full duplex capability	Realtek RTL 8111B / 8101E (optional) 10 / 100 Mb/s / 1Gb/s auto negotiation (Gigabit bandwidth is for RTL 8111B only) Half / Full duplex capability

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Sound	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 channels audio out (Ver 5.x) / 5.1 channels audio out (Ver 6.x) High Definition Audio 2 channels audio out for HDMI Audio	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 channels audio out (Ver 5.x) / 5.1 channels audio out (Ver 6.x) High Definition Audio
Slots	PCI slot x2 PCI Express x16 slot x1 PCI Express x 1 slot x1	PCI slot x2 PCI Express x16 slot x1 PCI Express x 1 slot x1
On Board Connector	Floppy connector x1 Printer Port connector x1 IDE Connector x1 SATA Connector x4 Front Panel Connector x1 Front Audio Connector x1 CD-in Connector x1 S/PDIF out connector x1 S/PDIF in connector (Optional) x1 CPU Fan header x1 System Fan header x3 CMOS clear header x1 USB connector x3 Serial port Connector x1 Power Connector (24pin) x1 Power Connector (4pin) x1	Floppy connector x1 Printer Port connector x1 IDE Connector x1 SATA Connector x4 Front Panel Connector x1 Front Audio Connector x1 CD-in Connector x1 S/PDIF out connector x1 S/PDIF in connector (Optional) x1 CPU Fan header x1 System Fan header x3 CMOS clear header x1 USB connector x3 Serial port Connector x1 Power Connector (24pin) x1 Power Connector (4pin) x1
Back Panel I/O	PS/2 Keyboard x1 PS/2 Mouse x1 S-Video port x1 HDMI port x1 VGA port x1 LAN port x1 USB Port x4 Audio Jack (for Ver 5.x) x6 Audio Jack (for Ver 6.x) x3	PS/2 Keyboard x1 PS/2 Mouse x1 VGA port x1 DVI-D port x1 LAN port x1 USB Port x4 Audio Jack (for Ver 5.x) x6 Audio Jack (for Ver 6.x) x3
Board Size	235 mm(W) x 244 mm(L)	235 mm(W) x 244 mm(L)
Special Features	RAID 0 / 1 / 5 / 0+1 support	RAID 0 / 1 / 5 / 0+1 support
OS Support	Windows 2000 / XP / VISTA Biostar Reserves the right to add or remove support for any OS With or without notice.	Windows 2000 / XP / VISTA Biostar Reserves the right to add or remove support for any OS With or without notice.

## 1.4 REAR PANEL CONNECTORS (FOR TF7050-M2)



**1 PS/2 Mouse Port**

**2 PS/2 Keyboard Port**

**3 S-Video TV-Out Port**

Transmit analog video signals to TV or any other display panels equipped with S-Video input.

**4 HDMI Port**

The High-Definition Multimedia Interface (HDMI) is an all-digital audio/video interface capable of transmitting uncompressed streams to an AV receiver or any compatible digital audio and/or video monitor, such as a digital television.

**5 D-Sub VGA Port**

Transmit analog video signals to computer monitor or any other display panels equipped with D-Sub VGA input.

**6 USB 2.0 Port x 4**

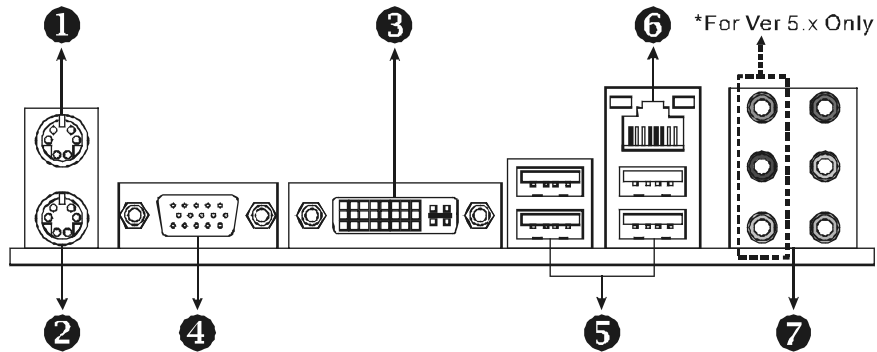
**7 RJ-45 LAN Port**

**8 Audio Jack x 6 (for Ver 5.x) / Audio Jack x 3 (for Ver 6.x)**

Port	2-Channel	4-Channel	6-Channel/8-Channel
<b>Blue</b>	Line-In	Line-In	Line-In
<b>Green</b>	Line-Out	Front Speaker Out	Front Speaker Out
<b>Pink</b>	Mic In	Mic In	Mic In
<b>Orange</b>			Center/Subwoofer
<b>Black</b>	Rear Speaker Out	Rear Speaker Out	Rear Speaker Out
<b>Grey</b>			Side Speaker Out

**NOTE:** The GeForce 7050PV/NF630a chipset uses the same channel to control S-Video and D-Sub for transmitting analog video signals, so these ports cannot work simultaneously.

## 1.5 REAR PANEL CONNECTORS (FOR TF7025-M2)



❶ PS/2 Mouse Port

❷ PS/2 Keyboard Port

❸ DVI-D VGA Port

The Digital Visual Interface (DVI) is a video interface transmitting digital video signals to digital display devices such as flat panel LCDs or digital projectors. The DVI-D connector allows digital signals transmission only.

❹ D-Sub VGA Port

Transmit analog video signals to computer monitor or any other display panels equipped with D-Sub VGA input.

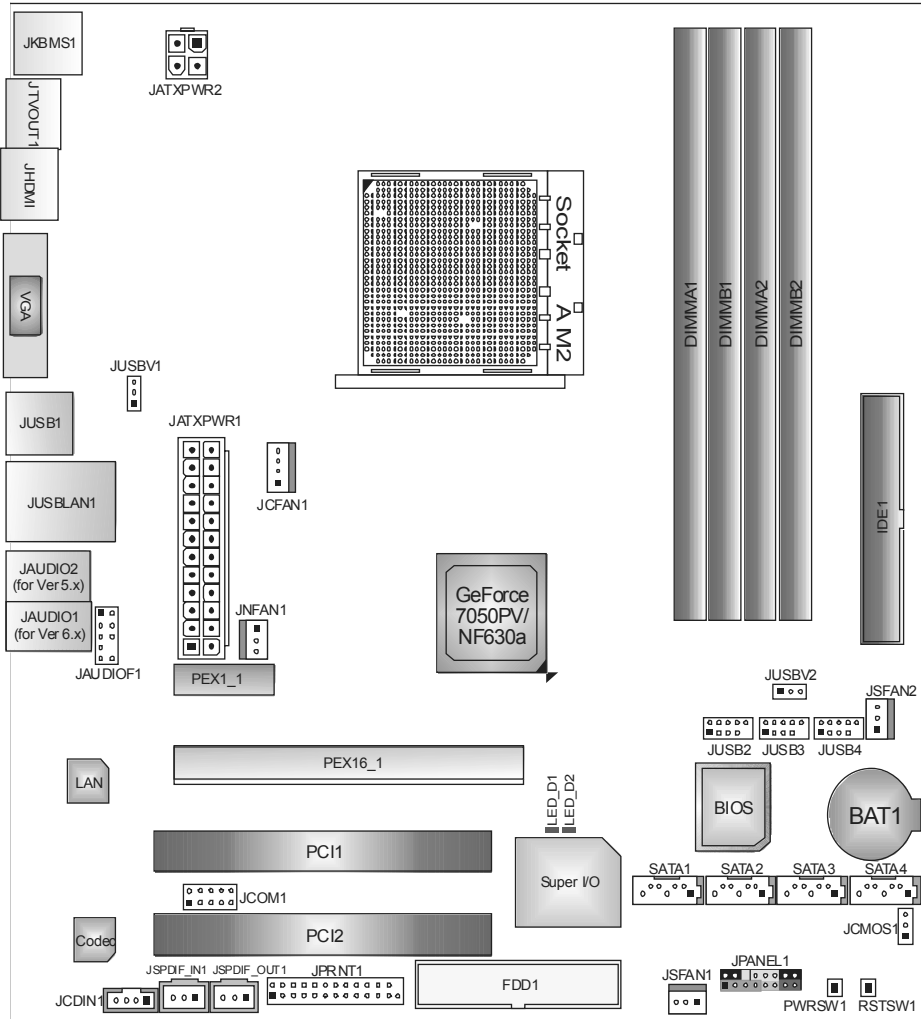
❺ USB 2.0 Port x 4

❻ RJ-45 LAN Port

❼ Audio Jack x 6 (for Ver 5.x) / Audio Jack x 3 (for Ver 6.x)

Port	2-Channel	4-Channel	6-Channel/8-Channel
<b>Blue</b>	Line-In	Line-In	Line-In
<b>Green</b>	Line-Out	Front Speaker Out	Front Speaker Out
<b>Pink</b>	Mic In	Mic In	Mic In
<b>Orange</b>			Center/Subwoofer
<b>Black</b>	Rear Speaker Out	Rear Speaker Out	Rear Speaker Out
<b>Grey</b>			Side Speaker Out

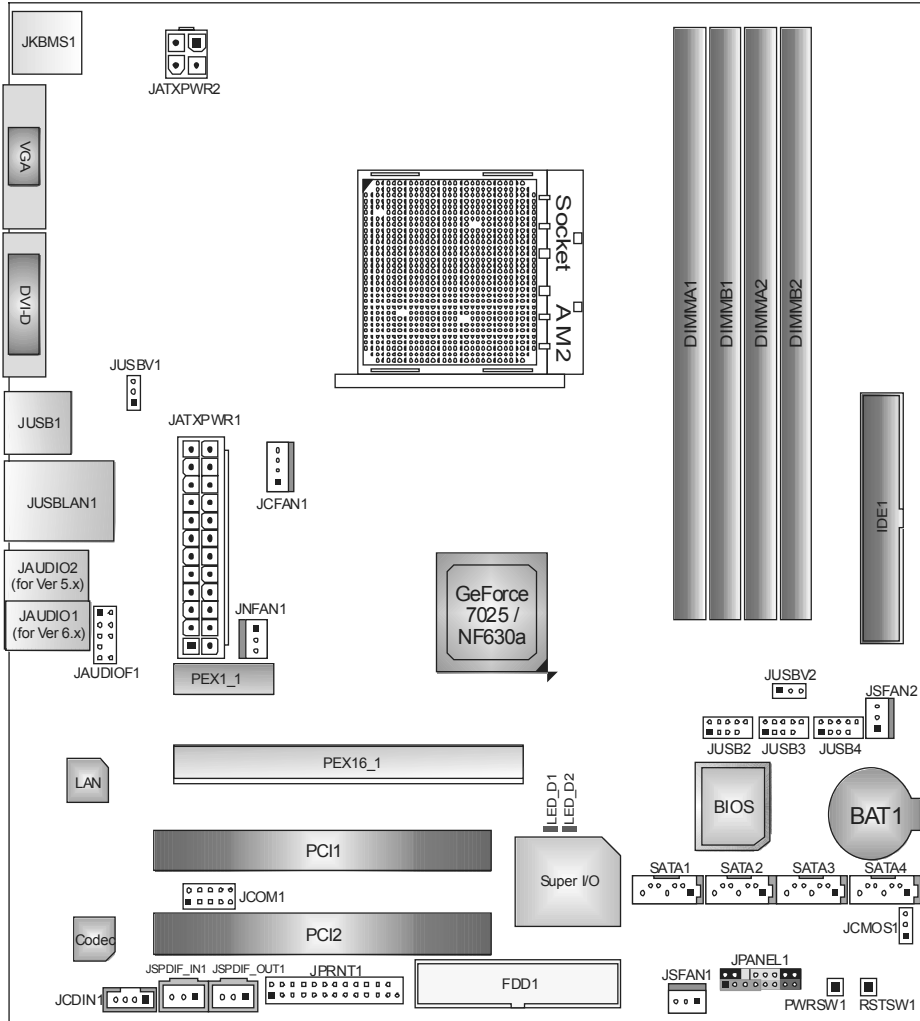
## 1.6 MOTHERBOARD LAYOUT (FOR TF7050-M2)



**Note:** ■ represents the 1<sup>st</sup> pin.



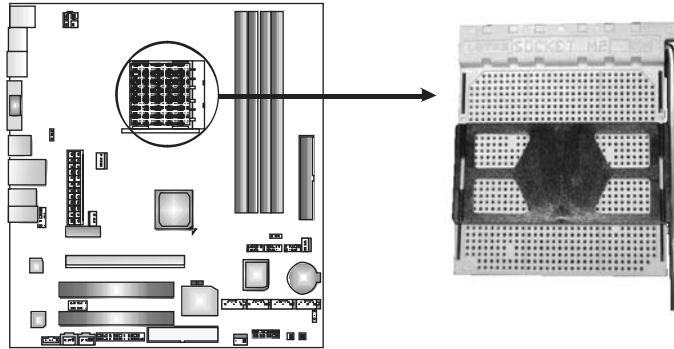
### 1.7 MOTHERBOARD LAYOUT (FOR TF7025-M2)



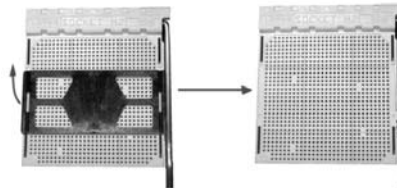
**Note:** ■ represents the 1<sup>st</sup> pin.

## CHAPTER 2: HARDWARE INSTALLATION

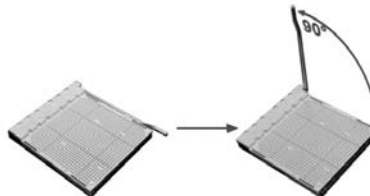
### 2.1 INSTALLING CENTRAL PROCESSING UNIT (CPU)



**Step 1:** Remove the socket protection cap.



**Step 2:** Pull the lever toward direction A from the socket and then raise the lever up to a 90-degree angle.



**Step 3:** Look for the white triangle on socket, and the gold triangle on CPU should point towards this white triangle. The CPU will fit only in the correct orientation.

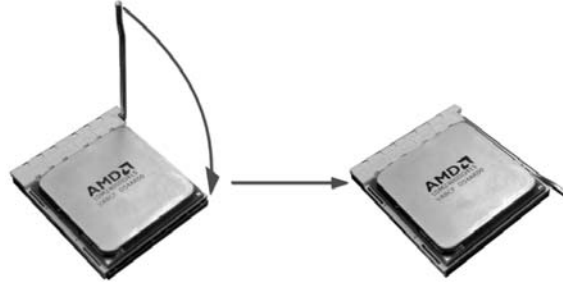


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**TF7050-M2/TF7025-M2**

**Step 4:** Hold the CPU down firmly, and then close the lever toward direct B to complete the installation.

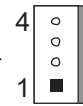
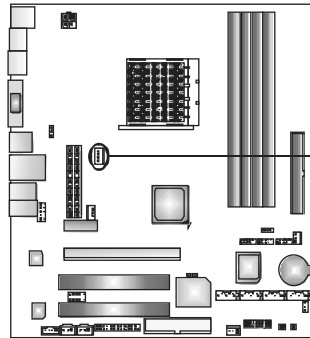


**Step 5:** Put the CPU Fan on the CPU and buckle it. Connect the CPU FAN power cable to the JCFAN1. This completes the installation.

## 2.2 FAN HEADERS

These fan headers support cooling-fans built in the computer. The fan cable and connector may be different according to the fan manufacturer. Connect the fan cable to the connector while matching the black wire to pin#1.

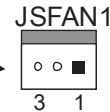
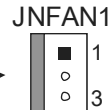
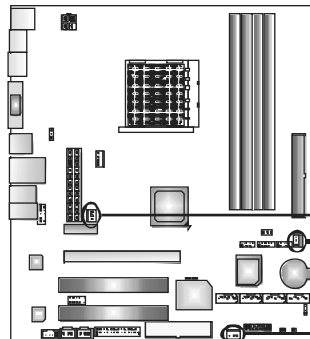
### JCFAN1: CPU Fan Header



Pin	Assignment
1	Ground
2	+12V
3	FAN RPM rate sense
4	Smart Fan Control (By Fan)

### JNFAN1: North Bridge Fan Header

### JSFAN1/JSFAN2: System Fan Header



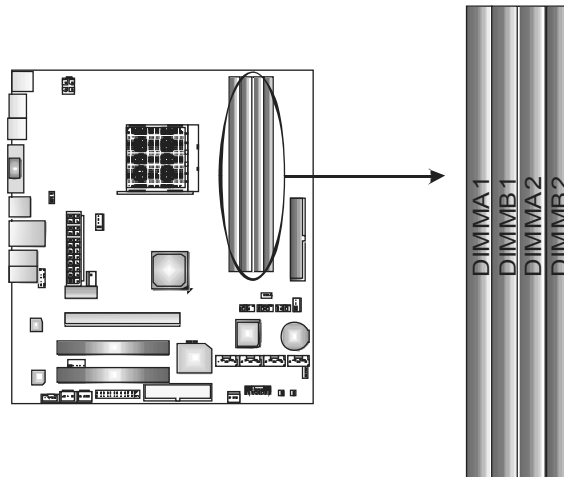
Pin	Assignment
1	Ground
2	+12V
3	FAN RPM rate sense

**Note:**

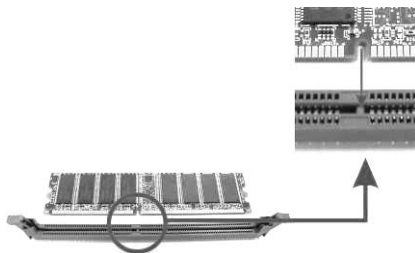
The JCFAN1 supports 4-pin head connector. The JSFAN1/JSFAN2 and JNFAN1 support 3-pin head connectors. When connecting with wires onto connectors, please note that the red wire is the positive and should be connected to pin#2, and the black wire is Ground and should be connected to GND.

