



Installation & Maintenance Manual

TeamPOS 3600 Series



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*Team**PoS** 3600 Series®*
Installation and Maintenance
Manual

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Regulatory Information

EMC

Radio Frequency Interference Requirements – U.S.A.

Note: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Radio Frequency Interference Requirements – Canada

This Class B digital apparatus complies with Canadian ICES-003.

Cet appareil numérique de la classe B est conforme à la norme NMB-003 du Canada.

Radio Frequency Interference Requirements – Europe

This apparatus has been tested and found to comply with the limits for a Class B digital device, per EN55022, for use in Information Technology equipment. In a domestic environment this product may cause radio interference in which case the user may be required to take adequate measures.

This apparatus also meets the susceptibility requirements per EN55024. Overall the product qualifies for and bears the CE mark.

Safety

Hazardous Voltage



Caution: Hazardous voltage, service engineer only to open top cover, and back plane assembly.



Attention: Tension dangereuse.
Seul un technicien de maintenance est autorisé à ouvrir le couvercle ou le fond de panier.

Lithium-Ion Battery



Caution: Danger of explosion if the Lithium-Ion battery is incorrectly replaced. Replace only with the same or equivalent type recommended by the manufacturer. Recycle or discard used batteries according to the manufacturer's instructions.



Attention: Risque d'explosion si la pile lithium-ion n'est pas correctement remplacée.
Remplacer uniquement par une pile du même type ou d'un type équivalent recommandé par le fabricant. Recyclez ou débarrassez-vous des piles usagées conformément aux instructions du fabricant.

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Chapter 1. Overview

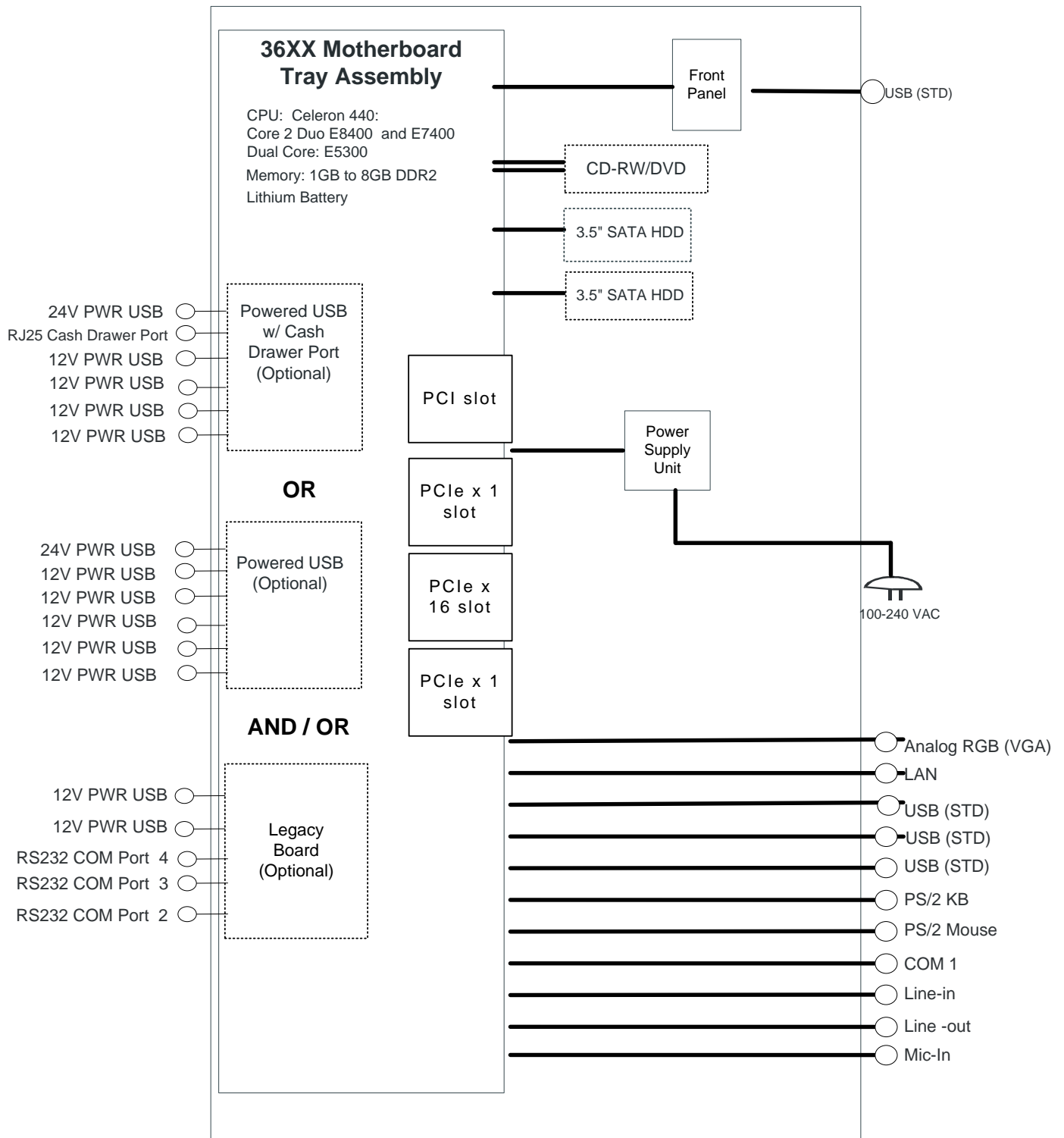
This manual is provided to illustrate how to install and maintain the *TeamPOS 3600 Series* and describes in detail the procedures required for field installation and maintenance, including site preparation, equipment inspection, CMOS settings, and troubleshooting the controller.

The following sections provide a brief overview of the *TeamPOS 3600 Series* controller:



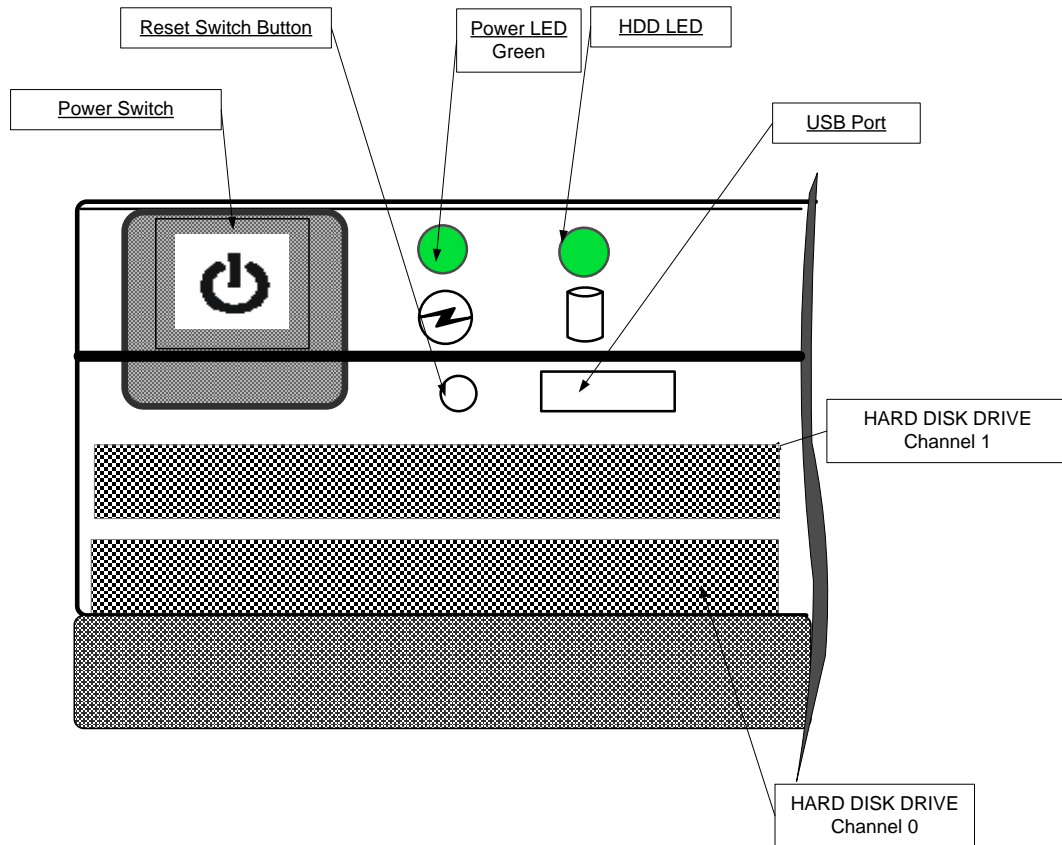
The *TeamPOS 3600 Series* is a state-of-the-art Point-of-Sale (POS) terminal. Built on an industry standard platform, the *TeamPOS 3600 Series* leverages Intel components, standard operating systems, and software applications. It supports standard PC components such as high-performance CPU's, memory, hard disk, video and audio. It can be used as a PC to run standard PC applications, such as word processing, spreadsheets, etc., subject to operating system and licensing restrictions. This controller offers dual 3.5" hard disk drives, on board LAN, USB, optional Powered USB and Legacy I/O boards and a variety of operating systems. The *TeamPOS 3600 Series* also contains functionality required by retail application software and is "retail hardened" to support the harsh environments found in most retail stores. Depending on the application requirements, there are a very large number of possible configurations. Memory capacity, number of hard disks, CPU speed, and the number of powered RS232 and USB ports, storage devices (such as CD-RW/DVD drive), and operating systems are selectable by the customer.

1.1 TeamPOS 3600 Series Controller Flow Diagram







1.2 Front Panel LEDs and Switches

The following graphic and table show the *TeamPOS 3600 Series* unit LEDs and switches:



1.2.1 TeamPOS 3600 Series Front Panel Switch

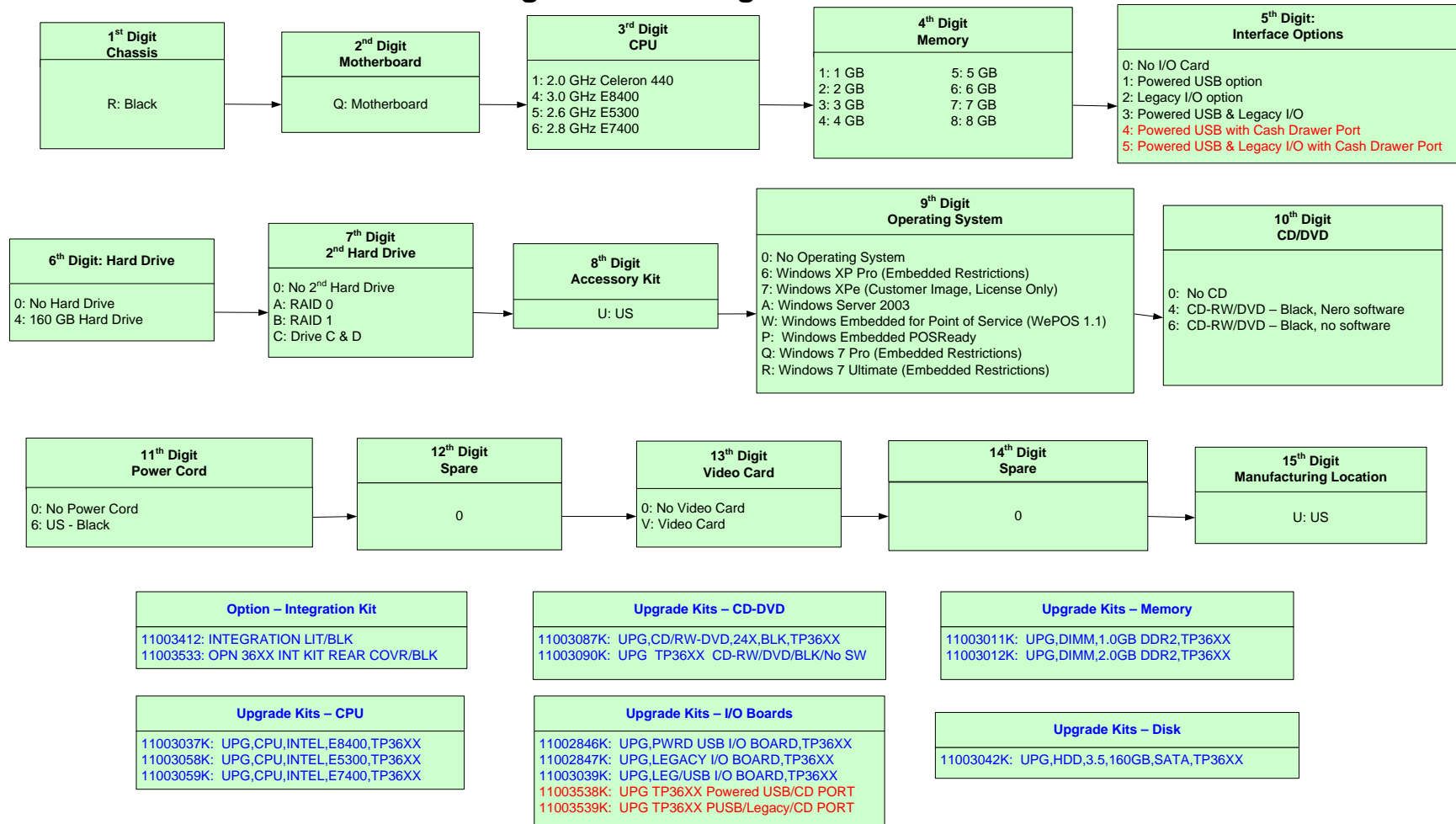
Symbols	Name Switch/LED	Mounting Position	LED Color	Remark
	Power Switch	Outside front panel	--	Depending on the CMOS setup, the power switch can be instant off or delayed off, when unit is powered on.
	Power LED	Outside of front door.	Green	Indicates AC power is supplied to the power supply and all DC voltages are available to the motherboard and other devices.
	HDD LED (Hard Disk Drive)	Outside front panel door.	Green	Indicates hard disk drive activity.
	USB	Inside front panel door.	--	USB ports with +5V power supplied when AC power light is "ON"



Caution: It is assumed that the user of this manual fully understands and strictly adheres to proper Electrostatic Discharge (ESD) precautions. Failure to adhere to precautions can cause damage to this equipment. Always remove the power cord from the unit prior to performing any controller maintenance.

1.3 Intelligent PINs (Product Identification Numbers)

TeamPOS 3600 Series Controller Intelligent PIN Configuration Guidelines



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Chapter 2. Environmental Specifications



2.1 Environmental Specifications for TeamPOS 3600 Series

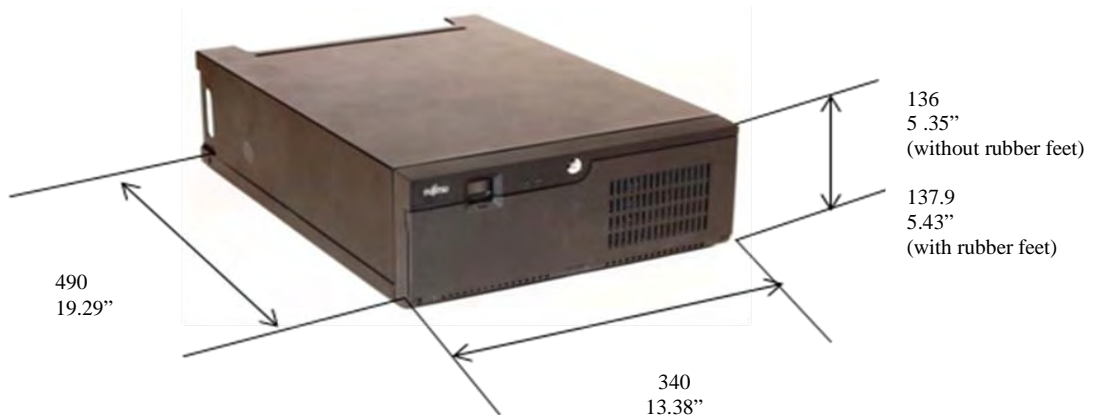
Specifications		TeamPOS 3600 Series
External dimensions mm (inches) / without rubber feet	Width	340 (13.38")
	Depth	490 (19.29")
	Height	136 (5.35")
Weight kg (lbs) (Full Configuration)		13 (26.7)
Maintenance area mm (inches)	Front	39.4
	Rear	39.4
	Right	39.4
	Left	39.4
Power requirements	Voltage	AC100-240
	Frequency	50/60Hz
Dissipation power (W) Max		350
Temperature °C (°F)	Operating	0~40°C 32~104°F
	Not operating	-5~50 °C 23-122 °F
Humidity (%) (Non-condensing)	Operating	10~90
	Not operating	8~95

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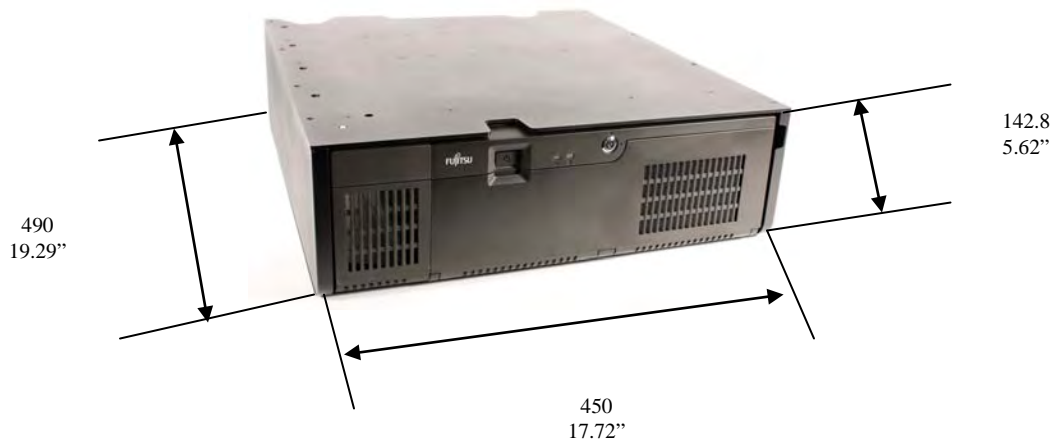
Chapter 3. Dimensions

This section shows the dimensions of the *TeamPoS 3600 Series* controller. For all peripherals, refer to the TeamPoS 3000 XL and XL² Installation and Maintenance Manual for their dimensions.

TeamPoS 3600 Series Controller



TeamPoS 3600 Series Controller and Integration Kit



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Chapter 4. Site Preparation

Note: The procedures in this chapter are intended for authorized service personnel only.