## 2.3 INSTALLING SYSTEM MEMORY

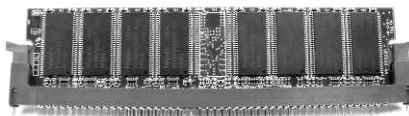
### A. Memory Modules



1. Unlock a DIMM slot by pressing the retaining clips outward. Align a DIMM on the slot such that the notch on the DIMM matches the break on the Slot.



2. Insert the DIMM vertically and firmly into the slot until the retaining chip snap back in place and the DIMM is properly seated.



**B. Memory Capacity**

DIMM Socket Location	DDR2 Module	Total Memory Size
DIMMA1	256MB/512MB/1GB/2GB	Max is 8GB.
DIMMB1	256MB/512MB/1GB/2GB	
DIMMA2	256MB/512MB/1GB/2GB	
DIMMB2	256MB/512MB/1GB/2GB	

**C. Dual Channel Memory installation**

To trigger the Dual Channel function of the motherboard, the memory module must meet the following requirements:

Install memory module of the same density in pairs, shown in the following table.

Dual Channel Status	DIMMA1	DIMMB1	DIMMA2	DIMMB2
Enabled	O	O	X	X
Enabled	X	X	O	O
Enabled	O	O	O	O

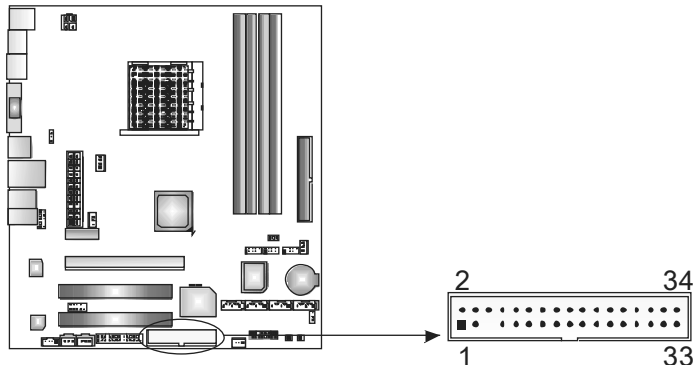
(O means memory installed, X means memory not installed.)

The DRAM bus width of the memory module must be the same (x8 or x16)

## 2.4 CONNECTORS AND SLOTS

### FDD1: Floppy Disk Connector

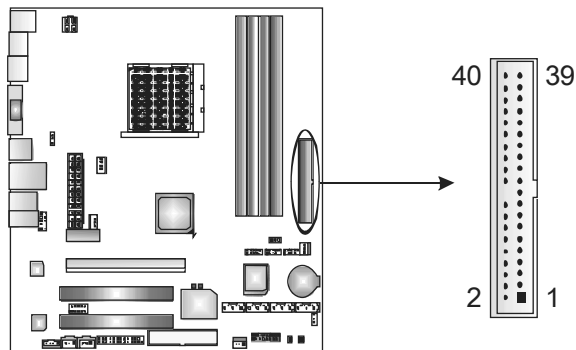
The motherboard provides a standard floppy disk connector that supports 360K, 720K, 1.2M, 1.44M and 2.88M floppy disk types. This connector supports the provided floppy drive ribbon cables.



### IDE1: Hard Disk Connector

The motherboard has a 32-bit Enhanced PCI IDE Controller that provides PIO Mode 0~4, Bus Master, and Ultra DMA 33/66/100/133 functionality.

The IDE connector can connect a master and a slave drive, so you can connect up to two hard disk drives.

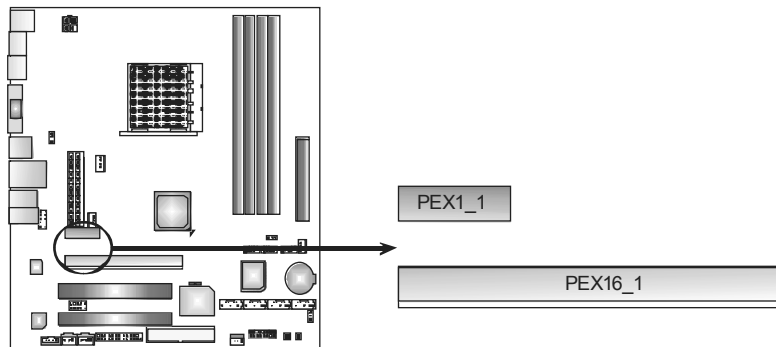


**PEX16\_1: PCI-Express x16 Slot**

- PCI-Express 1.0a compliant.
- Maximum theoretical realized bandwidth of 4GB/s simultaneously per direction, for an aggregate of 8GB/s totally.

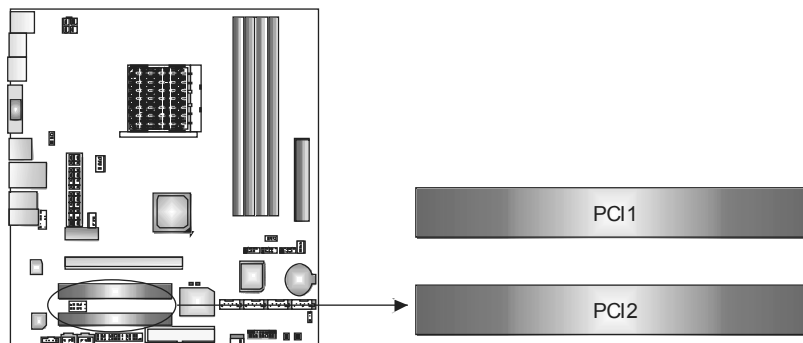
**PEX1\_1: PCI-Express x1 Slot**

- PCI-Express 1.0a compliant.
- Data transfer bandwidth up to 250MB/s per direction; 500MB/s in total.
- PCI-Express supports a raw bit-rate of 2.5GB/s on the data pins.
- 2X bandwidth over the traditional PCI architecture.



**PCI1~PCI2: Peripheral Component Interconnect Slots**

This motherboard is equipped with 2 standard PCI slots. PCI stands for Peripheral Component Interconnect, and it is a bus standard for expansion cards. This PCI slot is designated as 32 bits.





## CHAPTER 3: HEADERS & JUMPERS SETUP

### 3.1 HOW TO SETUP JUMPERS

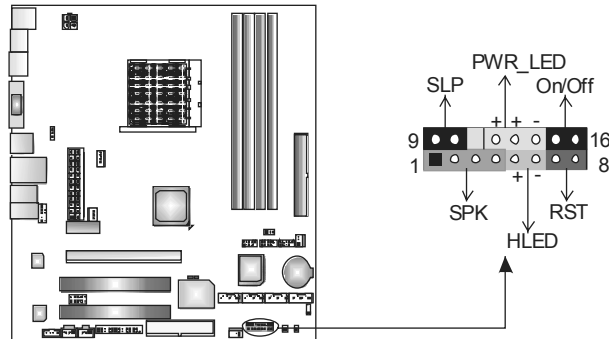
The illustration shows how to set up jumpers. When the jumper cap is placed on pins, the jumper is “close”, if not, that means the jumper is “open”.



### 3.2 DETAIL SETTINGS

#### J PANEL1: Front Panel Header

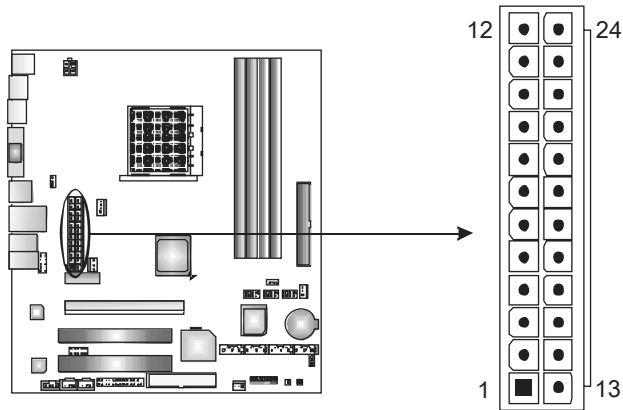
This 16-pin connector includes Power-on, Reset, HDD LED, Power LED, Sleep button and speaker connection. It allows user to connect the PC case's front panel switch functions.



Pin	Assignment	Function	Pin	Assignment	Function
1	+5V	Speaker Connector	9	Sleep control	Sleep button
2	N/A		10	Ground	
3	N/A		11	N/A	N/A
4	Speaker	Hard drive LED	12	Power LED (+)	Power LED
5	HDD LED (+)		13	Power LED (+)	
6	HDD LED (-)		14	Power LED (-)	
7	Ground	Reset button	15	Power button	Power-on button
8	Reset control		16	Ground	

### JATXPWR1: ATX Power Source Connector

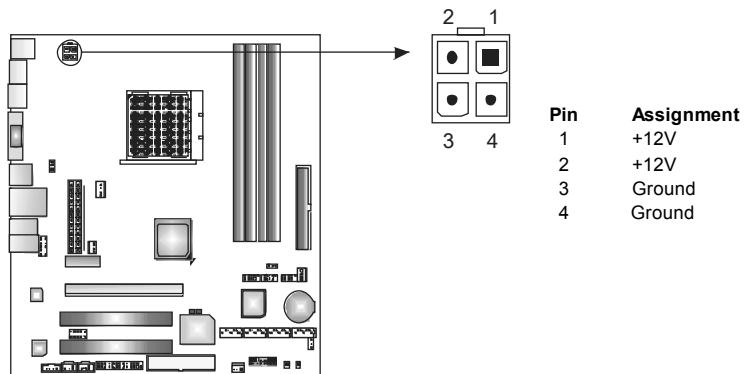
This connector allows user to connect 24-pin power connector on the ATX power supply.



Pin	Assignment	Pin	Assignment
13	+3.3V	1	+3.3V
14	-12V	2	+3.3V
15	Ground	3	Ground
16	PS_ON	4	+5V
17	Ground	5	Ground
18	Ground	6	+5V
19	Ground	7	Ground
20	NC	8	PW_OK
21	+5V	9	Standby Voltage+5V
22	+5V	10	+12V
23	+5V	11	+12V
24	Ground	12	+3.3V

### JATXPWR2: ATX Power Source Connector

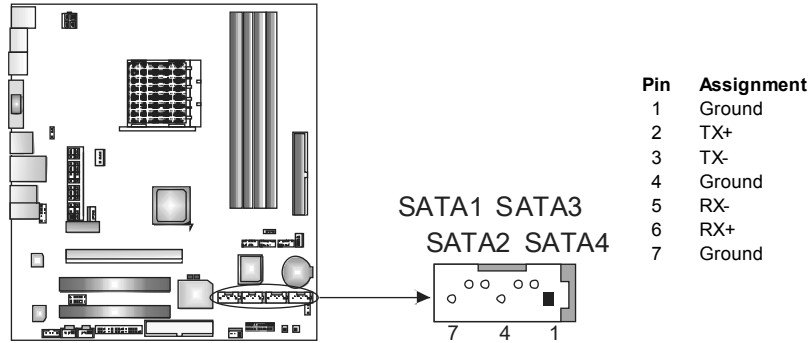
By connecting this connector, it will provide +12V to CPU power circuit.



Pin	Assignment
1	+12V
2	+12V
3	Ground
4	Ground

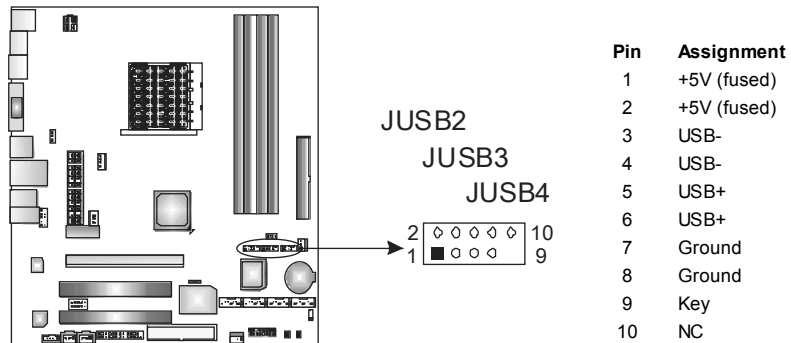
### SATA1~SATA4: Serial ATA Connectors

The motherboard has a PCI to SATA Controller with 4 channels SATA interface.



### JUSB2/JUSB3/JUSB4: Headers for USB 2.0 Ports at Front Panel

This header allows user to connect additional USB cable on the PC front panel, and also can be connected with internal USB devices, like USB card reader.



### JUSBV1/JUSBV2: Power Source Headers for USB Ports

**Pin 1-2 Close:**

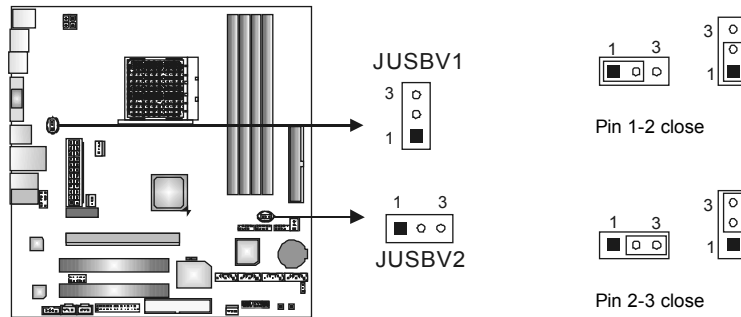
JUSBV1: +5V for USB ports at JUSB1/JUSBLAN1.

JUSBV2: +5V for USB ports at front panel (JUSB2/JUSB3/JUSB4).

**Pin 2-3 Close:**

JUSBV1: USB ports at JUSB1/JUSBLAN1 are powered by +5V standby voltage.

JUSBV2: USB ports at front panel (JUSB2/JUSB3/JUSB4) are powered by +5V standby voltage.

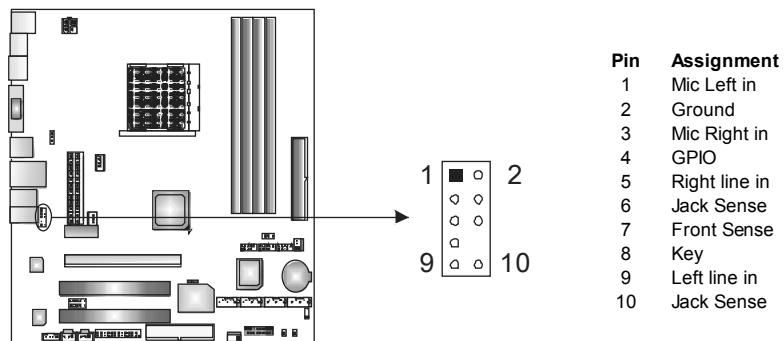


**Note:**

In order to support this function “Power-On system via USB device,” “JUSBV1/ JUSBV2” jumper cap should be placed on Pin 2-3 individually.

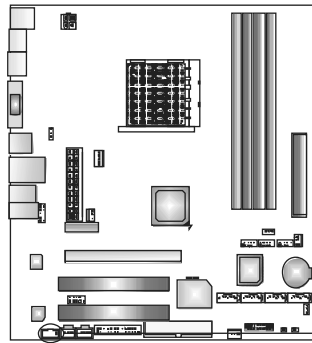
### JAUDIOF1: Front Panel Audio Header

This header allows user to connect the front audio output cable with the PC front panel. It will disable the output on back panel audio connectors.

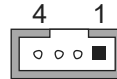


**JCDIN1: CD-ROM Audio-in Connector**

This connector allows user to connect the audio source from the variety devices, like CD-ROM, DVD-ROM, PCI sound card, PCI TV turner card etc..

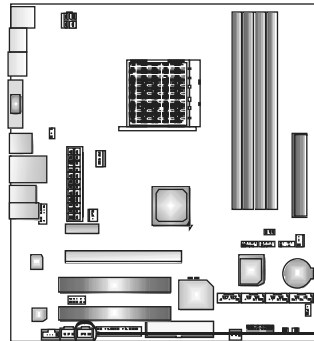


Pin	Assignment
1	Left Channel Input
2	Ground
3	Ground
4	Right Channel Input

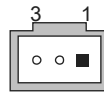


**JSPDIF\_OUT1: Digital Audio-out Connector**

This connector allows user to connect the PCI bracket SPDIF output header.

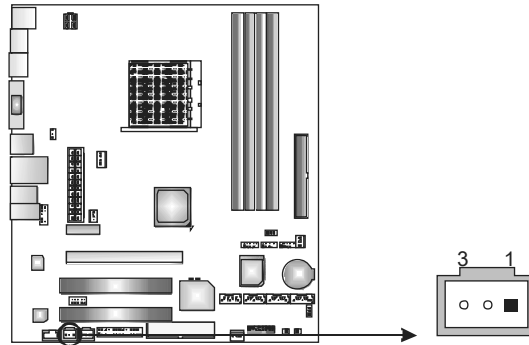


Pin	Assignment
1	+5V
2	SPDIF_OUT
3	Ground



### JSPDIF\_IN1: Digital Audio-out Connector (Optional)

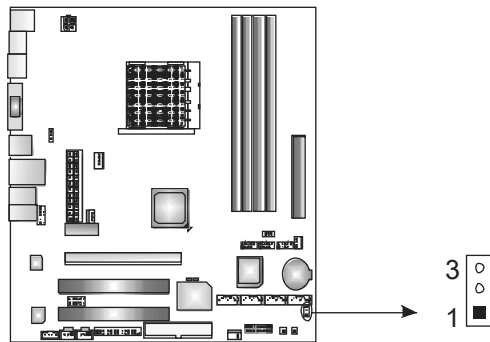
This connector allows user to connect the PCI bracket SPDIF input header.