This chapter defines the pre-installation details for the *TeamPOS 3600 Series*:

- Shipment inspection and return
- Anti-static protection
- Electrical supply requirements
- Main power cables
- Warning labels
- The procedures assume that in-store wiring for the terminals, its peripherals, and terminal-to-terminal communications have been installed.

4.1 Unpacking/Inspecting the Shipment

TeamPOS 3600 Series terminals are thoroughly inspected prior to shipment; however, damage can occur during transit. Any damage to the terminal can lead to problems after installation. Before accepting a shipment, inspect all shipping containers for external damage. Ensure that all packages listed on the shipment billing form have been delivered.

- Verify that all the accessories listed on the packing list have been included in the shipment. If components are missing, contact your Help Desk for instructions. Then report shortages and damages to Customer Care. The customer needs to provide the sales order number and a description of the piece of equipment damaged. To contact Customer care call 1-800-780-5525 and a Customer Care representative will arrange for replacement. Customer Care is not responsible for equipment damaged by the customer after it is delivered. If the equipment is damaged during shipment then the liability falls upon the shipper.
- Inspect the exterior of each shipping box noting damage on the shipping documents so that the carrier has a record. Remove the unit and components from the box and check for damage. If the unit or components are damaged, contact your Help Desk for instructions.
- Inspect the exterior of each unit for any obvious physical damage (scratches or abrasions on painted or display surfaces, or on plastic surfaces) that could have occurred during shipping.
- Damaged equipment received from a source other than Fujitsu Foothill Ranch facility should be reported to the sender.

4.2 Reporting Shipment Damage

If any damage is detected, it is both the recipient's and the carrier's responsibility to note the damage. Follow all applicable policies and procedures for notifying the carrier, management, and Fujitsu of the damage, and for filing damage claims.

Please note that all components are packaged separately. Keep the packaging in case it is necessary to return any of the components.

4.3 Returning Equipment

All equipment returned to the factory must be packed in either the original container or a substitute container of equal strength and durability. Packing material, about 76.0 mm (3.0 inches) thick, should surround all protruding edges, switches, and surfaces. Parts shipped in a package separate from the unit must also be repacked and included in the return. Each return must include the following information:

- Description of the equipment defect
- RMA number (received from Customer Care representative)
- Order number
- Date received
- Name, address, and phone number of the person making the return

When returning whole unit *TeamPOS 3600 Series* controllers, the original shipping container is not adequate for non palletized shipments. Use the individual shipping container that you received the replacement controller in or package the unit in the original shipping container in a larger container with suitable packaging material. Damage caused by an inadequate shipping container will be the responsibility of the customer.

It is also very important that when returning controllers to restore them to their factory configuration, Fujitsu cannot guarantee that additional components and accessories returned with the controllers, such as memory, CD drives, add-in cards, etc. will be returned. If the returned configurations are missing items, such as memory, CD drives, add-in cards, etc. the customer will be charged the cost of returning the controller to its original factory condition.

4.4 Using Anti-static Protection

When installing and disassembling equipment, one must follow anti-static protection procedures. All controllers, terminals, peripherals, and boards are susceptible to damage due to electrostatic discharge. Insufficient anti-static protection when handling boards causes failure, degraded operation, and reduced reliability.



Caution: Avoid touching connector pins on data cables or units. Touching exposed connector pins could cause a discharge into the circuitry resulting in failed components.

4.5 Preparing for Installation:

Before installing equipment, perform the following steps:

- Move all terminal components, accessories, and cables to the locations specified in your local site plan.
- Position the cables according to the site plan. Make sure you have the correct data cable at each terminal location.
- Place the optional equipment next to the terminal to which it will be connected.
- Remove the shipping tape from those components that have been taped.

4.6 Determining Power Requirements

Electrical power to the equipment must comply with all local, state, and national wiring codes and meet the requirements described here. If you do not have qualified in-house personnel to ensure that power requirements are met, an electrical contractor familiar with computer equipment should be hired. This section provides the electrical supply data and main power cable information to prepare a site for the installation of the *TeamPOS 3600 Series* terminal. This product is also designed for IT power systems with phase-to-neutral voltage of up to 240V.

Before installing the terminal, check the power lines for loads that could cause large variations in voltage. Electrical devices that use a great deal of power such as air conditioners, elevators, copying machines and large motors can cause large drops in voltage. When severe electrical interference occurs, installing radio frequency (RF) filters, or an isolation transformer, or both may be necessary. If voltage surges caused by lightning are likely to occur, install an arrester.



Caution: To prevent data loss, do not plug other equipment that can produce sudden surges (i.e., vacuum cleaners) into the same power circuit as the terminal.

4.7 General Requirements

1. The safety standards for Information Technology Equipment are only valid if the building installation conforms to the National Electrical Code for the country where the equipment is being installed.
2. For equipment that has a pluggable connection to its power source, the power source outlet socket must be located near the equipment and must be easily accessible.
3. For protection against electric shock, certain parts of this equipment, including the interface connections have been designed so that the voltage is limited to a safe value. In order to maintain this protection it is essential that any equipment connected to Fujitsu products shall have interface connections which are similarly protected.
4. When installing and disassembling equipment, be sure to follow anti-static protection procedures. All controllers, terminals, peripherals, and boards are susceptible to damage due to electrostatic discharge. Insufficient anti-static protection when handling boards causes failure, degraded operation, and reduced reliability.

The following are general electrical supply requirements:

- Line noise limitations must not exceed 1250V with a maximum 1 μ s duration, and the repetition rate not to exceed 100Hz
- Socket outlets must provide protective earth grounding and be of a polarized type
- Before installing the terminal, check the power lines for loads that could cause large variations in voltage. Electrical devices that use a great deal of power such as air conditioners, elevators, copying machines, and large motors can cause large drops in voltage. When severe electrical interference occurs, installing radio frequency (RF) filters, or an isolation transformer, or both may be necessary. If voltage surges caused by lightning are likely to occur, install an arrester.
- Fujitsu supplied cables should be used to connect the system to the power supply outlet but, where this is not possible, the minimum requirement for the mains cables is as follows: For connection to 100-240V phase-to-neutral power supply systems; power supply cord to be rated at phase-to-neutral power supply systems; power supply cord to be unshielded and rated at 5 amps (minimum), 240 volts with one end terminated in a plug suitable for that location and the other end terminated in a mould IEC type CEE-22 female connector.
- This ITE (Information Technology Equipment) power supply is designed for use on a power system with an earthed neutral, i.e., a TN or TT power system. The terminals must not be directly connected to a power system with impedance earthed neutral, i.e., an IT power system.
- For pluggable equipment, the supply plug shall be connected as follows:

Black or Brown	Live (Hot)
White or Blue	Neutral
Green or Green-Yellow	Ground/Earth

To the User:

- DO read the operating instructions carefully before you attempt to use this equipment.
- DO ensure that the supply connector or isolator is readily accessible to enable isolation of the equipment
- DO ensure that a competently trained person checks that all electrical connections (including the supply plug and any extension leads) are properly made in accordance with the instructions.
- DO NOT allow the supply cord to be positioned where it may be snagged, crushed or stretched across a sharp edge.
- DO NOT continue to operate the equipment if you have ANY doubt about it working normally, or if it is damaged in any way. Instead, switch it off and, if the equipment is pluggable, remove the supply cord and contact your local service agent.
- DO NOT remove any fixed covers unless you are qualified / authorized to do so for the preparation of the equipment. There are no user serviceable parts under the covers unless expressly indicated in the equipment governing manual. Always remove the power plug from the power source before removing any covers, and ensure ALL covers are replaced and correctly secured before re-connecting the power plug.
- DO NOT obstruct any of the ventilation slots in the equipment. Obstruction of these slots can cause overheating, reduce equipment reliability and shorten the life of the equipment.
- DO NOT expose the equipment to spilled liquids
- DO NOT replace the power cable with a different type than is called up in the instruction documentation or supplied with the equipment.

Note: For model 3600 Series equipment the following warning applies:

The 24V powered USB port on the terminal does not meet UL/CSA limited power source (LPS) requirements. This port is limited to only allowing 24V Retail POS powered USB peripherals that do not exceed a rated current of 4 Amps and are provided with a molded plastic fire enclosure, rated min. 94V-1 or Metal enclosure. Peripherals intended to be connected via - jacketed cable for external use and marked VW-1 or FT-1.

If installed, the RJ25 connector (cash drawer port) on the powered USB PWB does not meet UL limited power source (LPS) requirements. This connector is limited to only allowing products that have an enclosure made of metal or made of material with a minimum flammability rating of 94V-1.

For more information or to download the latest manuals for your Fujitsu point of sales(s) equipment, please go to the Fujitsu website: <http://www.fujitsu.com/us/services/retailing/>

4.8 Installation with Other Equipment

In most cases, dedicated AC mains circuits are not required for the *TeamPOS 3600 Series* terminal. In rare instances, other electrical equipment sharing power with the terminal may cause adverse effects on the terminal. When this occurs, electrical isolation may be required and is the responsibility of the customer or installing contractor.

Terminals at 100-240 volts

The table below details the power requirements for the *TeamPOS 3600 Series* controller unit. Provide 100-240 volts AC, 50/60 Hz, single phase, with the following amperage requirements:

Property	Value or Description
Grounding	The terminals are Class 1 equipment and must be supplied via a socket outlet which has a protective ground contact connected to the protective ground of the terminal.
Power system	The terminals are designed for use on a power system with a grounded neutral, i.e., a TN or TT power system. The terminals must not be directly connected to a power system with impedance grounded neutral, i.e., an IT power system.
Rated voltage and frequency	100 - 240 volts, 50/60 Hz
Rated current	6A max
Operational frequency limits	47 – 63 Hz
Earth leakage current	< 1.0 mA
Power dissipation	350 watts
Maximum HRC fuse rating for external short-circuit protection	10 A / 20 A
Main power cord:	
Length	3.00 m (9.80 ft.)
Diameter	8.0 mm (0.30 in.)
Minimum bend radius	10.0 mm (0.40 in.)

4.9 Mains Power Cables

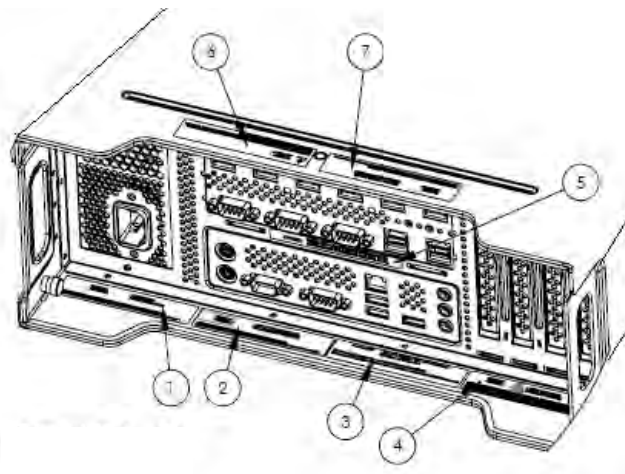
The mains power cable for the *TeamPOS 3600 Series* terminal is terminated with a plug suitable for the ordering country.



Caution: The power supply cord is used as the main disconnect device. Ensure that the socket-outlet is located/ installed near the equipment and is easily accessible.

4.10 Warning Labels

The equipment contains warning labels as shown below. Do not remove any warning labels. If these labels are damaged, soiled, or illegible, contact your local service agent to fix them.



①

CAUTION ATTENTION **FIRE HAZARD RISQUE D'INCENDIE**

CAUTION: TO SELECT PROPER POWER SUPPLY CORD, PLEASE REFER TO ATTACHED OPERATION MANUAL. ATTENTION: POUR CHOISIR LE CORDON D'ALIMENTATION QUI CONVIENT, CONSULTEZ LE GUIDE D'UTILISATION CI-JOINT.

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⑤

CAUTION ATTENTION

CAUTION: WHEN GREEN LED IS ON, STANDBY POWER IS ACTIVE. DISCONNECT THE AC-CORD BEFORE SERVICING. ATTENTION: LORSQUE LA DEL VERTE EST ALLUMÉE, L'APPAREIL EST SOUS TENSION EN MODE DE VEILLE. DÉBRANCHEZ LE CORDON D'ALIMENTATION AVANT DE PROCÉDER À L'ENTRETIEN.

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②

CAUTION ATTENTION **RISK OF ELECTRIC SHOCK RISQUE D'ÉLECTROCUTION**

CAUTION: HAZARDOUS VOLTAGE. SERVICE ENGINEER ONLY TO OPEN COVER. ATTENTION: TENSION DANGEREUSE. SEUL UN TECHNICIEN DE SERVICE QUALIFIÉ PEUT ENLEVER LE COUVERCLE.

CM-1

⑥

CAUTION ATTENTION **RISK OF ELECTRIC SHOCK RISQUE D'ÉLECTROCUTION**

CAUTION: HAZARDOUS VOLTAGE. SERVICE ENGINEER ONLY TO OPEN COVER. ATTENTION: TENSION DANGEREUSE. SEUL UN TECHNICIEN DE SERVICE QUALIFIÉ PEUT ENLEVER LE COUVERCLE.

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③

FCC Model: 3600 Tested To Comply With FCC Standards For Home or Office Use

This Class B digital apparatus complies with Canadian ICES-003. Cet appareil numérique de la classe B est conforme à la norme NMB-003 au Canada.

CM-1

⑦

CAUTION SWITCH OFF MAIN POWER BEFORE INSTALLING OR REMOVING PERIPHERALS ON SERIAL PORTS.

CM-1

④

CAUTION ATTENTION **RISK OF EXPLOSION RISQUE D'EXPLOSION**

CAUTION: DANGER OF EXPLOSION IF BATTERY IS INCORRECTLY REPLACED. REPLACE ONLY WITH THE SAME OR EQUIVALENT TYPE RECOMMENDED BY THE MANUFACTURER. RECHARGEZ LES BATTERIES ACCORDING TO THE MANUFACTURER'S INSTRUCTIONS. ATTENTION: IL Y A DANGERS D'EXPLOSION SI LA BATTERIE N'EST PAS REMPLACÉE CORRECTEMENT. REMPLACEZ UNiquement AVEC UNE BATTERIE DU MÊME TYPE OU D'UN TYPE RECOMMANDÉ PAR LE FABRICANT. RÉCYCLES LES BATTERIES USAGÉES CONFORMÉMENT AUX INSTRUCTIONS DU FABRICANT.

CM-1

Chapter 5. Installation

Note: The procedures in this chapter are intended for authorized service personnel only.



Caution: Confirm that the external power source is 100-240 VAC before starting the operation. To prevent electric shock, confirm that the AC cable is removed from the AC outlet anytime the panels are removed. Be sure to observe all ESD precautions and power OFF procedures.

5.1 Front Panel Opening/Installation Process

In many cases, the *TeamPOS 3600 Series* controller will be fully configured from the factory or at configuration centers. Others will be configured during installation. This section shows how to access the controller components to add or change configurations.

5.1.1 Front Panel

Opening the front panel gives access to the disk drives and CD-RW/DVD drive.



Caution: Be sure to observe all ESD precautions and power off procedures.

1. To open the front panel, use your assigned key to unlock the front door. Next open front door by pulling forward either side.



Note: Removing the key when in the unlocked position allows access without the key.



2. To close lift the front door and push both sides until it is firmly seated in place
3. Use the keys to then lock the front door.



5.2 Removing the Motherboard Tray Assembly



Caution: Be sure to observe all ESD precautions and power off procedures.

1. Disconnect the AC power cord from the controller.
2. Pull the release tabs out on both sides and turn them to disengage the lock.



3. Grab the side handle by the index finger to the ring finger, and put the thumb on the top cover.



4. Pull the entire assembly out of the controller by holding the top cover by the thumb and pulling the side handle.



5. To reinstall, slide the motherboard assembly back into the chassis.
6. Push in firmly until motherboard assembly engages then lock into place by releasing the locks on the rear of the controller.



7. Reconnect the power cable.

5.3 Installing the Hard Disk Drives



Caution: Be sure to observe all ESD precautions and power off procedures.



Caution: Hard disk drives come pre-installed and tested in their tray from the factory. Replacing the disk drive with other manufacturer disk drives is not supported by Fujitsu. It is highly recommended that only trained service personnel replace the hard disk drives.

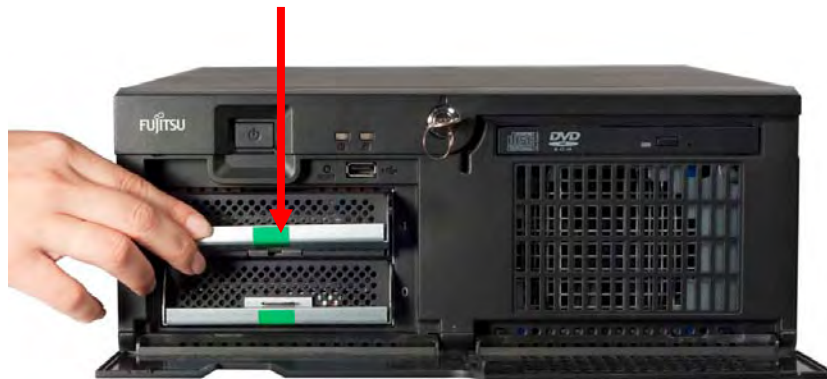
1. Open the front panel.(See Section 5.1)
2. Remove the disk drive filler plate from the controller chassis.
3. Attach hard disk drive to hard drive bracket by pulling on the release band on both sides in order for the drive to fit and secure itself in the hard drive bracket. When the released band is pulled, the pins that hold the drive in place will retract in order for the drive to slide into place.



- Slide the hard drive into the controller hard drive slot until it cannot go in any further.



- Press down firmly on the latch to make the drive lock in place.



- Close the front panel (See Section 5.1).

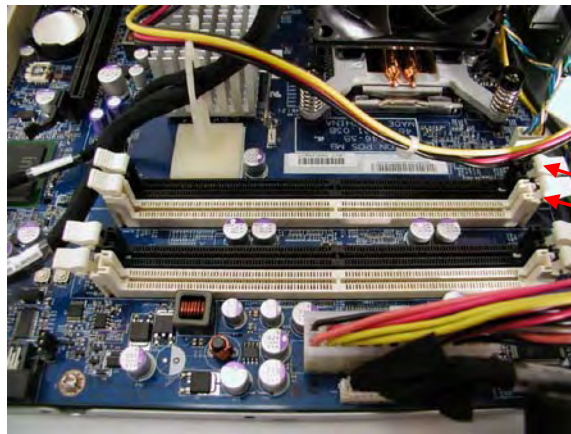
5.4 Installing Memory



Caution: Be sure to observe all ESD precautions and power off procedures.