Pin	Assignment
1	+5V
2	SPDIF_IN
3	Ground

### JCMOS1: Clear CMOS Header

By placing the jumper on pin2-3, it allows user to restore the BIOS safe setting and the CMOS data, please carefully follow the procedures to avoid damaging the motherboard.



**Pin 1-2 Close:**  
Normal Operation  
(default).



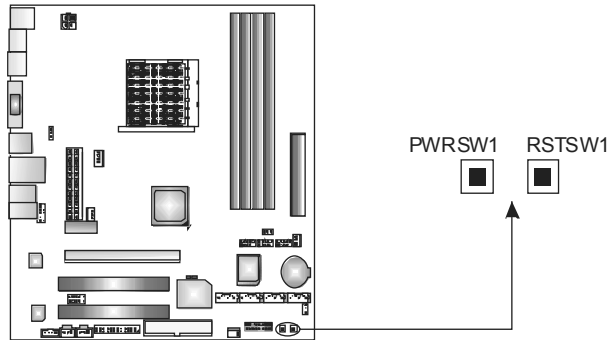
**Pin 2-3 Close:**  
Clear CMOS data.

#### ※ Clear CMOS Procedures:

1. Remove AC power line.
2. Set the jumper to "Pin 2-3 close".
3. Wait for five seconds.
4. Set the jumper to "Pin 1-2 close".
5. Power on the AC.
6. Reset your desired password or clear the CMOS data.

### On-Board Buttons

There are 2 on-board buttons.



**PWRSW1:**

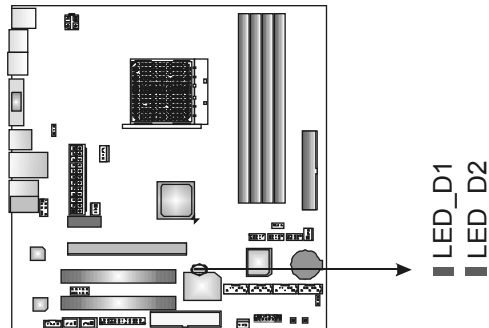
This is an on-board Power Switch button.

**RSTSW1:**

This is an on-board Reset button.

### On-Board LED Indicators

There are 2 LED indicators on the motherboard to show system status.



**LED\_D1 and LED\_D2:**

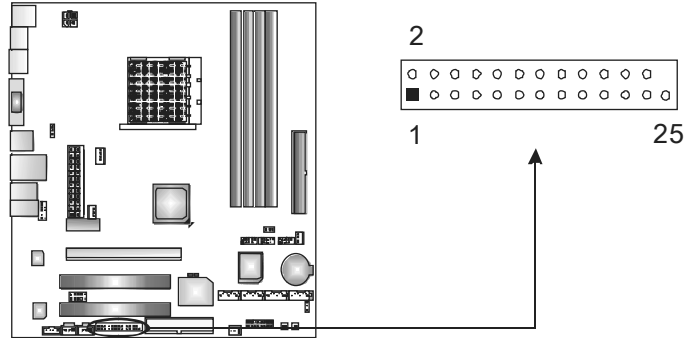
These 2 LED indicate system power on diagnostics.

Please refer to the table below for different messages:

LED_D1	LED_D2	Message
ON	ON	Normal
ON	OFF	Memory Error
OFF	ON	VGA Error
OFF	OFF	Abnormal: CPU / Chipset error.

**JPRNT1: Printer Port Connector**

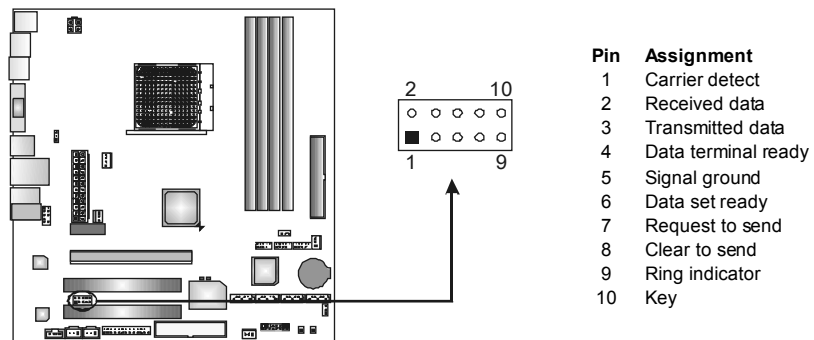
This header allows you to connector printer on the PC.



Pin	Assignment	Pin	Assignment
1	-Strobe	14	Ground
2	-ALF	15	Data 6
3	Data 0	16	Ground
4	-Error	17	Data 7
5	Data 1	18	Ground
6	-Init	19	-ACK
7	Data 2	20	Ground
8	-Sctin	21	Busy
9	Data 3	22	Ground
10	Ground	23	PE
11	Data 4	24	Ground
12	Ground	25	SCLT
13	Data 5	26	Key

**JCOM1: Serial Port Connector**

The motherboard has a Serial Port Connector for connecting RS-232 Port.



Pin	Assignment
1	Carrier detect
2	Received data
3	Transmitted data
4	Data terminal ready
5	Signal ground
6	Data set ready
7	Request to send
8	Clear to send
9	Ring indicator
10	Key



## CHAPTER 4: RAID FUNCTIONS

### 4.1 OPERATION SYSTEM

- Supports Windows XP Home/Professional Edition, and Windows 2000 Professional.

### 4.2 RAID ARRAYS

RAID supports the following types of RAID arrays:

**RAID 0:** RAID 0 defines a disk striping scheme that improves disk read and write times for many applications.

**RAID 1:** RAID 1 defines techniques for mirroring data.

**RAID 0+1:** RAID 0+1 combines the techniques used in RAID 0 and RAID 1.

**RAID 5:** RAID 5 provides fault tolerance and better utilization of disk capacity.

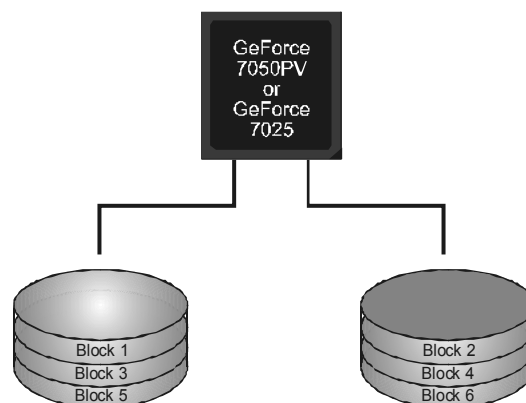
### 4.3 How RAID WORKS

#### **RAID 0:**

The controller “stripes” data across multiple drives in a RAID 0 array system. It breaks up a large file into smaller blocks and performs disk reads and writes across multiple drives in parallel. The size of each block is determined by the stripe size parameter, which you set during the creation of the RAID set based on the system environment. This technique reduces overall disk access time and offers high bandwidth.

#### **Features and Benefits**

- **Drives:** Minimum 1, and maximum is up to 6 or 8. Depending on the platform.
- **Uses:** Intended for non-critical data requiring high data throughput, or any environment that does not require fault tolerance.
- **Benefits:** provides increased data throughput, especially for large files. No capacity loss penalty for parity.
- **Drawbacks:** Does not deliver any fault tolerance. If any drive in the array fails, all data is lost.
- **Fault Tolerance:** No.

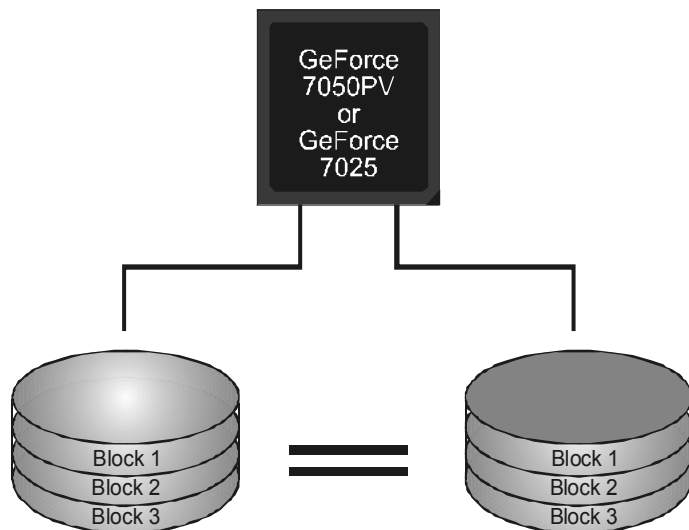


**RAID 1:**

Every read and write is actually carried out in parallel across 2 disk drives in a RAID 1 array system. The mirrored (backup) copy of the data can reside on the same disk or on a second redundant drive in the array. RAID 1 provides a hot-standby copy of data if the active volume or drive is corrupted or becomes unavailable because of a hardware failure. RAID techniques can be applied for high-availability solutions, or as a form of automatic backup that eliminates tedious manual backups to more expensive and less reliable media.

**Features and Benefits**

- **Drives:** Minimum 2, and maximum is 2.
- **Uses:** RAID 1 is ideal for small databases or any other application that requires fault tolerance and minimal capacity.
- **Benefits:** Provides 100% data redundancy. Should one drive fail, the controller switches to the other drive.
- **Drawbacks:** Requires 2 drives for the storage space of one drive. Performance is impaired during drive rebuilds.
- **Fault Tolerance:** Yes.

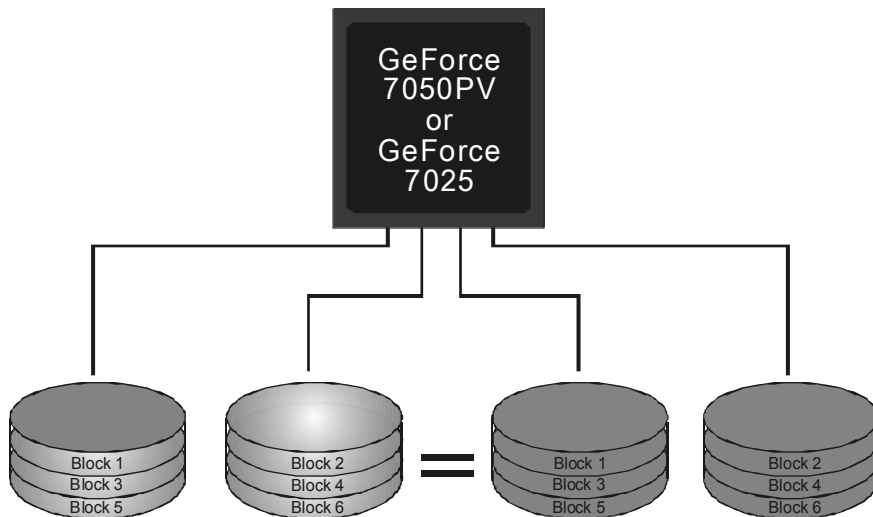


**RAID 0+1:**

RAID 0 drives can be mirrored using RAID 1 techniques. Resulting in a RAID 0+1 solution for improved performance plus resiliency.

**Features and Benefits**

- **Drives:** Minimum 4, and maximum is 6 or 8, depending on the platform.
- **Benefits:** Optimizes for both fault tolerance and performance, allowing for automatic redundancy. May be simultaneously used with other RAID levels in an array, and allows for spare disks.
- **Drawbacks:** Requires twice the available disk space for data redundancy, the same as RAID level 1.
- **Fault Tolerance:** Yes.

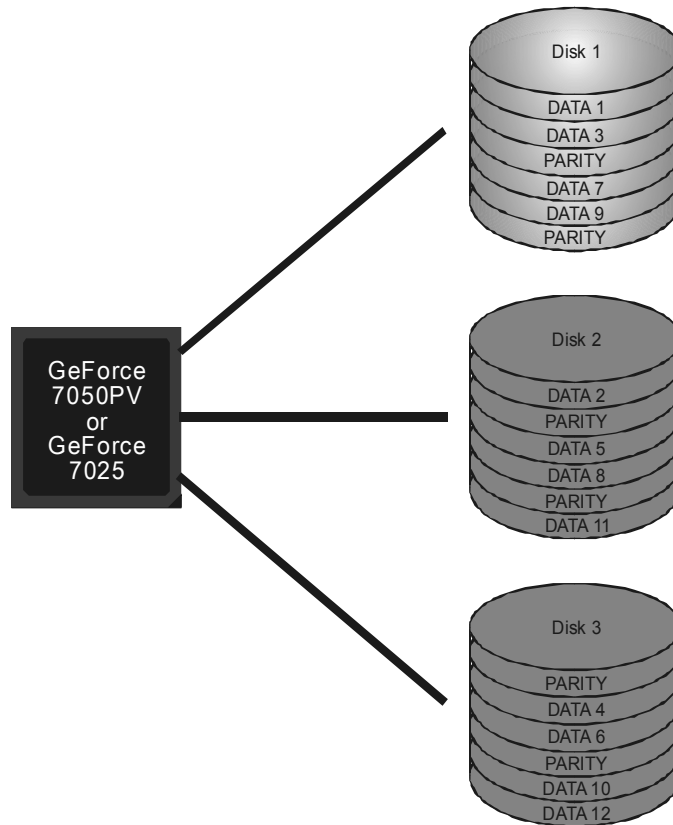


**RAID 5:**

RAID 5 stripes both data and parity information across three or more drives. It writes data and parity blocks across all the drives in the array. Fault tolerance is maintained by ensuring that the parity information for any given block of data is placed on a different drive from those used to store the data itself.

**Features and Benefits**

- **Drives:** Minimum 3.
- **Uses:** RAID 5 is recommended for transaction processing and general purpose service.
- **Benefits:** An ideal combination of good performance, good fault tolerance, and high capacity and storage efficiency.
- **Drawbacks:** Individual block data transfer rate same as a single disk. Write performance can be CPU intensive.
- **Fault Tolerance:** Yes.



※ For more detailed setup information, please refer to the Driver CD, or go to [http://www.nvidia.com/page/pg\\_20011106217193.html](http://www.nvidia.com/page/pg_20011106217193.html) to download NVIDIA nForce Tutorial Flash.

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## **CHAPTER 5: OVERCLOCK QUICK GUIDE**

### **5.1 T-POWER INTRODUCTION**

*Biostar T-Power* is a whole new utility that is designed for overclock users. Based on many precise tests, *Biostar Engineering Team* (BET) has developed this ultimate overclock engine to raise system performance. No matter whether under BIOS or Windows interface, *T-Power* is able to present the best system state according to users' overclock setting.

#### **T-Power BIOS Features:**

- Overclocking Navigator Engine (O.N.E.)
- CMOS Reloading Program (C.R.P.)
- Memory Integration Test (M.I.T., under Overclock Navigator Engine)
- Integrated Flash Program (I.F.P.)
- Smart Fan Function (under PC Health Status)
- Self Recovery System (S.R.S)

#### **T-Power Windows Feature:**

- Hardware Monitor
- Overclock Engine
- Smart Fan Function
- Live Update

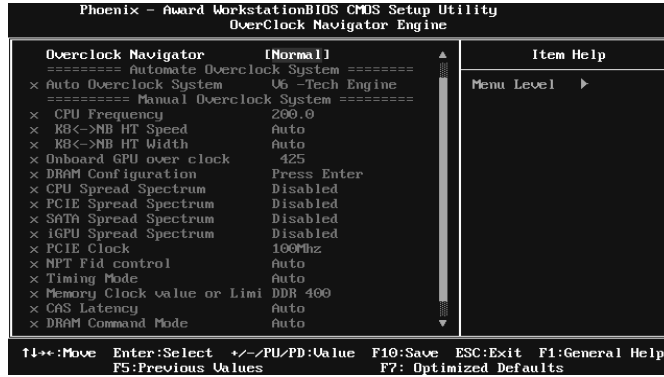
#### **!! WARNING !!**

For better system performance, the BIOS firmware is being continuously updated. The BIOS information described below in this manual is for your reference only and the actual BIOS information and settings on board may be different from this manual. For further information of setting up the BIOS, please refer to the BIOS Manual in the Setup CD.

## 5.2 T-POWER BIOS FEATURE

### A. Overclocking Navigator Engine (O.N.E.):

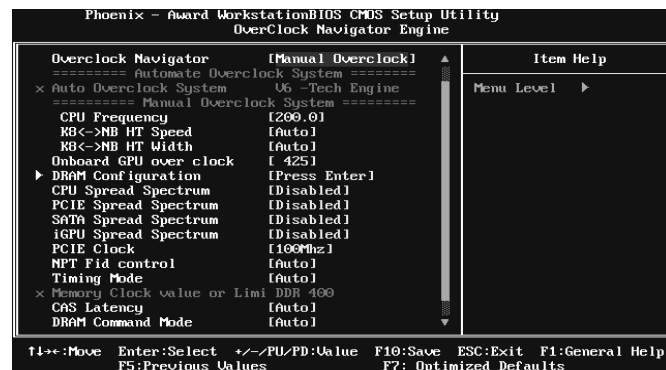
ONE provides two powerful overclocking engines: MOS and AOS for both Elite and Casual overclockers.