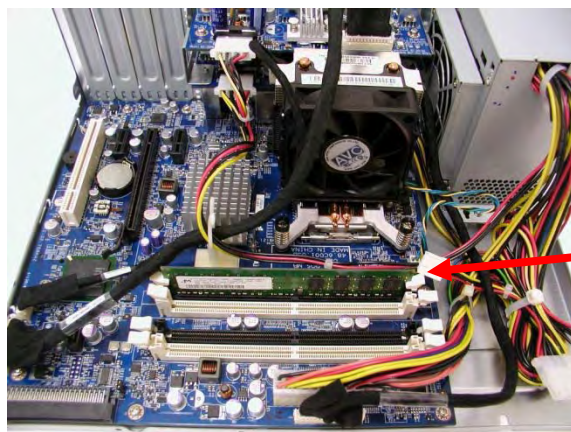
The *TeamPOS 3600 Series* motherboard has four memory sockets or slots that can use 1GB or 2GB DDR2 memory in any combination.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard tray assembly (See Section 5.2).
3. Insert memory (or additional memory) into an empty socket. (There is only one way the memory stick will fit.)



Install memory in this order

4 Memory socket
Slot 0: first memory
Slot 1: third memory
Slot 2: second memory
Slot 3: fourth memory



With memory in socket 0

4. Push down on memory until both sides lock into place. Check to make sure that both levers for the socket are seated towards the center.
5. Reinstall the motherboard assembly (See Section 5.2).

5.5 Installing the CD-RW/DVD Drive



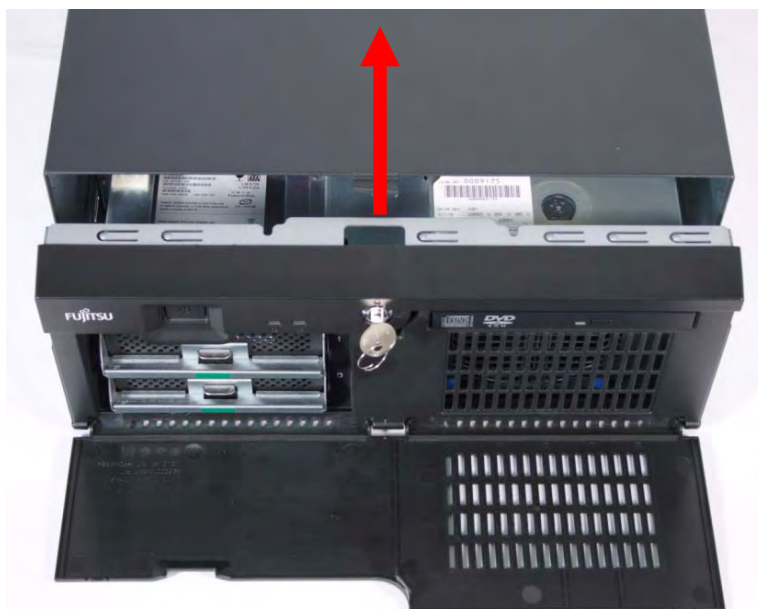
Caution: Be sure to observe all ESD precautions and power off procedures.

1. Disconnect the AC power cord from the controller.
2. Remove the top cover by first unlocking the front key lock and depressing the buttons on either side of the controller. (2~3 mm, 0.1 inch).

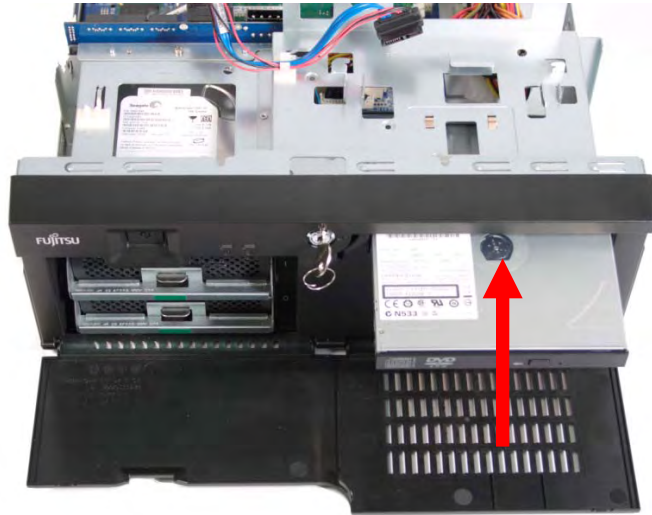


Depress this button
on both sides

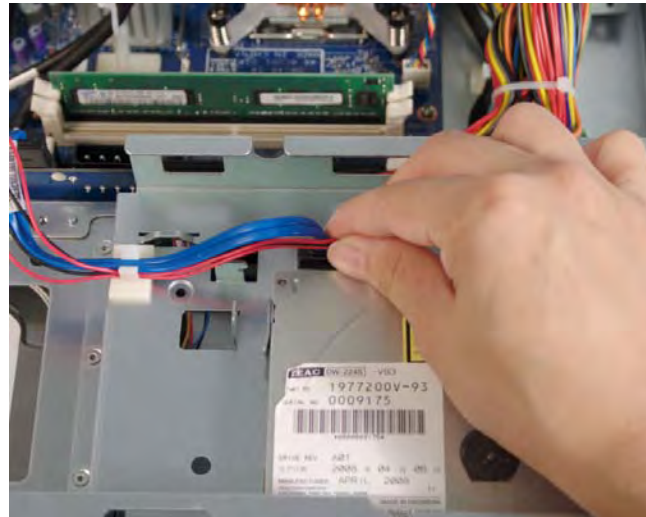
3. Slide the cover back while depressing the buttons, and then lift up and take off.



4. Remove the filler plate from the CD-RW/DVD drive slot
5. Slide the CD-RW/DVD drive into the slot from the front of the controller



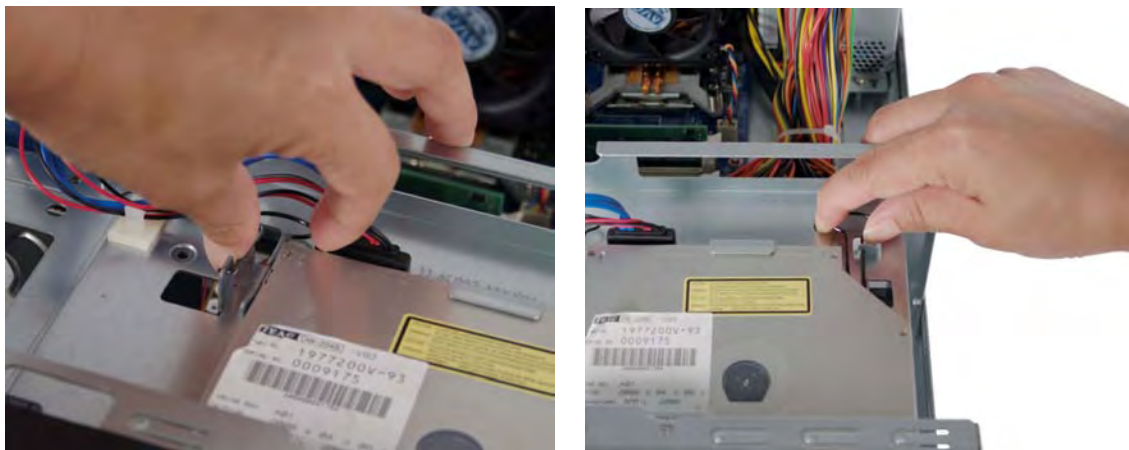
6. Insert CD-RW/DVD drive connector into the rear of unit.



7. Insert the other side of CD-RW/DVD drive cable connector into the connector on the chassis.



8. Insert the retaining clips into both sides of the drive in the rear and then snap into place



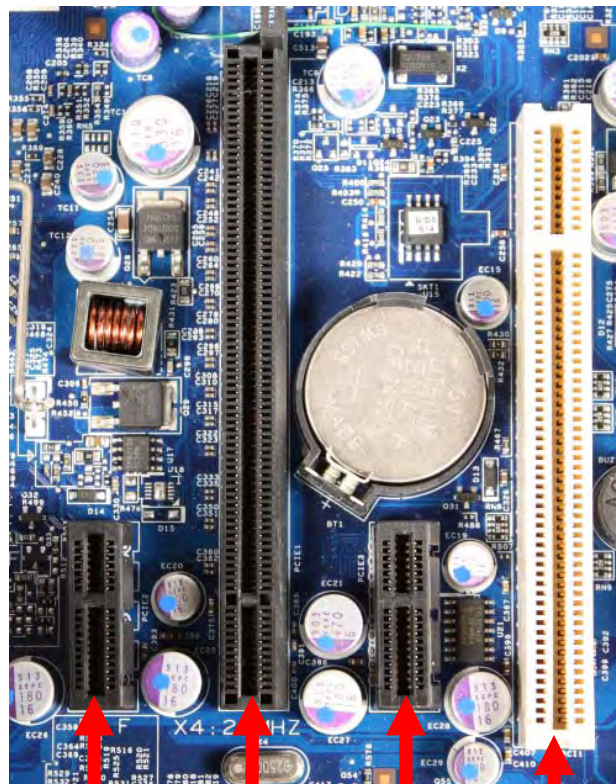
9. Secure the cover of the controller back into place.