### Manual Overclock System (M.O.S.)

MOS is designed for experienced overclock users.

It allows users to customize personal overclock settings.



**CPU Frequency**

CPU Frequency is directly in proportion to system performance. To maintain the system stability, CPU voltage needs to be increased also when raising CPU frequency.

**K8<->NB HT Speed**

This function allows you to choose K8<->NB HT Speed.

**K8<->NB HT Width**

This function allows you to choose K8<->NB HT Width.

**Onboard GPU Overclock**

This function allows you to set the onboard GPU frequency.

**DRAM Configuration**

Enter this item for more advanced DRAM settings.

**CPU Spread Spectrum**

This item allows you to select the CPU Spread Spectrum function.

**PCIE Spread Spectrum**

This item allows you to select the PCIE Spread Spectrum function.

**SATA Spread Spectrum**

This item allows you to select the SATA Spread Spectrum function.

**iGPU Spread Spectrum**

This item allows you to select the iGPU Spread Spectrum function.

**PCIE Clock**

It helps to increase VGA card performance.

**NPT Fid Control**

This function allows you to adjust the frequency ratio of CPU.

**Timing Mode**

This function allows you to choose to manually or automatically regulate the DDR2 timing.

**Memory Clock Value or Limit**

This function allows you to choose the DRAM clock.

**CAS Latency**

The CAS Latency (tCL) is the time (in number of clock cycles) that elapses after the memory controller sends a request to read a memory location and before the data is sent to the module's output pins.

**DRAM Command Mode**

This function allows you to choose the command mode of DRAM.

**CPU Voltage**

This function will increase CPU stability when overclocking. However, the CPU temperature will increase when CPU voltage is increased.

### DDR Voltage

This function will increase memory stability when overclocking.

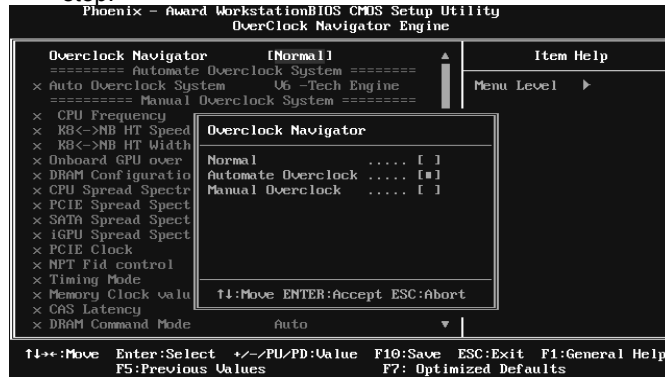
### NB Voltage

This function will increase chipset stability when overclocking.

### Automatic Overclock System (A.O.S.)

For beginners in overclock field, BET had developed an easy, fast, and powerful feature to increase the system performance, named A.O.S.

Based on many tests and experiments, A.O.S. provides 3 ideal overclock configurations that are able to raise the system performance in a single step.



### V6 Tech Engine:

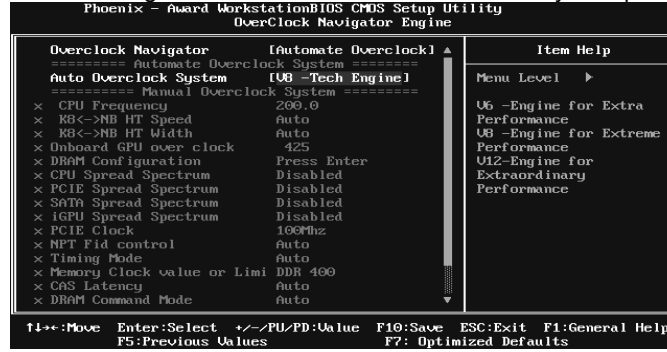
This setting will raise about 10%~15% of whole system performance.





**V8 Tech Engine:**

This setting will raise about 15%~25% of whole system performance.



**V12 Tech Engine:**

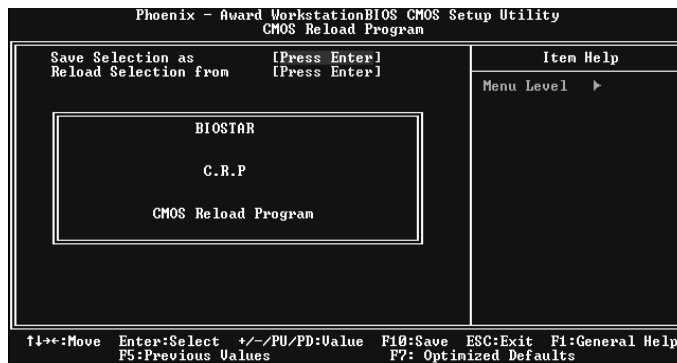
This setting will raise about 25%~30% of whole system performance.



- Notices:**
1. Not all types of AMD CPU perform above overclock setting ideally; the difference will be based on the selected CPU model.
  2. From BET experiments, the Atholon64 FX CPU is not suitable for this A.O.S. feature.

**B. CMOS Reloading Program (C.R.P.):**

It allows users to save different CMOS settings into BIOS-ROM. Users are able to reload any saved CMOS setting for customizing system configurations. Moreover, users are able to save an ideal overclock setting during overclock operation. There are 50 sets of record addresses in total, and users are able to name the CMOS data according to personal preference.



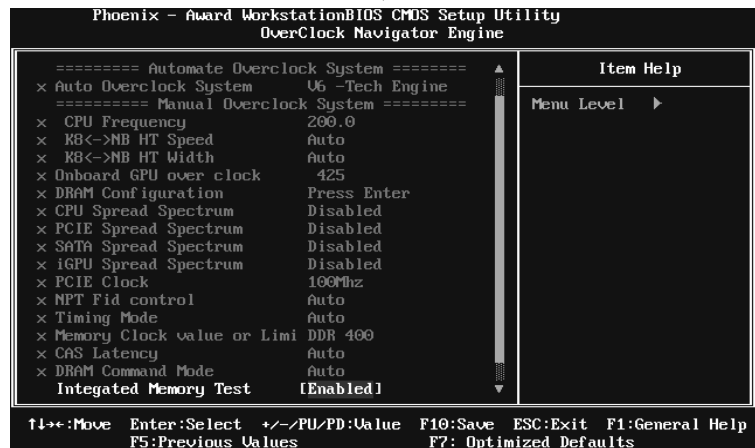
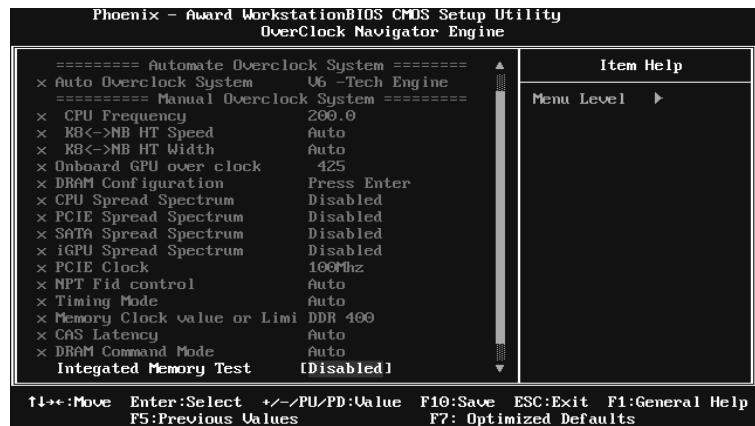
### C. Memory Integration Test (M.I.T.):

This function is under “Overclocking Navigator Engine” item.

MIT allows users to test memory compatibilities, and no extra devices or software are needed.

#### Step 1:

The default setting under this item is “Disabled”; the condition parameter should be changed to “Enable” to proceed this test.



#### Step 2:

Save and Exit from CMOS setup and reboot the system to activate this test.

Run this test for 5 minutes (minimum) to ensure the memory stability.

#### Step 3:

When the process is done, change the setting back from “Enable” to “Disable” to complete the test.

**D. Self Recovery System (S.R.S.):**

This function can't be seen under T-Power BIOS setup; and is always on whenever the system starts up.

However, it can prevent system hang-up due to inappropriate overclock actions.

When the system hangs up, S.R.S. will automatically log in the default BIOS setting, and all overclock settings will be re-configured.

**E. Integrated Flash Program (I.F.P.):**

IFP is a safe and quick way to upgrade BIOS.

**Step 1:**

Go to Biostar website (<http://www.biostar.com.tw>) to download the latest BIOS file. Then, save the file into a floppy disk.

**Step 2:**

Insert the floppy disk and reboot the system to get into CMOS screen.

**Step 3:**

Select the item "Integrated Flash Program" to get the following frame and choose the BIOS file downloaded in step 1.



**Step 4:**

Press "Enter" key to start BIOS file loading, and BIOS updating will process automatically.

**Step 5:**

When the BIOS update is completed, press YES to the message "Flash done, Reset system", and the system will reboot automatically to finish the process.

**Advise:**

You can update the system BIOS by simply pressing "Enter" key for three times.

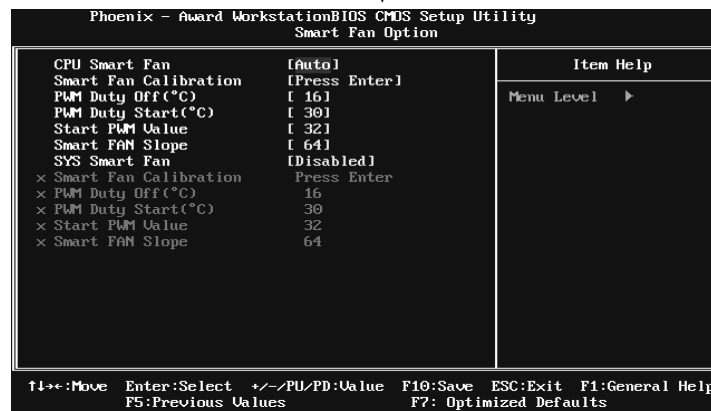
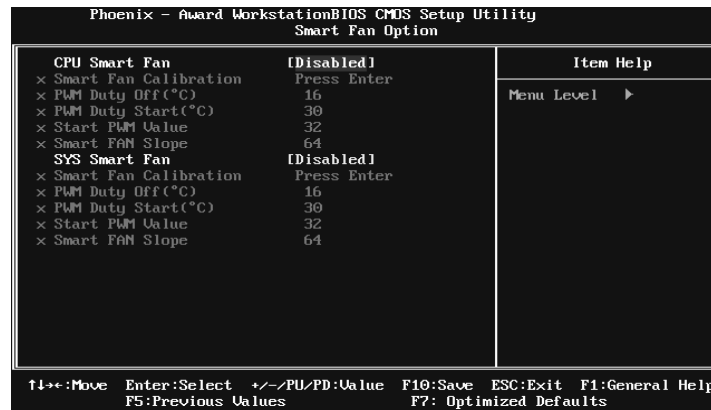
### F. Smart Fan Function:

Smart Fan Function is under “Smart Fan Option” in “PC Health Status”.

This is a brilliant feature to control CPU/System Temperature vs. Fan speed.

When enabling Smart Fan function, Fan speed is controlled automatically by CPU/System temperature.

This function will protect CPU/System from overheat problem and maintain the system temperature at a safe level.



#### Smart Fan Calibration

Choose this item and then the BIOS will automatically test and detect the CPU/System fan functions and show CPU/System fan speed.

#### PWM Duty Off <°C>:

If the CPU/System temperature is lower than the set value, the CPU/System fan will turn off. The range is from 0°C~127°C, with an interval of 1°C.

**PWM Duty Start <°C>**

The CPU/System fan starts to work when CPU/System temperature arrives to this set value. The range is from 0°C~127°C, with an interval of 1°C.

**Start PWM Value**

When CPU/System temperature arrives to the set value, the CPU/System fan will work under Smart Fan Function mode. The range is from 0~127, with an interval of 1.

**Smart Fan Slope**

Increasing the value of slope PWM will raise the speed of CPU/System fan. The range is from 1~127, with an interval of 1.

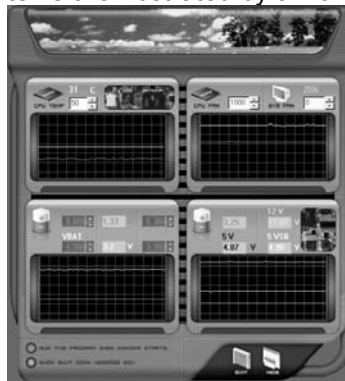
## 5.3 T-POWER WINDOWS FEATURE

### A. Hardware Monitor:

T-Power Hardware monitor allows users to monitor system voltage, temperature and fan speed accordingly.

Additionally, a rescue action will be taken by the program automatically while the system faces an abnormal condition. The program will trigger an alarm or shut down the system when unpredictable errors occur.

All the monitoring items are illustrated by a waveform diagram.



### Hardware Monitor Toolbar



#### i. Start-up Setting

Click on this item to run Hardware Monitor Program when the Windows starts-up.

#### ii. Dialogue-Box Setting

Click on this item to pop-up warning dialogue-box when PC system is abnormal.

#### iii. Exit

Click on this item to exit Hardware Monitor Program.

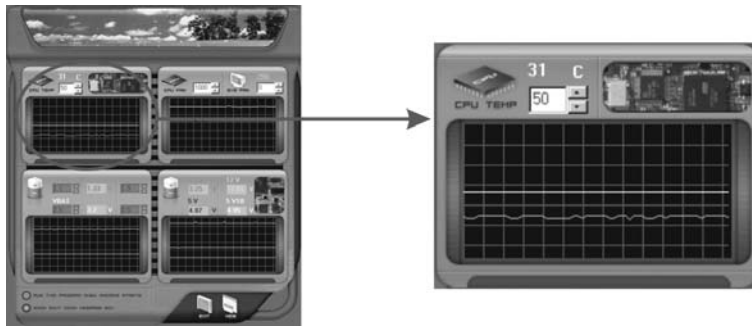
#### iv. Hide


Click on this item to hide this program in system tray. When hiding the program, there will be a check icon in the system tray.





### CPU Temperature

This column configures the CPU temperature. There is a waveform to represent the status of CPU temperature.

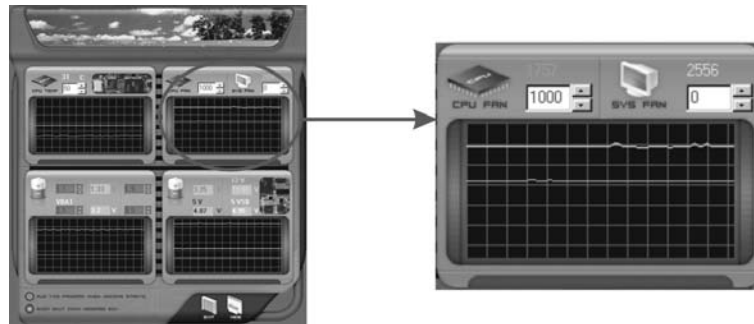



By adjusting , users can easily configure the upper limit of CPU temperature for system operating.

In this diagram, the white line represents the upper limit which user-set for CPU temperature and the green line shows present CPU temperature.



If the CPU temperature is higher than the upper limit, the status line color will change from green to red, and a warning sound will alert you. Also, the system tray icon  would change to .

### FAN Speed



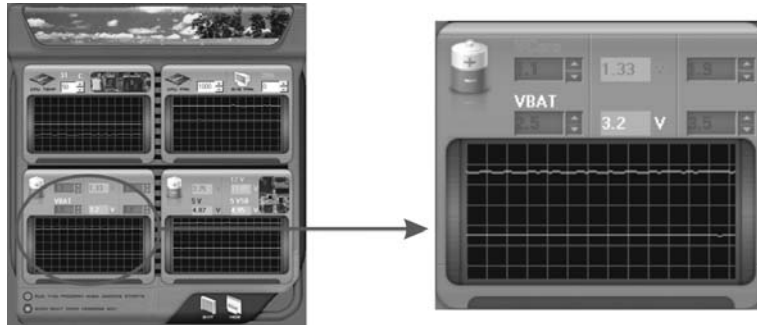
By adjusting , users can easily configure the lower limit of the fan speed.

In this diagram, the green line shows present CPU Fan speed, and the yellow line shows System Fan speed (if any).

If any one of the fans speeds is lower than the set value, the status line will change into a red warning line, and the program will trigger an alarm system automatically. Also, the system tray icon  would change to .






## CPU/Battery Voltage



### i. VCore


This item displays the CPU voltage, represented by a light blue line.



Users can set the upper and lower limit by adjusting  to monitor the CPU operating voltage.

If CPU voltage is higher or lower than the set value, the status line will change into a red warning line, and a warning sound will alert you. Also, the system tray icon  will change to .