5.6 Installing PCI and PCI Express Add-In Card(s)



Caution: Be sure to observe all ESD precautions and power off procedures.

Viewing the backplane assembly from the rear, there are four vertical slots on the right hand side for four PCI cards.



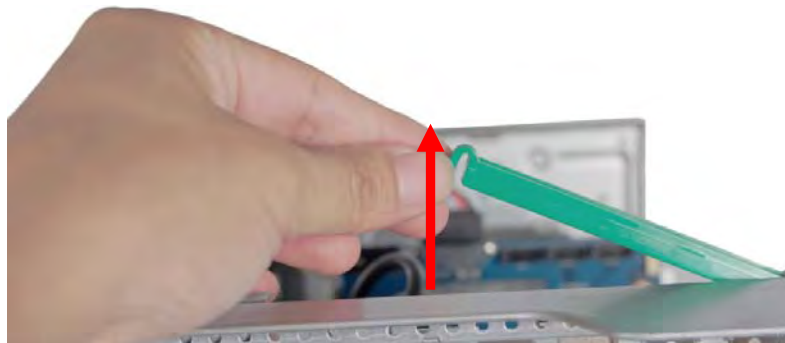
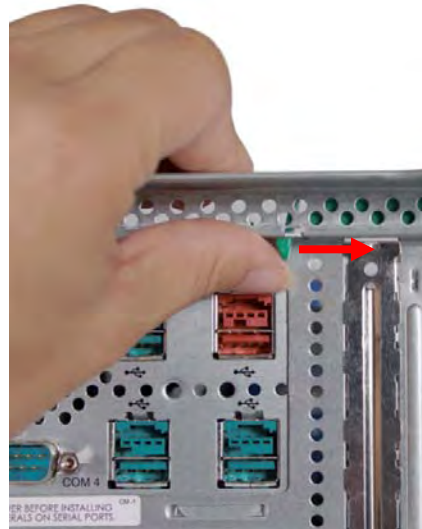
PCIe x1

PCIe x16

PCIe x1

Standard
PCI

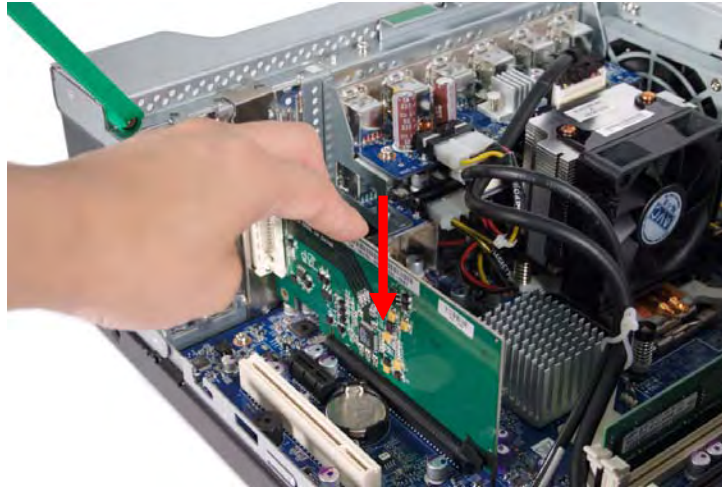
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See section 5.2) or the top cover (See section 5.5).
3. Unlatch the locking arm from the PCI card slots.



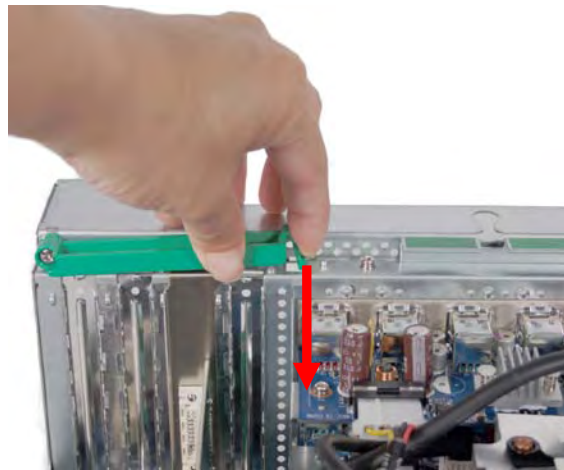
4. Remove the appropriate PCI filler plate by pushing it out away from the chassis.



5. Insert the PCI card into the slot and seat firmly. If installing PCIe cards only use low profile cards.

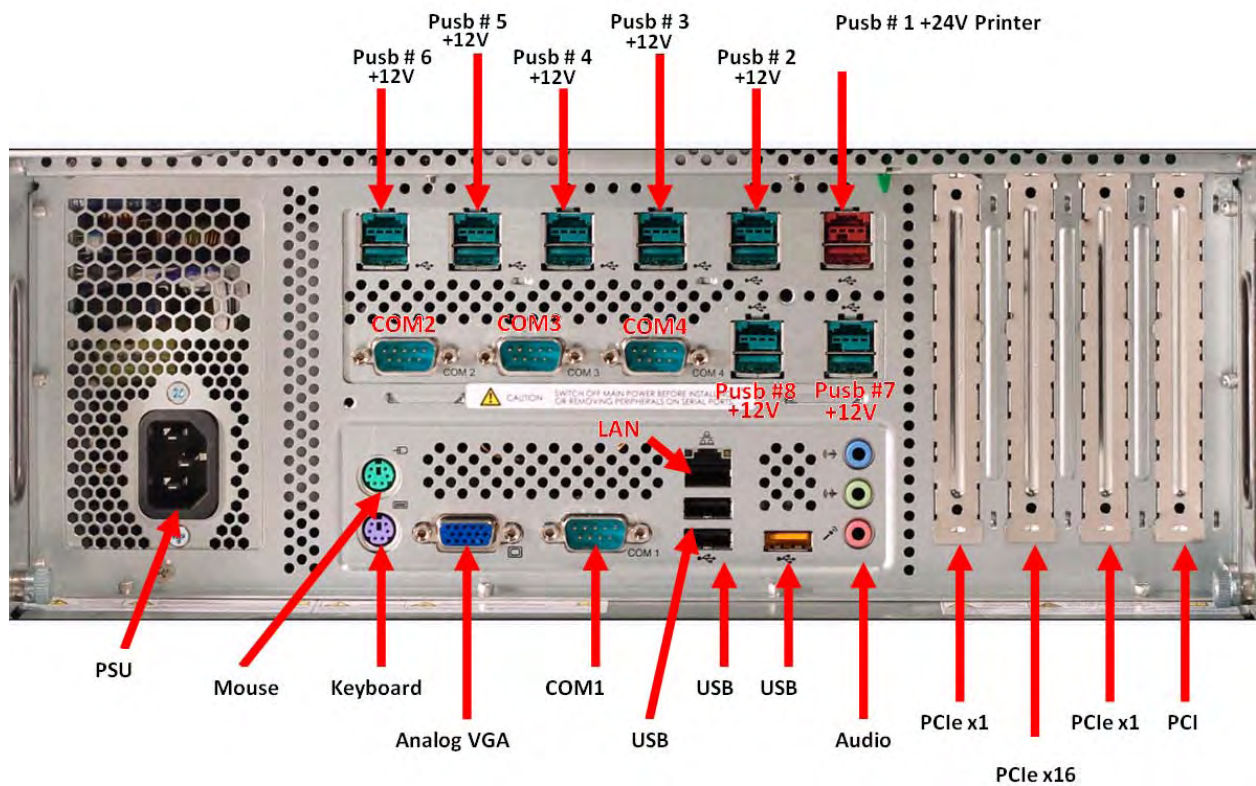


6. Secure the PCI locking arm back into place.



7. Reinstall the motherboard assembly or top cover and secure into place.

5.7 Installing the I/O boards



TP3600 Back Panel at a Glance



Caution: Be sure to observe all ESD precautions and power off procedures.

The following I/O board options are available on the *TeamPOS 3600 Series*

1. No I/O board.
2. Powered USB I/O board (one board with 6 powered USB ports).
3. Legacy I/O board (one board with 3 RS232 ports and 2 powered USB ports)
4. Powered USB / Legacy I/O board (8 powered USB ports and 3 RS232 ports).
5. Powered USB with Cash Drawer Port (one board with 5 powered USB ports and one RJ25 Port)

6. Powered USB with Cash Drawer and Legacy I/O Board (7 powered USB ports and one RJ25 Port and 3 RS232 ports)

5.7.1 No I/O Board

Backplane assembly will have one filler plate that covers the entire I/O board opening.