### ii. VBAT

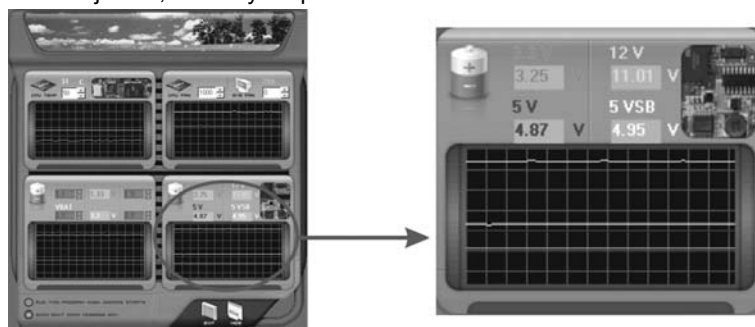
This item displays the CMOS battery voltage, represented by a light green line.

Users can set the upper and lower limit by adjusting  to monitor the status of battery voltage.

If battery voltage is higher or lower than the set value, the status line will change to a red warning line, and a warning sound will alert you. Also, the system tray icon  will change to .

## Reference data

This column represents the status of power supply voltage and cannot be adjusted, it is only for present status reference.



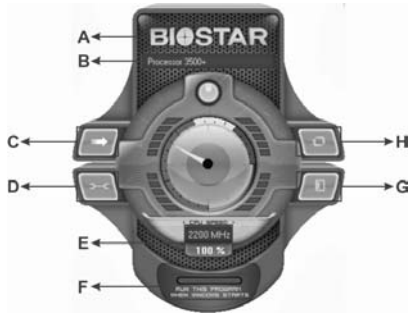
## B. Overclocking Configurations

This diagram is designed for T-series Overclocking utility. Friendly interface and solid overclock features are the major concept of this utility.

Graphic 1 will appear when activating this utility.



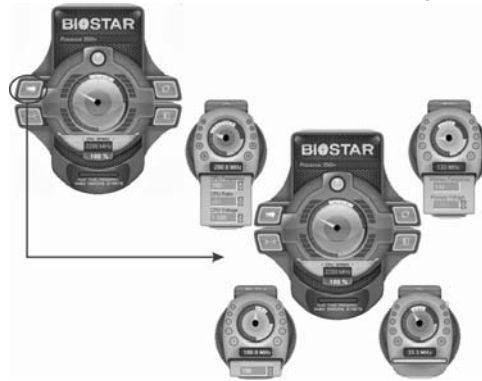
Graphic 1



Graphic 2


- A. Clicking on "Biostar" will lead you to the Biostar Homepage.
- B. This column shows the CPU speed information.
- C. Click on this button and the utility will pop-up 4 sub-screens (Please refers to Graphic 3).
- D. Click on this button to minimize this program to taskbar.
- E. This column shows present CPU speed and overclocking percentage.
- F. Clicking on this button will make the program start up as soon as the Windows starts up.
- G. Click on this button to exit this overclock utility.
- H. Click on this button to reset all the overclock features to default setting.

By adjusting the overclocking features in 4 sub-screens, users can tune the system performance to an optimal level.



Graphic 3

**CPU Overclocking Settings:**

By adjusting  can configure three items for CPU overclocking.

**A. CPU Frequency**

Range: 200MHz~450MHz.

Interval: 1MHz.

**B. CPU Ratio**

Range: 4~25.


Interval: 1.

**C. CPU Voltage**

Range: 0.8V~2.0V.

Interval: 0.0125V.

**Memory Overclocking Settings:**

By adjusting  can configure two items for Memory overclocking.

**A. Memory Clock Frequency**


Choices: 100, 133, 200, 266, 333, 400, 533, 667, 800.

**B. Memory Voltage**

Range: 1.8V~2.8V.

Interval: 0.1V.

**AGP/PCI-Express Overclocking Setting:**

By adjusting  can configure VGA card overclocking. And this function helps to increase VGA card performance.

Range: 100MHz~150MHz.

Interval: 1MHz.

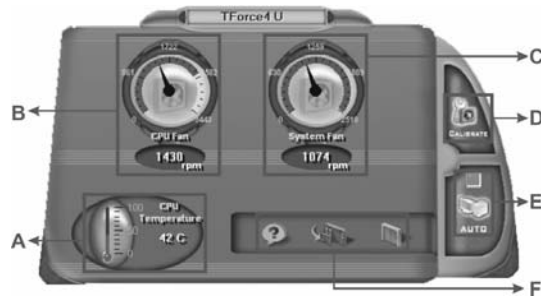
**PCI Overclocking Setting:**



This diagram shows present PCI working status and helps to monitor PCI peripherals working status.

This item cannot be adjusted.

### C. Smart Fan Function



When Smart Fan Function is activated, screens will pop-up to illustrate the fan speed information.

**i. CPU Temperature:**

Show current CPU temperature.

**ii. CPU Fan speed:**

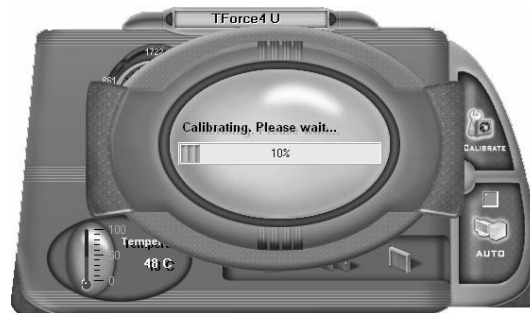
Show current CPU Fan speed.

**iii. System Fan speed:**

Show current system Fan speed.

**iv. Calibrate:**

When changing CPU Fan or System Fan, click on this button to re-calibrate the Fan speed.



**Note:**

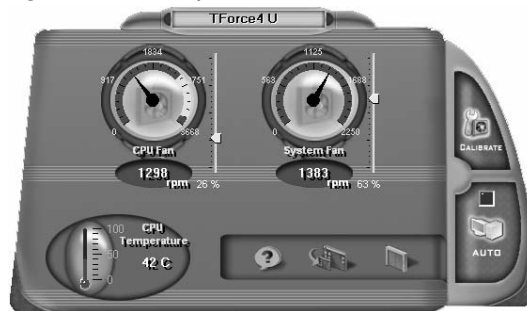
1. When Smart Fan Function activates for the first time, this calibrate function would auto-run to get upper and lower limitation of CPU Fan and System Fan.
2. When calibrating process is done, the calibrating window will auto-close, and the main screen will show new fan speed data.

v. **Auto:**




If the green indicator is lit up, the Smart Fan Function is “On” (Default Setting).

Click on this button again to close Smart Fan Function, and a screen as below would pop-up.

There will be pulling-meter besides the CPU Fan and System Fan, the CPU Fan and the System Fan speed can be adjusted by adjusting the Cursor Up or Down.



vi. **Program Tool Bar:**

-  **About:**  
Click on this button to get program-related information.
-  **Minimize:**  
Click on this button to minimize the program to system tray
-  **Exit:**  
Click on this button to exit this program.

### D. Live Update



When Live Update program is activated, a screen will pop up to illustrate BIOS related information.

**i. Link to Internet:**

Click on this button will link to Biostar website and BIOS file will be downloaded.

**ii. Update BIOS:**

Click on this button to run BIOS flashing process, and it's easy and safe.

**iii. Backup BIOS:**

Click on this button, and BIOS file will be saved into the user-selected folder.

**iv. Clear CMOS:**

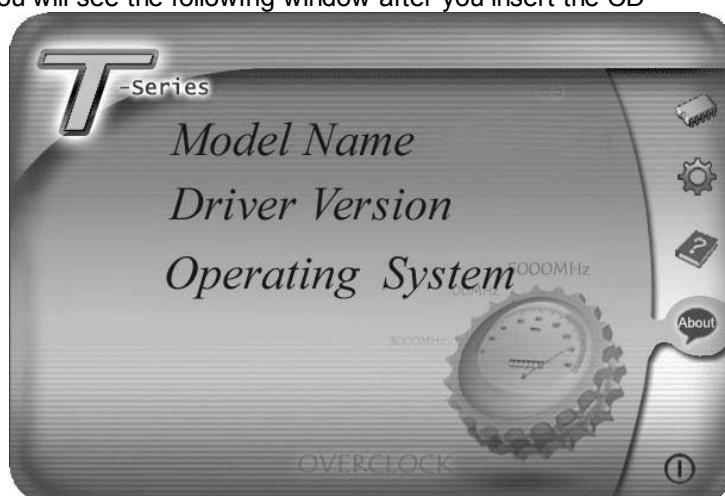
Click on this item will clear the CMOS Data. When carrying this job, the previous CMOS data would be cleared and returned to default setting.

## CHAPTER 6: USEFUL HELP

### 6.1 DRIVER INSTALLATION NOTE

After you installed your operating system, please insert the Fully Setup Driver CD into your optical drive and install the driver for better system performance.

You will see the following window after you insert the CD



The setup guide will auto detect your motherboard and operating system.

**Note:**

If this window didn't show up after you insert the Driver CD, please use file browser to locate and execute the file **SETUP.EXE** under your optical drive.

#### A. Driver Installation

To install the driver, please click on the Driver icon. The setup guide will list the compatible driver for your motherboard and operating system. Click on each device driver to launch the installation program.

#### B. Software Installation

To install the software, please click on the Software icon. The setup guide will list the software available for your system, click on each software title to launch the installation program.

#### C. Manual

Aside from the paperback manual, we also provide manual in the Driver CD. Click on the Manual icon to browse for available manual.

**Note:**

You will need Acrobat Reader to open the manual file. Please download the latest version of Acrobat Reader software from <http://www.adobe.com/products/acrobat/readstep2.html>



## 6.2 AWARD BIOS BEEP CODE

Beep Sound	Meaning
One long beep followed by two short beeps	Video card not found or video card memory bad
High-low siren sound	CPU overheated System will shut down automatically
One Short beep when system boot-up	No error found during POST
Long beeps every other second	No DRAM detected or install

## 6.3 EXTRA INFORMATION

### ***CPU Overheated***

If the system shutdown automatically after power on system for seconds, that means the CPU protection function has been activated.

When the CPU is over heated, the motherboard will shutdown automatically to avoid a damage of the CPU, and the system may not power on again.

In this case, please double check:

1. The CPU cooler surface is placed evenly with the CPU surface.
2. CPU fan is rotated normally.
3. CPU fan speed is fulfilling with the CPU speed.

After confirmed, please follow steps below to relief the CPU protection function.

1. Remove the power cord from power supply for seconds.
2. Wait for seconds.
3. Plug in the power cord and boot up the system.

Or you can:

1. Clear the CMOS data.  
(See "Close CMOS Header: JCMOS1" section)
2. Wait for seconds.
3. Power on the system again.

## 6.4 TROUBLESHOOTING

Probable	Solution
<ol style="list-style-type: none"> <li>1. No power to the system at all. Power light don't illuminate, fan inside power supply does not turn on.</li> <li>2. Indicator light on keyboard does not turn on.</li> </ol>	<ol style="list-style-type: none"> <li>1. Make sure power cable is securely plugged in.</li> <li>2. Replace cable.</li> <li>3. Contact technical support.</li> </ol>
<p>System inoperative. Keyboard lights are on, power indicator lights are lit, and hard drive is spinning.</p>	<p>Using even pressure on both ends of the DIMM, press down firmly until the module snaps into place.</p>
<p>System does not boot from hard disk drive, can be booted from optical drive.</p>	<ol style="list-style-type: none"> <li>1. Check cable running from disk to disk controller board. Make sure both ends are securely plugged in; check the drive type in the standard CMOS setup.</li> <li>2. Backing up the hard drive is extremely important. All hard disks are capable of breaking down at any time.</li> </ol>
<p>System only boots from optical drive. Hard disk can be read and applications can be used but booting from hard disk is impossible.</p>	<ol style="list-style-type: none"> <li>1. Back up data and applications files.</li> <li>2. Reformat the hard drive. Re-install applications and data using backup disks.</li> </ol>
<p>Screen message says "Invalid Configuration" or "CMOS Failure."</p>	<p>Review system's equipment. Make sure correct information is in setup.</p>
<p>Cannot boot system after installing second hard drive.</p>	<ol style="list-style-type: none"> <li>1. Set master/slave jumpers correctly.</li> <li>2. Run SETUP program and select correct drive types. Call the drive manufacturers for compatibility with other drives.</li> </ol>

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**APPENDENCIES: SPEC IN OTHER LANGUAGE**

**GERMAN**

	<i>TF7050-M2</i>	<i>TF7025-M2</i>
CPU	<p>Socket AM2                      AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron Prozessoren                      Die AMD 64-Architektur unterstützt eine 32-Bit- und 64-Bit-Datenverarbeitung                      Unterstützt Hyper Transport und Cool'n'Quiet</p>	<p>Socket AM2                      AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2/ Sempron Prozessoren                      Die AMD 64-Architektur unterstützt eine 32-Bit- und 64-Bit-Datenverarbeitung                      Unterstützt Hyper Transport und Cool'n'Quiet</p>
FSB	<p>Unterstützt HyperTransport mit einer Bandbreite von bis zu 1 GHz</p>	<p>Unterstützt HyperTransport mit einer Bandbreite von bis zu 1 GHz</p>
Chipsatz	<p>GeForce 7050PV/NF630a</p>	<p>GeForce 7025/NF630a</p>
Super E/A	<p>ITE 8716F                      Bietet die häufig verwendeten alten Super E/A-Funktionen.                      Low Pin Count-Schnittstelle                      Umgebungskontrolle,                      Hardware-Überwachung                      Lüfterdrehzahl-Controller                      "Smart Guardian"-Funktion von ITE</p>	<p>ITE 8716F                      Bietet die häufig verwendeten alten Super E/A-Funktionen.                      Low Pin Count-Schnittstelle                      Umgebungskontrolle,                      Hardware-Überwachung                      Lüfterdrehzahl-Controller                      "Smart Guardian"-Funktion von ITE</p>
Arbeitsspeicher	<p>DDR2 DIMM-Steckplätze x 4                      Max. 8GB Arbeitsspeicher                      Jeder DIMM unterstützt 256/512MB/1GB/2GB DDR2.                      Dual-Kanal DDR2 Speichermodul                      Unterstützt DDR2 400 / 533 / 667 / 800 registrierte DIMMs. ECC DIMMs werden nicht unterstützt.</p>	<p>DDR2 DIMM-Steckplätze x 4                      Max. 8GB Arbeitsspeicher                      Jeder DIMM unterstützt 256/512MB/1GB/2GB DDR2.                      Dual-Kanal DDR2 Speichermodul                      Unterstützt DDR2 400 / 533 / 667 / 800 registrierte DIMMs. ECC DIMMs werden nicht unterstützt.</p>
Grafik	<p>Integrierter GeForce 7050PV/NF630a-Chipsatz                      Max. 256MB gemeinsam benutzter Videospeicher</p>	<p>Integrierter GeForce 7025/NF630a-Chipsatz                      Max. 256MB gemeinsam benutzter Videospeicher</p>
IDE	<p>Integrierter IDE-Controller                      Ultra DMA 33 / 66 / 100 / 133 Bus                      Master-Modus                      Unterstützt PIO-Modus 0~4,</p>	<p>Integrierter IDE-Controller                      Ultra DMA 33 / 66 / 100 / 133 Bus                      Master-Modus                      Unterstützt PIO-Modus 0~4,</p>
SATA II	<p>Integrierter Serial ATA-Controller                      Datentransferrate bis zu 3Gb/s                      Konform mit der SATA-Spezifikation Version 2.0.</p>	<p>Integrierter Serial ATA-Controller                      Datentransferrate bis zu 3Gb/s                      Konform mit der SATA-Spezifikation Version 2.0.</p>
LAN	<p>Realtek RTL 8111B / 8101E (optional)                      10 / 100 / 1000 Mb/s Auto-Negotiation                      (Gigabit-Bandbreite nur beim RTL 8111B )                      Halb-/ Vollduplex-Funktion</p>	<p>Realtek RTL 8111B / 8101E (optional)                      10 / 100 / 1000 Mb/s Auto-Negotiation                      (Gigabit-Bandbreite nur beim RTL 8111B )                      Halb-/ Vollduplex-Funktion</p>

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Audio-Codec	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1-Kanal-Audioausgabe (Ver 5.x) / 5.1-Kanal-Audioausgabe (Ver 6.x) Unterstützt High-Definition Audio 2-Kanal-Audioausgabe (HDMI Audio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1-Kanal-Audioausgabe (Ver 5.x) 5.1-Kanal-Audioausgabe (Ver 6.x) Unterstützt High-Definition Audio
Steckplätze	PCI-Steckplatz x2 PCI Express x16 Steckplatz x1 PCI Express x 1-Steckplatz x1	PCI-Steckplatz x2 PCI Express x16 Steckplatz x1 PCI Express x 1-Steckplatz x1
Onboard-Anschluss	Diskettenlaufwerkanschluss x1 Druckeranschluss Anschluss x1 IDE-Anschluss x1 SATA-Anschluss x4 Fronttafelanschluss x1 Front-Audioanschluss x1 CD-IN-Anschluss x1 S/PDIF- Ausgangsanschluss x1 S/PDIF Eingangsanschluss (optional) x1 CPU-Lüfter-Sockel x1 System-Lüfter-Sockel x3 "CMOS löschen"-Sockel x1 USB-Anschluss x3 Serieller Anschluss x1 Stromanschluss (24-polig) x1 Stromanschluss (4-polig) x1	Diskettenlaufwerkanschluss x1 Druckeranschluss Anschluss x1 IDE-Anschluss x1 SATA-Anschluss x4 Fronttafelanschluss x1 Front-Audioanschluss x1 CD-IN-Anschluss x1 S/PDIF- Ausgangsanschluss x1 S/PDIF Eingangsanschluss (optional) x1 CPU-Lüfter-Sockel x1 System-Lüfter-Sockel x3 "CMOS löschen"-Sockel x1 USB-Anschluss x3 Serieller Anschluss x1 Stromanschluss (24-polig) x1 Stromanschluss (4-polig) x1
Rückseiten-E/A	PS/2-Tastatur x1 PS/2-Maus x1 S-Video-Anschluss x1 HDMI-Anschluss x1 VGA-Anschluss x1 LAN-Anschluss x1 USB-Anschluss x4 Audioanschluss (Ver 5.x) x6 Audioanschluss (Ver 6.x) x3	PS/2-Tastatur x1 PS/2-Maus x1 VGA-Anschluss x1 DVI-D-Anschluss x1 LAN-Anschluss x1 USB-Anschluss x4 Audioanschluss (Ver 5.x) x6 Audioanschluss (Ver 6.x) x3
Platinengröße	235 mm (B) X 244 mm (L)	235 mm (B) X 244 mm (L)
Sonderfunktionen	Unterstützt RAID 0 / 1 / 5 / 0+1	Unterstützt RAID 0 / 1 / 5 / 0+1
OS-Unterstützung	Windows 2000 / XP / VISTA Biostar behält sich das Recht vor, ohne Ankündigung die Unterstützung für ein Betriebssystem hinzuzufügen oder zu entfernen.	Windows 2000 / XP / VISTA Biostar behält sich das Recht vor, ohne Ankündigung die Unterstützung für ein Betriebssystem hinzuzufügen oder zu entfernen.