5.7.2. Powered USB/Legacy I/O Board

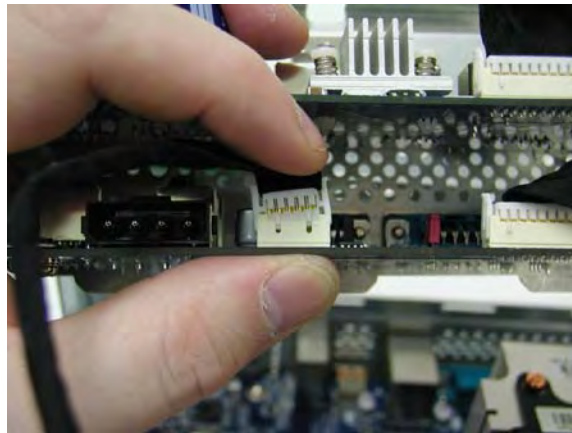
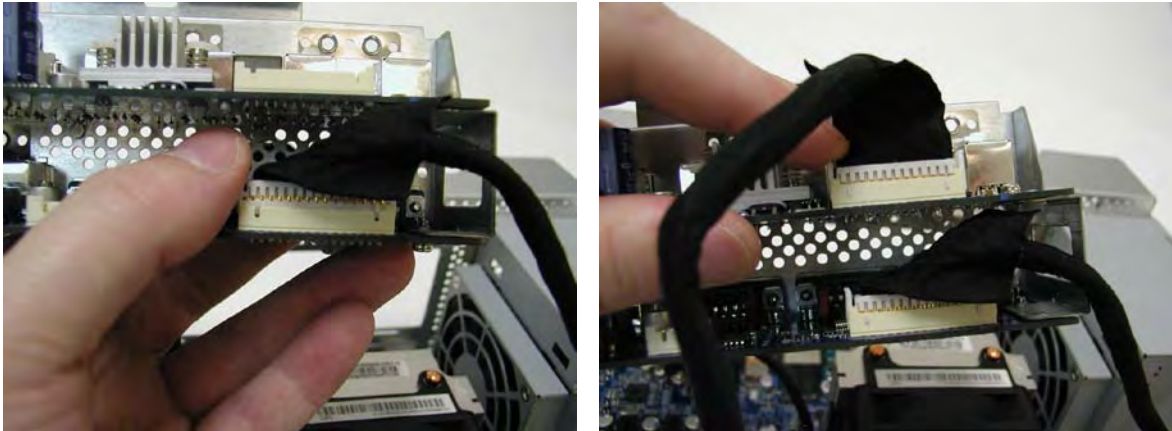


Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB / Legacy I/O board has 8 powered USB connections installed and 3 RS232 ports.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).

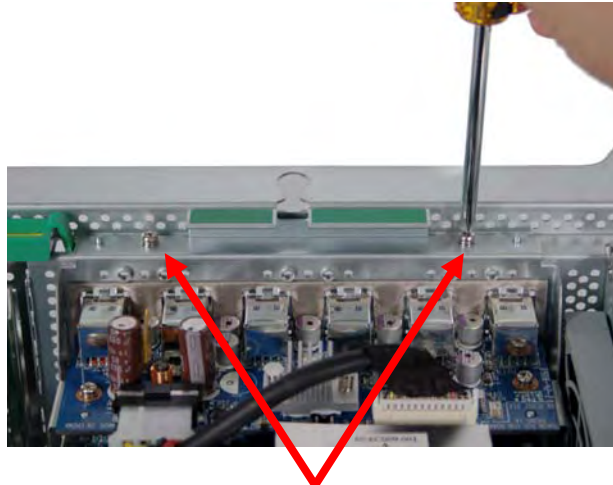
3. Connect the data cables to the I/O board



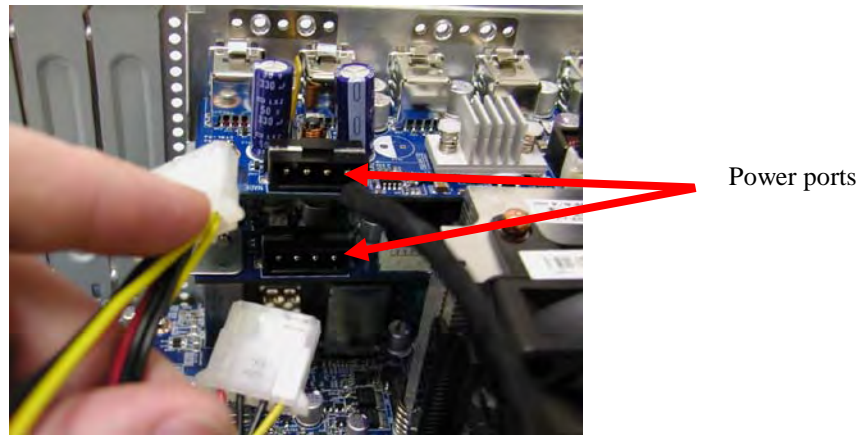
4. Insert the I/O board into the fitted slots on the motherboard assembly.



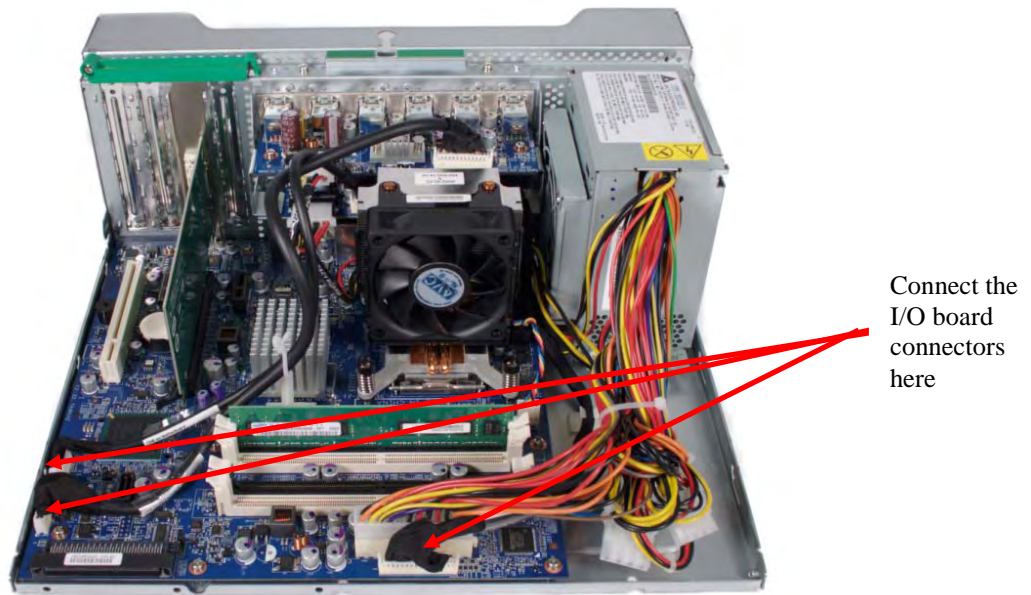
5. Secure the I/O board with two screws.



6. Connect the power cables to the I/O board.



7. Connect the 3 I/O cables to appropriate slots on the motherboard.



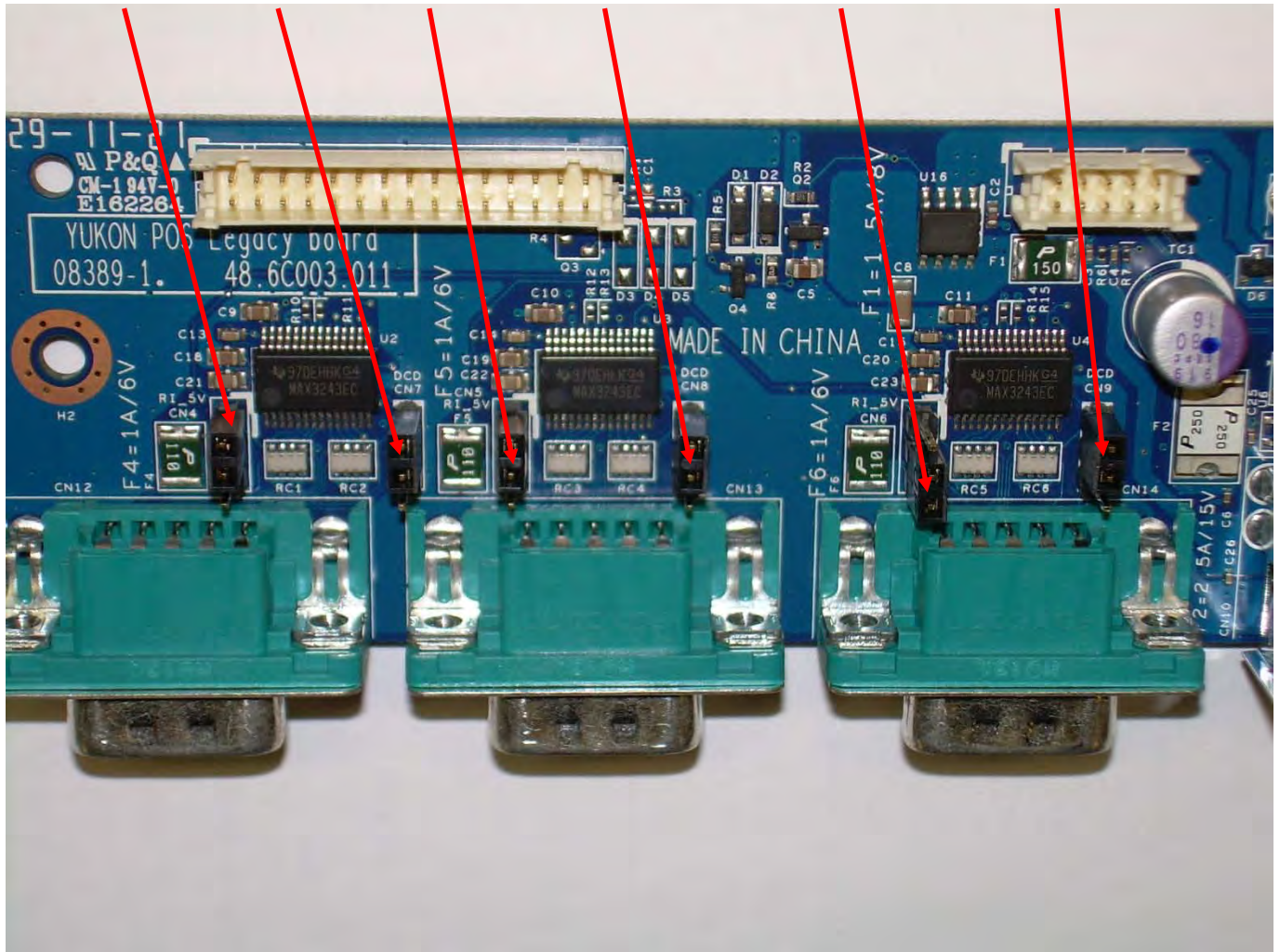
8. Reinstall the motherboard or top cover assembly.