**FRANCE**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
UC	Socket AM2 Processeurs AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron L'architecture AMD 64 permet le calcul 32 et 64 bits Prend en charge Hyper Transport et Cool'n'Quiet	Socket AM2 Processeurs AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron L'architecture AMD 64 permet le calcul 32 et 64 bits Prend en charge Hyper Transport et Cool'n'Quiet
Bus frontal	Prend en charge Hyper Transport jusqu'à une bande passante de 1 GHz	Prend en charge Hyper Transport jusqu'à une bande passante de 1 GHz
Chipset	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Super E/S	ITE 8716F Fournit la fonctionnalité de Super E/S patrimoniales la plus utilisée. Interface à faible compte de broches Initiatives de contrôle environnementales, Moniteur de matériel Contrôleur de vitesse de ventilateur Fonction "Gardien intelligent" de l'ITE	ITE 8716F Fournit la fonctionnalité de Super E/S patrimoniales la plus utilisée. Interface à faible compte de broches Initiatives de contrôle environnementales, Moniteur de matériel Contrôleur de vitesse de ventilateur Fonction "Gardien intelligent" de l'ITE
Mémoire principale	Fentes DDR2 DIMM x 4 Capacité mémoire maximale de 8 Go Chaque DIMM prend en charge des DDR2 de 256/512 Mo et 1Go/2Go Module de mémoire DDR2 à mode à double voie Prend en charge la DDR2 400 / 533 / 667 / 800 Les DIMM à registres et DIMM avec code correcteurs d'erreurs ne sont pas prises en charge	Fentes DDR2 DIMM x 4 Capacité mémoire maximale de 8 Go Chaque DIMM prend en charge des DDR2 de 256/512 Mo et 1Go/2Go Module de mémoire DDR2 à mode à double voie Prend en charge la DDR2 400 / 533 / 667 / 800 Les DIMM à registres et DIMM avec code correcteurs d'erreurs ne sont pas prises en charge
Graphiques	Intégré dans la chipset GeForce 7050PV/NF630a Mémoire vidéo partagée maximale de 256 Mo	Intégré dans la chipset GeForce 7025/NF630a Mémoire vidéo partagée maximale de 256 Mo
IDE	Contrôleur IDE intégré Mode principale de Bus Ultra DMA 33 / 66 / 100 / 133 Prend en charge le mode PIO 0~4,	Contrôleur IDE intégré Mode principale de Bus Ultra DMA 33 / 66 / 100 / 133 Prend en charge le mode PIO 0~4,
SATA II	Contrôleur Serial ATA intégré : Taux de transfert jusqu'à 3 Go/s. Conforme à la spécification SATA Version 2.0	Contrôleur Serial ATA intégré : Taux de transfert jusqu'à 3 Go/s. Conforme à la spécification SATA Version 2.0
LAN	Realtek RTL 8111B / 8101E (optional) 10 / 100 / 1000 Mb/s négociation automatique (La bande passante Gigabit est pour le RTL 8111B uniquement) Half / Full duplex capability	Realtek RTL 8111B / 8101E (optional) 10 / 100 / 1000 Mb/s négociation automatique (La bande passante Gigabit est pour le RTL 8111B uniquement) Half / Full duplex capability

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Codec audio	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Sortie audio à 7.1 voies (Ver 5.x) / Sortie audio à 5.1 voies (Ver 6.x) Prise en charge de l'audio haute definition Sortie audio à 2 voies (HDMI audio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Sortie audio à 7.1 voies (Ver 5.x) / Sortie audio à 5.1 voies (Ver 6.x) Prise en charge de l'audio haute definition
Fentes	Fente PCI x2 Slot PCI Express x16 x1 Slot PCI Express x 1 x1	Fente PCI x2 Slot PCI Express x16 x1 Slot PCI Express x 1 x1
Connecteur embarqué	Connecteur de disquette x1 Connecteur de Port d'imprimante x1 Connecteur IDE x1 Connecteur SATA x4 Connecteur du panneau avant x1 Connecteur Audio du panneau avant x1 Connecteur d'entrée CD x1 Connecteur de sortie S/PDIF x1 Connecteur d'entrée S/PDIF x1 (en option) Embase de ventilateur UC x1 Embase de ventilateur système x3 Embase d'effacement CMOS x1 Connecteur USB x3 Connecteur de Port série x1 Connecteur d'alimentation x1 (24 broches) Connecteur d'alimentation x1 (4 broches)	Connecteur de disquette x1 Connecteur de Port d'imprimante x1 Connecteur IDE x1 Connecteur SATA x4 Connecteur du panneau avant x1 Connecteur Audio du panneau avant x1 Connecteur d'entrée CD x1 Connecteur de sortie S/PDIF x1 Connecteur d'entrée S/PDIF x1 (en option) Embase de ventilateur UC x1 Embase de ventilateur système x3 Embase d'effacement CMOS x1 Connecteur USB x3 Connecteur de Port série x1 Connecteur d'alimentation x1 (24 broches) Connecteur d'alimentation x1 (4 broches)
E/S du panneau arrière	Clavier PS/2 x1 Souris PS/2 x1 Port S-Video x1 Port HDMI x1 Port VGA x1 Port LAN x1 Port USB x4 Fiche audio (Ver 5.x) x6 Fiche audio (Ver 6.x) x3	Clavier PS/2 x1 Souris PS/2 x1 Port VGA x1 Port DVI-D x1 Port LAN x1 Port USB x4 Fiche audio (Ver 5.x) x6 Fiche audio (Ver 6.x) x3
Dimensions de la carte	235 mm (l) X 244 mm (H)	235 mm (l) X 244 mm (H)
Fonctionnalités spéciales	Prise en charge RAID 0 / 1 / 5 / 0+1	Prise en charge RAID 0 / 1 / 5 / 0+1
Support SE	Windows 2000 / XP / VISTA Biostar se réserve le droit d'ajouter ou de supprimer le support de SE avec ou sans préavis.	Windows 2000 / XP / VISTA Biostar se réserve le droit d'ajouter ou de supprimer le support de SE avec ou sans préavis.

**ITALIAN**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
CPU	Socket AM2 Processori AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron L'architettura AMD 64 abilita la computazione 32 e 64 bit Supporto di Hyper Transport e Cool'n'Quiet	Socket AM2 Processori AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2/ Sempron L'architettura AMD 64 abilita la computazione 32 e 64 bit Supporto di Hyper Transport e Cool'n'Quiet
FSB	Supporto di HyperTransport fino a 1 GHz di larghezza di banda	Supporto di HyperTransport fino a 1 GHz di larghezza di banda
Chipset	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Super I/O	ITE 8716F Fornisce le funzionalità legacy Super I/O usate più comunemente. Interfaccia LPC (Low Pin Count) Funzioni di controllo dell'ambiente: Monitoraggio hardware Controller velocità ventolina Funzione "Smart Guardian" di ITE	ITE 8716F Fornisce le funzionalità legacy Super I/O usate più comunemente. Interfaccia LPC (Low Pin Count) Funzioni di controllo dell'ambiente: Monitoraggio hardware Controller velocità ventolina Funzione "Smart Guardian" di ITE
Memoria principale	Alloggi DIMM DDR2 x 4 Capacità massima della memoria 8GB Ciascun DIMM supporta DDR2 256/512MB e 1GB/2GB Modulo di memoria DDR2 a canale doppio Supporto di DDR2 400 / 533 / 667 / 800 DIMM registrati e DIMM ECC non sono supportati	Alloggi DIMM DDR2 x 4 Capacità massima della memoria 8GB Ciascun DIMM supporta DDR2 256/512MB e 1GB/2GB Modulo di memoria DDR2 a canale doppio Supporto di DDR2 400 / 533 / 667 / 800 DIMM registrati e DIMM ECC non sono supportati
Grafica	Integrata nel Chipset GeForce 7050PV/NF630a La memoria video condivisa massima è di 256MB	Integrata nel Chipset GeForce 7025/NF630a La memoria video condivisa massima è di 256MB
IDE	Controller IDE integrato Modalità Bus Master Ultra DMA 33 / 66 / 100 / 133 Supporto modalità PIO Mode 0-4	Controller IDE integrato Modalità Bus Master Ultra DMA 33 / 66 / 100 / 133 Supporto modalità PIO Mode 0-4
SATA II	Controller Serial ATA integrato Velocità di trasferimento dei dati fino a 3 Gb/s. Compatibile specifiche SATA Versione 2.0.	Controller Serial ATA integrato Velocità di trasferimento dei dati fino a 3 Gb/s. Compatibile specifiche SATA Versione 2.0.
LAN	Realtek RTL 8111B / 8101E (optional) Negoziazione automatica 10 / 100 / 1000 Mb/s (la larghezza di banda Gigabit è solo per RTL 8111B ) Capacità Half / Full Duplex	Realtek RTL 8111B / 8101E (optional) Negoziazione automatica 10 / 100 / 1000 Mb/s (la larghezza di banda Gigabit è solo per RTL 8111B ) Capacità Half / Full Duplex



**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Codec audio	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Uscita audio 7.1 canali (Ver 5.x) / Uscita audio 5.1 canali (Ver 6.x) Supporto audio High-Definition (HD) Uscita audio 2 canali (HDMI audio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Uscita audio 7.1 canali (Ver 5.x) / Uscita audio 5.1 canali (Ver 6.x) Supporto audio High-Definition (HD)
Alloggi	Alloggio PCI x2 Alloggio PCI Express x16 x1 Alloggio PCI Express x1 x1	Alloggio PCI x2 Alloggio PCI Express x16 x1 Alloggio PCI Express x1 x1
Connettori su scheda	Connettore floppy x1 Connettore Porta stampante x1 Connettore IDE x1 Connettore SATA x4 Connettore pannello frontale x1 Connettore audio frontale x1 Connettore CD-in x1 Connettore output SPDIF x1 Connettore input S/PDIF x1 (optional) Collettore ventolina CPU x1 Collettore ventolina sistema x3 Collettore cancellazione CMOS x1 Connettore USB x3 Connettore Porta seriale x1 Connettore alimentazione (24 pin) x1 Connettore alimentazione (4 pin) x1	Connettore floppy x1 Connettore Porta stampante x1 Connettore IDE x1 Connettore SATA x4 Connettore pannello frontale x1 Connettore audio frontale x1 Connettore CD-in x1 Connettore output SPDIF x1 Connettore input S/PDIF x1 (optional) Collettore ventolina CPU x1 Collettore ventolina sistema x3 Collettore cancellazione CMOS x1 Connettore USB x3 Connettore Porta seriale x1 Connettore alimentazione (24 pin) x1 Connettore alimentazione (4 pin) x1
I/O pannello posteriore	Tastiera PS/2 x1 Mouse PS/2 x1 Porta S-Video x1 Porta HDMI x1 Porta VGA x1 Porta LAN x1 Porta USB x4 Connettore audio (Ver 5.x) x6 Connettore audio (Ver 6.x) x3	Tastiera PS/2 x1 Mouse PS/2 x1 Porta VGA x1 Porta DVI-D x1 Porta LAN x1 Porta USB x4 Connettore audio (Ver 5.x) x6 Connettore audio (Ver 6.x) x3
Dimensioni scheda	235 mm (larghezza) x 244 mm (altezza)	235 mm (larghezza) x 244 mm (altezza)
Caratteristiche speciali	Supporto RAID 0 / 1 / 5 / 0+1	Supporto RAID 0 / 1 / 5 / 0+1
Sistemi operativi supportati	Windows 2000 / XP / VISTA Biostar si riserva il diritto di aggiungere o rimuovere il supporto di qualsiasi sistema operativo senza preavviso.	Windows 2000 / XP / VISTA Biostar si riserva il diritto di aggiungere o rimuovere il supporto di qualsiasi sistema operativo senza preavviso.

**SPANISH**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
CPU	<p>Conector AM2</p> <p>Procesadores AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron</p> <p>La arquitectura AMD 64 permite el procesado de 32 y 64 bits</p> <p>Soporta las tecnologías Hyper Transport y Cool'n'Quiet</p>	<p>Conector AM2</p> <p>Procesadores AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2/ Sempron</p> <p>La arquitectura AMD 64 permite el procesado de 32 y 64 bits</p> <p>Soporta las tecnologías Hyper Transport y Cool'n'Quiet</p>
FSB	Admite HyperTransport con un ancho de banda de hasta 1 GHz	Admite HyperTransport con un ancho de banda de hasta 1 GHz
Conjunto de chips	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Súper E/S	<p>ITE 8716F</p> <p>Le ofrece las funcionalidades heredadas de uso más común Súper E/S.</p> <p>Interfaz de cuenta Low Pin</p> <p>Iniciativas de control de entorno, Monitor hardware</p> <p>Controlador de velocidad de ventilador</p> <p>Función "Guardia inteligente" de ITE</p>	<p>ITE 8716F</p> <p>Le ofrece las funcionalidades heredadas de uso más común Súper E/S.</p> <p>Interfaz de cuenta Low Pin</p> <p>Iniciativas de control de entorno, Monitor hardware</p> <p>Controlador de velocidad de ventilador</p> <p>Función "Guardia inteligente" de ITE</p>
Memoria principal	<p>Ranuras DIMM DDR2 x 4</p> <p>Capacidad máxima de memoria de 8GB</p> <p>Cada DIMM admite DDR de 256/512MB/1GB/2GB</p> <p>Módulo de memoria DDR2 de canal Doble</p> <p>Admite DDR2 de 400 / 533 / 667 / 800</p> <p>No admite DIMM registrados o DIMM compatibles con ECC</p>	<p>Ranuras DIMM DDR2 x 4</p> <p>Capacidad máxima de memoria de 8GB</p> <p>Cada DIMM admite DDR de 256/512MB/1GB/2GB</p> <p>Módulo de memoria DDR2 de canal Doble</p> <p>Admite DDR2 de 400 / 533 / 667 / 800</p> <p>No admite DIMM registrados o DIMM compatibles con ECC</p>
Gráficos	<p>Integrados en el conjunto de chips GeForce 7050PV/NF630a</p> <p>Memoria máxima de vídeo compartida de 256MB</p>	<p>Integrados en el conjunto de chips GeForce 7025/NF630a</p> <p>Memoria máxima de vídeo compartida de 256MB</p>
IDE	<p>Controlador IDE integrado</p> <p>Modo bus maestro Ultra DMA 33 / 66 / 100 / 133</p> <p>Soporte los Modos PIO 0~4,</p>	<p>Controlador IDE integrado</p> <p>Modo bus maestro Ultra DMA 33 / 66 / 100 / 133</p> <p>Soporte los Modos PIO 0~4,</p>
SATA II	<p>Controlador ATA Serie Integrado</p> <p>Tasas de transferencia de hasta 3 Gb/s.</p> <p>Compatible con la versión SATA 2.0.</p>	<p>Controlador ATA Serie Integrado</p> <p>Tasas de transferencia de hasta 3 Gb/s.</p> <p>Compatible con la versión SATA 2.0.</p>
Red Local	<p>Realtek RTL 8111B / 8101E (opcional)</p> <p>Negociación de 10 / 100 / 1000 Mb/s (el ancho de banda Gigabit es únicamente para RTL 8111B )</p> <p>Funciones Half / Full dúplex</p>	<p>Realtek RTL 8111B / 8101E (opcional)</p> <p>Negociación de 10 / 100 / 1000 Mb/s (el ancho de banda Gigabit es únicamente para RTL 8111B )</p> <p>Funciones Half / Full dúplex</p>

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>		<b>TF7025-M2</b>	
Códecs de sonido	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Salida de sonido de 7.1 canales (Ver 5.x) / Salida de sonido de 5.1 canales (Ver 6.x) Soporte de sonido Alta Definición Salida de sonido de 2 canales (HDMI sonido)		ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Salida de sonido de 7.1 canales (Ver 5.x) / Salida de sonido de 5.1 canales (Ver 6.x) Soporte de sonido Alta Definición	
Ranuras	Ranura PCI	X2	Ranura PCI	X2
	Ranura PCI Express x16	X1	Ranura PCI Express x16	X1
	Ranura PCI express x 1	X1	Ranura PCI express x 1	X1
Conectores en placa	Conector disco flexible	X1	Conector disco flexible	X1
	Conector Puerto de impresora	X1	Conector Puerto de impresora	X1
	Conector IDE	X1	Conector IDE	X1
	Conector SATA	X4	Conector SATA	X4
	Conector de panel frontal	X1	Conector de panel frontal	X1
	Conector de sonido frontal	X1	Conector de sonido frontal	X1
	Conector de entrada de CD	X1	Conector de entrada de CD	X1
	Conector de salida S/PDIF	X1	Conector de salida S/PDIF	X1
	Conector de entrada S/PDIF (opcional)	x1	Conector de entrada S/PDIF (opcional)	x1
	Cabecera de ventilador de CPU	X1	Cabecera de ventilador de CPU	X1
	Cabecera de ventilador de sistema	X3	Cabecera de ventilador de sistema	X3
	Cabecera de borrado de CMOS	X1	Cabecera de borrado de CMOS	X1
	Conector USB	X3	Conector USB	X3
	Conector Puerto serie	X1	Conector Puerto serie	X1
Conector de alimentación (24 patillas)	X1	Conector de alimentación (24 patillas)	X1	
	Conector de alimentación (4 patillas)	X1	Conector de alimentación (4 patillas)	X1
Panel trasero de E/S	Teclado PS/2	X1	Teclado PS/2	X1
	Ratón PS/2	X1	Ratón PS/2	X1
	Puerto S-Video	X1	Puerto VGA	X1
	Puerto HDMI	X1	Puerto DVI-D	X1
	Puerto VGA	X1	Puerto de red local	X1
	Puerto de red local	X1	Puerto USB	X4
	Puerto USB	X4	Conector de sonido (Ver 5.x)	X6
	Conector de sonido (Ver 5.x)	X6	Conector de sonido (Ver 6.x)	X3
	Conector de sonido (Ver 6.x)	X3		
Tamaño de la placa	235 mm. (A) X 244 Mm. (H)		235 mm. (A) X 244 Mm. (H)	
Funciones especiales	Admite RAID 0 / 1 / 5 / 0+1		Admite RAID 0 / 1 / 5 / 0+1	
Soporte de sistema operativo	Windows 2000 / XP / VISTA Biostar se reserva el derecho de añadir o retirar el soporte de cualquier SO con o sin aviso previo.		Windows 2000 / XP / VISTA Biostar se reserva el derecho de añadir o retirar el soporte de cualquier SO con o sin aviso previo.	

**PORTUGUESE**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
CPU	Socket AM2 Processadores AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron A arquitectura AMD 64 permite uma computação de 32 e 64 bits Suporta as tecnologias Hyper Transport e Cool'n'Quiet	Socket AM2 Processadores AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron A arquitectura AMD 64 permite uma computação de 32 e 64 bits Suporta as tecnologias Hyper Transport e Cool'n'Quiet
FSB	Suporta a tecnologia HyperTransport com uma largura de banda até 1 GHz	Suporta a tecnologia HyperTransport com uma largura de banda até 1 GHz
Chipset	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Especificação do Super I/O	ITE 8716F Proporciona as funcionalidades mais utilizadas em termos da especificação Super I/O. Interface LPC (Low Pin Count). Iniciativas para controlo do ambiente Monitorização do hardware Controlador da velocidade da ventoinha Função "Smart Guardian" da ITE	ITE 8716F Proporciona as funcionalidades mais utilizadas em termos da especificação Super I/O. Interface LPC (Low Pin Count). Iniciativas para controlo do ambiente Monitorização do hardware Controlador da velocidade da ventoinha Função "Smart Guardian" da ITE
Memória principal	Ranuras DIMM DDR2 x 4 Capacidade máxima de memória: 8 GB Cada módulo DIMM suporta uma memória DDR2 de 256/512 MB & 1 GB/2 GB Módulo de memória DDR2 de canal duplo Suporta módulos DDR2 400 / 533 / 667 / 800 Os módulos DIMM registados e os DIMM ECC não são suportados	Ranuras DIMM DDR2 x 4 Capacidade máxima de memória: 8 GB Cada módulo DIMM suporta uma memória DDR2 de 256/512 MB & 1 GB/2 GB Módulo de memória DDR2 de canal duplo Suporta módulos DDR2 400 / 533 / 667 / 800 Os módulos DIMM registados e os DIMM ECC não são suportados
Placa gráfica	Integrada no chipset GeForce 7050PV/NF630a Memória de vídeo máxima partilhada: 256 MB	Integrada no chipset GeForce 7025/NF630a Memória de vídeo máxima partilhada: 256 MB
IDE	Controlador IDE integrado Modo Bus master Ultra DMA 33 / 66 / 100 / 133 Suporta o modo PIO 0~4,	Controlador IDE integrado Modo Bus master Ultra DMA 33 / 66 / 100 / 133 Suporta o modo PIO 0~4,
SATA II	Controlador Serial ATA integrado Velocidades de transmissão de dados até 3 Gb/s. Compatibilidade com a especificação SATA versão 2.0.	Controlador Serial ATA integrado Velocidades de transmissão de dados até 3 Gb/s. Compatibilidade com a especificação SATA versão 2.0.
LAN	Realtek RTL 8111B / 8101E (opcional) Auto negociação de 10 / 100 / 1000 Mb/s (a largura de banda Gigabit refere-se apenas à especificação RTL 8111B ) Capacidade semi/full-duplex	Realtek RTL 8111B / 8101E (opcional) Auto negociação de 10 / 100 / 1000 Mb/s (a largura de banda Gigabit refere-se apenas à especificação RTL 8111B ) Capacidade semi/full-duplex

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Codec de som	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Saída de áudio de 7.1 canais (Ver 5.x) / Saída de áudio de 5.1 canais (Ver 6.x) Suporta a especificação High-Definition Audio Saída de áudio de 2 canais (HDMI áudio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) Saída de áudio de 7.1 canais (Ver 5.x) / Saída de áudio de 5.1 canais (Ver 6.x) Suporta a especificação High-Definition Audio
Ranhuras	Ranhura PCI x2 Ranhura PCI Express x16 x1 Ranhura PCI Express x 1 x1	Ranhura PCI x2 Ranhura PCI Express x16 x1 Ranhura PCI Express x 1 x1
Conectores na placa	Conector da unidade de disquetes x1 Conector da para impressora x1 Conector IDE x1 Conector SATA x4 Conector do painel frontal x1 Conector de áudio frontal x1 Conector para entrada de CDs x1 Conector de saída S/PDIF x1 Conector de entrada S/PDIF (opcional) x1 Conector da ventoinha da CPU x1 Conector da ventoinha do sistema x3 Conector para limpeza do CMOS x1 Conector USB x3 Conector da Porta série x1 Conector de alimentação (24 pinos) x1 Conector de alimentação (4 pinos) x1	Conector da unidade de disquetes x1 Conector da para impressora x1 Conector IDE x1 Conector SATA x4 Conector do painel frontal x1 Conector de áudio frontal x1 Conector para entrada de CDs x1 Conector de saída S/PDIF x1 Conector de entrada S/PDIF (opcional) x1 Conector da ventoinha da CPU x1 Conector da ventoinha do sistema x3 Conector para limpeza do CMOS x1 Conector USB x3 Conector da Porta série x1 Conector de alimentação (24 pinos) x1 Conector de alimentação (4 pinos) x1
Entradas/Saídas no painel traseiro	Teclado PS/2 x1 Rato PS/2 x1 Porta S-Vídeo x1 Porta HDMI x1 Porta VGA x1 Porta LAN x1 Porta USB x4 Tomada de áudio (Ver 5.x) x6 Tomada de áudio (Ver 6.x) x3	Teclado PS/2 x1 Rato PS/2 x1 Porta VGA x1 Porta DVI-D x1 Porta LAN x1 Porta USB x4 Tomada de áudio (Ver 5.x) x6 Tomada de áudio (Ver 6.x) x3
Tamanho da placa	235 mm (L) X 244 mm (A)	235 mm (L) X 244 mm (A)
Características especiais	Suporta as funções RAID 0 / 1 / 5 / 0+1	Suporta as funções RAID 0 / 1 / 5 / 0+1
Sistemas operativos suportados	Windows 2000 / XP / VISTA A Biostar reserva-se o direito de adicionar ou remover suporte para qualquer sistema operativo com ou sem aviso prévio.	Windows 2000 / XP / VISTA A Biostar reserva-se o direito de adicionar ou remover suporte para qualquer sistema operativo com ou sem aviso prévio.

**POLISH**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Procesor	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron Procesory Architektura AMD 64 umożliwia przetwarzanie 32 i 64 bitowe Obsługa Hyper Transport oraz Cool'n'Quiet	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron Procesory Architektura AMD 64 umożliwia przetwarzanie 32 i 64 bitowe Obsługa Hyper Transport oraz Cool'n'Quiet
FSB	Obsługa HyperTransport o szerokości pasma do 1 GHz	Obsługa HyperTransport o szerokości pasma do 1 GHz
Chipset	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Pamięć główna	Gniazda DDR2 DIMM x 4 Maks. wielkość pamięci 8GB Każde gniazdo DIMM obsługuje moduły 256/512MB oraz 1GB/2GB DDR2 Moduł pamięci DDR2 z trybem podwójnego kanału Obsługa DDR2 400 / 533 / 667 / 800 Brak obsługi Registered DIMM oraz ECC DIMM	Gniazda DDR2 DIMM x 4 Maks. wielkość pamięci 8GB Każde gniazdo DIMM obsługuje moduły 256/512MB oraz 1GB/2GB DDR2 Moduł pamięci DDR2 z trybem podwójnego kanału Obsługa DDR2 400 / 533 / 667 / 800 Brak obsługi Registered DIMM oraz ECC DIMM
Super I/O	ITE 8716F Zapewnia najbardziej powszechne funkcje Super I/O. Interfejs Low Pin Count Funkcje kontroli warunków pracy, Monitor H/W Kontroler prędkości wentylatora Funkcja ITE "Smart Guardian"	ITE 8716F Zapewnia najbardziej powszechne funkcje Super I/O. Interfejs Low Pin Count Funkcje kontroli warunków pracy, Monitor H/W Kontroler prędkości wentylatora Funkcja ITE "Smart Guardian"
Grafika	Zintegrowana w chipsecie GeForce 7050PV/NF630a Maks. wielkość współdzielonej pamięci video wynosi 256MB	Zintegrowana w chipsecie GeForce 7025/NF630a Maks. wielkość współdzielonej pamięci video wynosi 256MB
IDE	Zintegrowany kontroler IDE Ultra DMA 33 / 66 / 100 / 133 Tryb Bus Master obsługa PIO tryb 0~4,	Zintegrowany kontroler IDE Ultra DMA 33 / 66 / 100 / 133 Tryb Bus Master obsługa PIO tryb 0~4,
SATA II	Zintegrowany kontroler Serial ATA Transfer danych do 3 Gb/s. Zgodność ze specyfikacją SATA w wersji 2.0.	Zintegrowany kontroler Serial ATA Transfer danych do 3 Gb/s. Zgodność ze specyfikacją SATA w wersji 2.0.
LAN	Realtek RTL 8111B / 8101E (opcja) 10 / 100 / 1000 Mb/s z automatyczną negocjacją szybkości (Pasma gigabitowe wyłącznie dla RTL 8111B ) Działanie w trybie połowicznego / pełnego dupleksu	Realtek RTL 8111B / 8101E (opcja) 10 / 100 / 1000 Mb/s z automatyczną negocjacją szybkości (Pasma gigabitowe wyłącznie dla RTL 8111B ) Działanie w trybie połowicznego / pełnego dupleksu

**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Kodek dźwiękowy	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 kanałowe wyjście audio (Ver 5.x) / 5.1 kanałowe wyjście audio (Ver 6.x) Obsługa High-Definition Audio 2 kanałowe wyjście audio (HDMI audio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 kanałowe wyjście audio (Ver 5.x) / 5.1 kanałowe wyjście audio (Ver 6.x) Obsługa High-Definition Audio
Gniazda	Gniazdo PCI x2 Gniazdo PCI Express x16 x1 Gniazdo PCI Express x 1 x1	Gniazdo PCI x2 Gniazdo PCI Express x16 x1 Gniazdo PCI Express x 1 x1
Złącza wbudowane	Złącze napędu dyskietek x1 Złącze Port drukarki x1 Złącze IDE x1 Złącze SATA x4 Złącze panela przedniego x1 Przednie złącze audio x1 Złącze wejścia CD x1 Złącze wyjścia S/PDIF x1 Złącze wejścia S/PDIF (opcja) x1 Złącze główkowe wentylatora procesora x1 Złącze główkowe wentylatora systemowego x3 Złącze główkowe kasowania CMOS x1 Złącze USB x3 Złącze Port szeregowy x1 Złącze zasilania (24 pinowe) x1 Złącze zasilania (4 pinowe) x1	Złącze napędu dyskietek x1 Złącze Port drukarki x1 Złącze IDE x1 Złącze SATA x4 Złącze panela przedniego x1 Przednie złącze audio x1 Złącze wejścia CD x1 Złącze wyjścia S/PDIF x1 Złącze wejścia S/PDIF (opcja) x1 Złącze główkowe wentylatora procesora x1 Złącze główkowe wentylatora systemowego x3 Złącze główkowe kasowania CMOS x1 Złącze USB x3 Złącze Port szeregowy x1 Złącze zasilania (24 pinowe) x1 Złącze zasilania (4 pinowe) x1
Back Panel I/O	Klawiatura PS/2 x1 Mysz PS/2 x1 Port S-Video x1 Port HDMI x1 Port VGA x1 Port LAN x1 Port USB x4 Gniazdo audio (Ver 5.x) x6 Gniazdo audio (Ver 6.x) x3	Klawiatura PS/2 x1 Mysz PS/2 x1 Port VGA x1 Port DVI-D x1 Port LAN x1 Port USB x4 Gniazdo audio (Ver 5.x) x6 Gniazdo audio (Ver 6.x) x3
Wymiary płyty	235 mm (S) X 244 mm (W)	235 mm (S) X 244 mm (W)
Funkcje specjalne	Obsługa RAID 0 / 1 / 5 / 0+1	Obsługa RAID 0 / 1 / 5 / 0+1
Obsługa systemu operacyjnego	Windows 2000 / XP / VISTA Biostar zastrzega sobie prawo dodawania lub odwoływania obsługi dowolnego systemu operacyjnego bez powiadomienia.	Windows 2000 / XP / VISTA Biostar zastrzega sobie prawo dodawania lub odwoływania obsługi dowolnego systemu operacyjnego bez powiadomienia.

## RUSSIAN

	TF7050-M2	TF7025-M2
CPU (центральный процессор)	Гнездо AM2 Процессоры AMD Athlon 64 / Athlon 64 FX / Athlon 64X2 / Sempron Архитектура AMD 64 разрешать обработка данных на 32 и 64 бит Поддержка Hyper Transport и Cool'n'Quiet	Гнездо AM2 Процессоры AMD Athlon 64 / Athlon 64 FX / Athlon 64X2 / Sempron Архитектура AMD 64 разрешать обработка данных на 32 и 64 бит Поддержка Hyper Transport и Cool'n'Quiet
FSB	Поддержка HyperTransport с пропускной способностью до1ГГц	Поддержка HyperTransport с пропускной способностью до1ГГц
Набор микросхем	GeForce 7050PV/NF630a	GeForce 7025/NF630a
Основная память	Слоты DDR2 DIMM x 4 Максимальная ёмкость памяти 8 ГБ Каждый модуль DIMM поддерживает 256/512МБ & 1ГБ/2ГБ DDR2 Модуль памяти с двухканальным режимом DDR2 Поддержка DDR2 400 / 533 / 667 / 800 Не поддерживает зарегистрированные модули DIMM and ECC DIMM	Слоты DDR2 DIMM x 4 Максимальная ёмкость памяти 8 ГБ Каждый модуль DIMM поддерживает 256/512МБ & 1ГБ/2ГБ DDR2 Модуль памяти с двухканальным режимом DDR2 Поддержка DDR2 400 / 533 / 667 / 800 Не поддерживает зарегистрированные модули DIMM and ECC DIMM
Super I/O	ITE 8716F Обеспечивает наиболее используемые действующие функциональные возможности Super I/O. Интерфейс с низким количеством выводов Инициативы по охране окружающей среды, Аппаратный монитор Регулятор скорости Функция ITE "Smart Guardian" (Интеллектуальная защита)	ITE 8716F Обеспечивает наиболее используемые действующие функциональные возможности Super I/O. Интерфейс с низким количеством выводов Инициативы по охране окружающей среды, Аппаратный монитор Регулятор скорости Функция ITE "Smart Guardian" (Интеллектуальная защита)
Графика	Встроенная в набор микросхем GeForce 7050PV/NF630a Максимальная совместно используемая видео память составляет 256 МБ	Встроенная в набор микросхем GeForce 7025/NF630a Максимальная совместно используемая видео память составляет 256 МБ
IDE	Встроенное устройство управления встроенными интерфейсами устройств Режим "хозяина" шины Ultra DMA 33 / 66 / 100 / 133 Поддержка режима PIO 0~4,	Встроенное устройство управления встроенными интерфейсами устройств Режим "хозяина" шины Ultra DMA 33 / 66 / 100 / 133 Поддержка режима PIO 0~4,
SATA II	Встроенное последовательное устройство управления ATA скорость передачи данных до 3 гигабит/с. Соответствие спецификации SATA версия 2.0.	Встроенное последовательное устройство управления ATA скорость передачи данных до 3 гигабит/с. Соответствие спецификации SATA версия 2.0.
Локальная сеть	Realtek RTL 8111B / 8101E (дополнительно) Автоматическое согласование 10 / 100 / 1000 Мб/с (гигабитная пропускная способность только для гигабитного физического уровня) Частичная / полная дуплексная способность	Realtek RTL 8111B / 8101E (дополнительно) Автоматическое согласование 10 / 100 / 1000 Мб/с (гигабитная пропускная способность только для гигабитного физического уровня) Частичная / полная дуплексная способность



**TF7050-M2/TF7025-M2**

	<b>TF7050-M2</b>	<b>TF7025-M2</b>
Звуковой кодек	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1канальный звуковой выход (Ver 5.x) / 5.1канальный звуковой выход (Ver 6.x) Звуковая поддержка High-Definition 2канальный звуковой выход (HDMI)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1канальный звуковой выход (Ver 5.x) / 5.1канальный звуковой выход (Ver 6.x) Звуковая поддержка High-Definition
Слоты	Слот PCI x2 Слот PCI Express x16 x1 Слот PCI Express x 1 x1	Слот PCI x2 Слот PCI Express x16 x1 Слот PCI Express x 1 x1
Встроенный разъём	Разъём НГМД x1 Разъём Порт подключения принтера x1 Разъём IDE x1 Разъём SATA x4 Разъём на лицевой панели x1 Входной звуковой разъём x1 Разъём ввода для CD x1 Разъём вывода для S/PDIF x1 Разъём ввода для S/PDIF (дополнительно) x1 Контактирующее приспособление вентилятора центрального процессора x1 Контактирующее приспособление вентилятора системы x3 Открытое контактирующее приспособление CMOS x1 USB-разъём x3 Разъём Последовательный порт x1 Разъём питания (24 вывод) x1 Разъём питания (4 вывод) x1	Разъём НГМД x1 Разъём Порт подключения принтера x1 Разъём IDE x1 Разъём SATA x4 Разъём на лицевой панели x1 Входной звуковой разъём x1 Разъём ввода для CD x1 Разъём вывода для S/PDIF x1 Разъём ввода для S/PDIF (дополнительно) x1 Контактирующее приспособление вентилятора центрального процессора x1 Контактирующее приспособление вентилятора системы x3 Открытое контактирующее приспособление CMOS x1 USB-разъём x3 Разъём Последовательный порт x1 Разъём питания (24 вывод) x1 Разъём питания (4 вывод) x1
Задняя панель средств ввода-вывода	Клавиатура PS/2 x1 Мышь PS/2 x1 Порт S-Video x1 Порт HDMI x1 Порт VGA x1 Порт LAN x1 USB-порт x4 Гнездо для подключения наушников (Ver 5.x) x6 Гнездо для подключения наушников (Ver 6.x) x3	Клавиатура PS/2 x1 Мышь PS/2 x1 Порт VGA x1 Порт DVI-D x1 Порт LAN x1 USB-порт x4 Гнездо для подключения наушников (Ver 5.x) x6 Гнездо для подключения наушников (Ver 6.x) x3
Размер панели	235 мм (Ш) X 244 мм (В)	235 мм (Ш) X 244 мм (В)
Специальные технические характеристики	Поддержка RAID 0 / 1 / 5 / 0+1	Поддержка RAID 0 / 1 / 5 / 0+1
Поддержка OS	Windows 2000 / XP / VISTA Biostar сохраняет за собой право добавлять или удалять средства обеспечения для OS с или без предварительного уведомления.	Windows 2000 / XP / VISTA Biostar сохраняет за собой право добавлять или удалять средства обеспечения для OS с или без предварительного уведомления.

## ARABIC

TF7025-M2	TF7050-M2	
AM2 مقبس AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron إجراء العمليات الحاسوبية بسرعة 32 و 64 بت AMD يمكن تقنية Cool'n'Quiet و Hyper Transport تدعم تقنية	AM2 مقبس AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2 / Sempron إجراء العمليات الحاسوبية بسرعة 32 و 64 بت AMD يمكن تقنية Cool'n'Quiet و Hyper Transport تدعم تقنية	وحدة المعالجة المركزية
تردد 1000 يتردد يصل إلى HyperTransport تدعم تقنية	تردد 1000 يتردد يصل إلى HyperTransport تدعم تقنية	الثقل الأمامي الجانبي
GeForce 7025/NF630a	GeForce 7050PV/NF630a	مجموعة الشرائح
عدد4 قناة DDR2 DIMM سعة ذاكرة قصوى 8 جيجا بايت ميغا 256/512 سعة DDR2 تدعم ذاكرة من نوع DIMM تدعم كل قناة بايت و1/2 جيجا بايت مزودة القاعة DDR2 وحدة ذاكرة سعت 800 / 667 / 533 / 400 ميغا DDR2 تدعم الذاكرة من نوع بايت ECC ونك التي لا تتوافق مع DIMM لا تدعم رقائق الذاكرة	عدد4 قناة DDR2 DIMM سعة ذاكرة قصوى 8 جيجا بايت ميغا 256/512 سعة DDR2 تدعم ذاكرة من نوع DIMM تدعم كل قناة بايت و1/2 جيجا بايت مزودة القاعة DDR2 وحدة ذاكرة سعت 800 / 667 / 533 / 400 ميغا DDR2 تدعم الذاكرة من نوع بايت ECC ونك التي لا تتوافق مع DIMM لا تدعم رقائق الذاكرة	الذاكرة الرئيسية
ITE 8716F الأكثر استخداماً Super I/O يوفر وظيفة Low Pin Count Interface تدعم تقنية وسائل التحكم في البيئة: مراقب لمعرفة حالة الأجهزة مراقب في سرعة المروحة ITE من "Smart Guardian" وظيفة	ITE 8716F الأكثر استخداماً Super I/O يوفر وظيفة Low Pin Count Interface تدعم تقنية وسائل التحكم في البيئة: مراقب لمعرفة حالة الأجهزة مراقب في سرعة المروحة ITE من "Smart Guardian" وظيفة	Super I/O
GeForce 7025/NF630a مدمجة في رقائق ميغا بايت 256 أقصى سعة لذاكرة الفيديو المشتركة	GeForce 7050PV/NF630a مدمجة في رقائق ميغا بايت 256 أقصى سعة لذاكرة الفيديو المشتركة	بطاقة الرسومات
متكامل IDE متحكم وضع رئيسي 133 / 100 / 66 / 33 Ultra DMA نقل بتقنية PIO Mode 0~4 دعم وضع	متكامل IDE متحكم وضع رئيسي 133 / 100 / 66 / 33 Ultra DMA نقل بتقنية PIO Mode 0~4 دعم وضع	منفذ IDE
متكامل Serial ATA متحكم نقل البيانات بسرعة تصل إلى 3 جيجابت/ثانية. 2.0 الإصدار SATA مطابقة لمواصفات	متكامل Serial ATA متحكم نقل البيانات بسرعة تصل إلى 3 جيجابت/ثانية. 2.0 الإصدار SATA مطابقة لمواصفات	SATA II
Realtek RTL 8111B / RTL 8101E (اختياري) تفاوض تلقائي 10/100 ميغا بايت / ثانية و 1 جيجا بايت/ثانية RTL 8111B النطاق الترددي للجيجابت مقصور فقط على إمكانية النقل المزدوج الكامل/التصفى	Realtek RTL 8111B / RTL 8101E (اختياري) تفاوض تلقائي 10/100 ميغا بايت / ثانية و 1 جيجا بايت/ثانية RTL 8111B النطاق الترددي للجيجابت مقصور فقط على إمكانية النقل المزدوج الكامل/التصفى	شبكة داخلية

TF7050-M2/TF7025-M2

TF7025-M2	TF7050-M2	
ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 قنوات لخرج الصوت (Ver 5.x)/ 5.1 قنوات لخرج الصوت (Ver 6.x) تدعم تقنية الصوت عالي التعريف من	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1 قنوات لخرج الصوت (Ver 5.x)/ 5.1 قنوات لخرج الصوت (Ver 6.x) تدعم تقنية الصوت عالي التعريف من قنوات لخرج الصوت 2 (HDMI)	كوديك الصوت
عدد 2 فتحة PCI عدد 1 فتحة PCI Express x16 عدد 1 فتحة PCI Express x1	عدد 2 فتحة PCI عدد 1 فتحة PCI Express x16 عدد 1 فتحة PCI Express x1	الفتحات
عدد 1 منفذ محرك أقراص مرنة عدد 1 منفذ طابعة عدد 1 منفذ IDE عدد 4 منفذ SATA عدد 1 منفذ اللوحة الأممية عدد 1 منفذ الصوت الأممي عدد 1 منفذ CD-IN عدد 1 منفذ خرج S/PDIF عدد 1 منفذ دخل S/PDIF (اختياري) عدد 1 وصلة مروحة وحدة المعالجة المركزية عدد 3 وصلة مروحة النظام عدد 1 وصلة مسح CMOS عدد 3 منفذ USB عدد 1 منفذ تسلسلي عدد 1 منفذ توصيل الطاقة (24دبوس) عدد 1 منفذ توصيل الطاقة (4دبابيس)	عدد 1 منفذ محرك أقراص مرنة عدد 1 منفذ طابعة عدد 1 منفذ IDE عدد 4 منفذ SATA عدد 1 منفذ اللوحة الأممية عدد 1 منفذ الصوت الأممي عدد 1 منفذ CD-IN عدد 1 منفذ خرج S/PDIF عدد 1 منفذ دخل S/PDIF (اختياري) عدد 1 وصلة مروحة وحدة المعالجة المركزية عدد 3 وصلة مروحة النظام عدد 1 وصلة مسح CMOS عدد 3 منفذ USB عدد 1 منفذ تسلسلي عدد 1 منفذ توصيل الطاقة (24دبوس) عدد 1 منفذ توصيل الطاقة (4دبابيس)	المنفذ على سطح اللوحة
عدد 1 لوحة مفاتيح PS/2 عدد 1 مئوس PS/2 عدد 1 منافذ VGA عدد 1 منافذ DVI-D عدد 1 منفذ شبكة اتصال محلية عدد 4 منافذ USB عدد 6 مقيس صوت (Ver 5.x) عدد 3 مقيس صوت (Ver 6.x)	عدد 1 لوحة مفاتيح PS/2 عدد 1 مئوس PS/2 عدد 1 منافذ S-Video عدد 1 منافذ HDMI عدد 1 منافذ VGA عدد 1 منفذ شبكة اتصال محلية عدد 4 منافذ USB عدد 6 مقيس صوت (Ver 5.x) عدد 3 مقيس صوت (Ver 6.x)	منفذ دخل/خرج اللوحة الخلفية
RAID 0 / 1 / 5 / 0+1 تدعم تقنية	RAID 0 / 1 / 5 / 0+1 تدعم تقنية	مزايا خاصة
235مم (عرض) X 244مم (الارتفاع)	235مم (عرض) X 244مم (الارتفاع)	حجم اللوحة
Windows 2000 / XP / VISTA بحقها في إضافة أو إزالة الدعم لأي نظام تشغيل بإخطار أو Biostar تحتفظ بدون إخطار .	Windows 2000 / XP / VISTA بحقها في إضافة أو إزالة الدعم لأي نظام تشغيل بإخطار أو Biostar تحتفظ بدون إخطار .	دعم أنظمة التشغيل

## JAPANESE

	TF7050-M2	TF7025-M2
CPU	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2/ Sempron プロセッサ AMD 64アーキテクチャでは、32ビットと64ビット計算が可能です ハイパートランスポートとクールアンドクワイアットをサポートします	Socket AM2 AMD Athlon 64 / Athlon 64 FX / Athlon 64 x2/ Sempron プロセッサ AMD 64アーキテクチャでは、32ビットと64ビット計算が可能です ハイパートランスポートとクールアンドクワイアットをサポートします
FSB	1GHzのバンド幅までハイパートランスポートをサポートします	1GHzのバンド幅までハイパートランスポートをサポートします
チップセット	GeForce 7050PV/NF630a	GeForce 7025/NF630a
メインメモリ	DDR2 DIMMスロット x 4 最大メモリ容量8GB 各DIMMは 256/512MB/1GB/2GB DDR2をサポート デュアル チャンネルモードDDR2 メモリモジュール DDR2 400 / 533 / 667 / 800をサポート 登録済みDIMMとECC DIMMはサポートされません	DDR2 DIMMスロット x 4 最大メモリ容量8GB 各DIMMは 256/512MB/1GB/2GB DDR2をサポート デュアル チャンネルモードDDR2 メモリモジュール DDR2 400 / 533 / 667 / 800をサポート 登録済みDIMMとECC DIMMはサポートされません
Super I/O	ITE 8716F もっとも一般に使用されるレガシーSuper I/O機能を採用しています。 低ピンカウントインターフェイス 環境コントロールイニシアチブ、 H/Wモニター ファン速度コントローラ/ モニター ITEの「スマートガーディアン」機能	ITE 8716F もっとも一般に使用されるレガシーSuper I/O機能を採用しています。 低ピンカウントインターフェイス 環境コントロールイニシアチブ、 H/Wモニター ファン速度コントローラ/ モニター ITEの「スマートガーディアン」機能
グラフィックス	GeForce 7050PV/NF630aチップセットに統合 最大の共有ビデオメモリは256MBです	GeForce 7025/NF630aチップセットに統合 最大の共有ビデオメモリは256MBです
IDE	統合IDEコントローラ Ultra DMA 33 / 66 / 100 / 133 バスマスタモード PIO Mode 0~4のサポート、	統合IDEコントローラ Ultra DMA 33 / 66 / 100 / 133 バスマスタモード PIO Mode 0~4のサポート、
SATA II	統合シリアルATA コントローラ 最高3 Gb/秒のデータ転送速度 SATAバージョン2.0仕様準拠。	統合シリアルATA コントローラ 最高3 Gb/秒のデータ転送速度 SATAバージョン2.0仕様準拠。
LAN	Realtek RTL 8111B / 8101E (オプション) 10 / 100 / 1000 Mb/秒のオートネゴシエーション (Gigabitバンド幅はRTL 8111B 専用です) 半/全二重機能	Realtek RTL 8111B / 8101E (オプション) 10 / 100 / 1000 Mb/秒のオートネゴシエーション (Gigabitバンド幅はRTL 8111B 専用です) 半/全二重機能

TF7050-M2/TF7025-M2

	TF7050-M2	TF7025-M2
サウンド Codec	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1チャンネルオーディオアウト (Ver 5.x) / 5.1チャンネルオーディオアウト (Ver 6.x) ハイデフィニションオーディオのサポート 2チャンネルオーディオアウト (HDMI audio)	ALC888 (Ver 5.x) / ALC861VD (Ver 6.x) 7.1チャンネルオーディオアウト (Ver 5.x) / 5.1チャンネルオーディオアウト (Ver 6.x) ハイデフィニションオーディオのサポート
スロット	PCIスロット x2 PCI Express x16スロット x1 PCI Express x 1スロット x1	PCIスロット x2 PCI Express x16スロット x1 PCI Express x 1スロット x1
オンボードコ ネクタ	フロッピーコネクタ x1 プリンタポートコネクタ x1 IDEコネクタ x1 SATAコネクタ x4 フロントパネルコネクタ x1 フロントオーディオコネクタ x1 CDインコネクタ x1 S/PDIFアウトコネクタ x1 S/PDIFインコネクタ (オプション) x1 CPUファンヘッダ x1 システムファンヘッダ x3 CMOSクリアヘッダ x1 USBコネクタ x3 シリアルポートコネクタ x1 電源コネクタ(24ピン) x1 電源コネクタ(4ピン) x1	フロッピーコネクタ x1 プリンタポートコネクタ x1 IDEコネクタ x1 SATAコネクタ x4 フロントパネルコネクタ x1 フロントオーディオコネクタ x1 CDインコネクタ x1 S/PDIFアウトコネクタ x1 S/PDIFインコネクタ (オプション) x1 CPUファンヘッダ x1 システムファンヘッダ x3 CMOSクリアヘッダ x1 USBコネクタ x3 シリアルポートコネクタ x1 電源コネクタ(24ピン) x1 電源コネクタ(4ピン) x1
背面パネル I/O	PS/2キーボード x1 PS/2マウス x1 S-Videoポート x1 HDMIポート x1 VGAポート x1 LANポート x1 USBポート x4 オーディオジャック(Ver 5.x) x6 オーディオジャック(Ver 6.x) x3	PS/2キーボード x1 PS/2マウス x1 VGAポート x1 DVI-Dポート x1 LANポート x1 USBポート x4 オーディオジャック(Ver 5.x) x6 オーディオジャック(Ver 6.x) x3
ボードサイズ	235 mm (幅) X 244 mm (高さ)	235 mm (幅) X 244 mm (高さ)
特殊機能	RAID 0 / 1 / 5 / 0+1 のサポート	RAID 0 / 1 / 5 / 0+1 のサポート
OSサポート	Windows 2000 / XP / VISTA Biostarは事前のサポートなしにOSサポートを追加ま たは削除する権利を留保します。	Windows 2000 / XP / VISTA Biostarは事前のサポートなしにOSサポートを追加ま たは削除する権利を留保します。

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