5.7.2.1. Legacy Board Layout

The COMM board contains six jumpers. Three of the jumpers (CN4, CN5, & CN6) will either provide +5 V on pin 9 of DB9 connector or provide the RI signal on that pin. Default is set as RI on that pin. Jumpers CN7, CN8, and CN9 enable the DCD signal on pin 1 of the DB9 connector and should remain in this default position.

The Jumper CN6 shown in below picture is between pin 2 and pin 3.

JUMPER CN4 JUMPER CN7 JUMPER CN5 JUMPER CN8 JUMPER CN6 JUMPER CN9



5.7.3. Powered USB I/O Board



Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB I/O board has 6 powered USB connections installed.

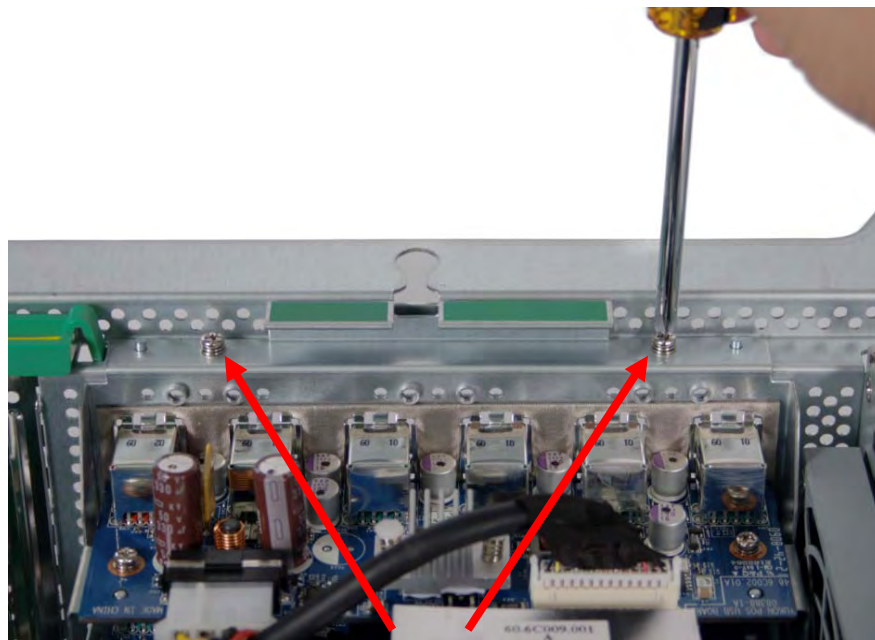
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Connect the data cable to the I/O board



4. Insert the I/O board into the fitted slots on the motherboard assembly.



5. Secure the I/O board with two screws.

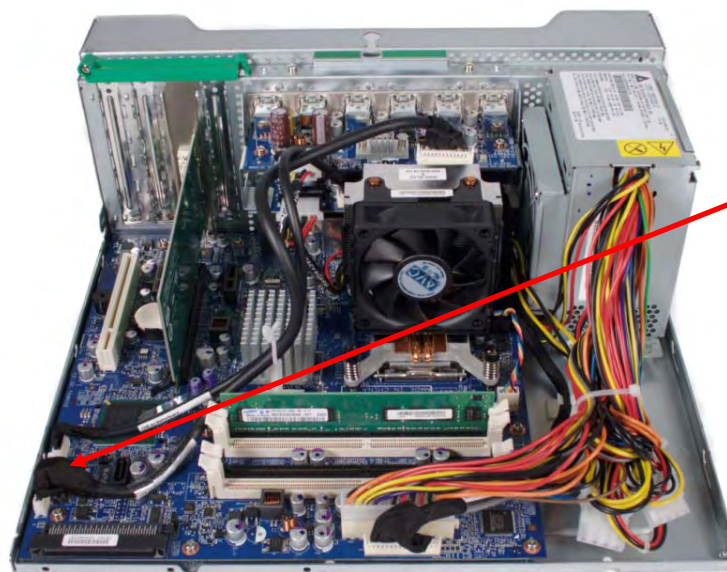


6. Connect the power cable to the I/O board.



Power ports

7. Connect the I/O cable to appropriate slot on the motherboard.



Connect the I/O board connector here

8. Reinstall the motherboard or top cover assembly.

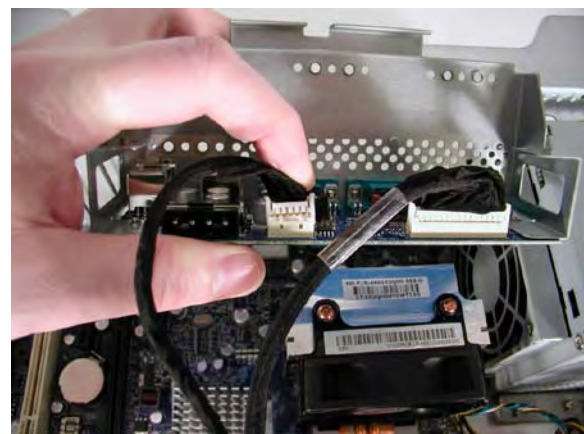
5.7.4. Legacy I/O Board



Caution: Be sure to observe all ESD precautions and power off procedures.

The Legacy I/O board has 2 powered USB connections installed and 3 RS232 ports. For Legacy I/O board jumper settings refer to section 5.7.2.1.

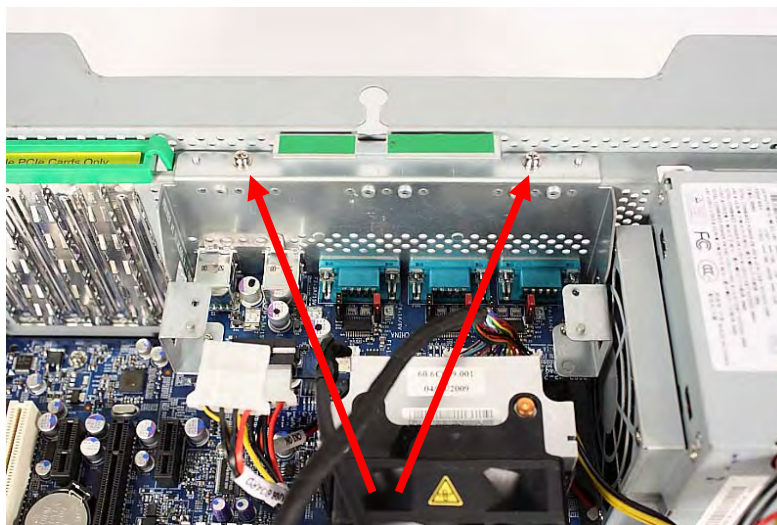
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Connect the data cables to the I/O board



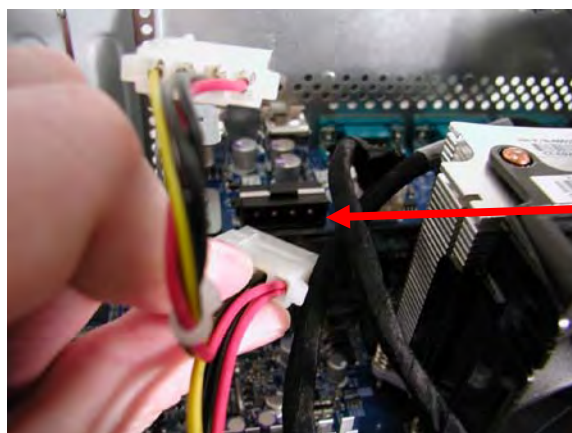
4. Insert the I/O board into the fitted slots on the motherboard assembly.



5. Secure the I/O board with two screws.



6. Connect the power cable to the I/O board.



Power ports

7. Connect the I/O cables to appropriate slot on the motherboard.



Connect the
I/O board
connectors
here

8. Reinstall the motherboard or top cover assembly.

5.7.5. Powered USB/Legacy I/O Board with Cash Drawer Port

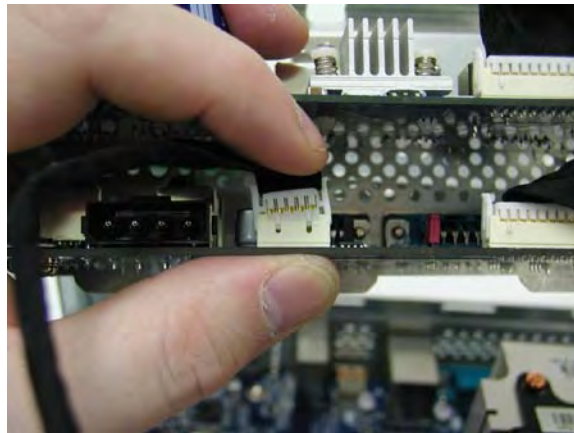
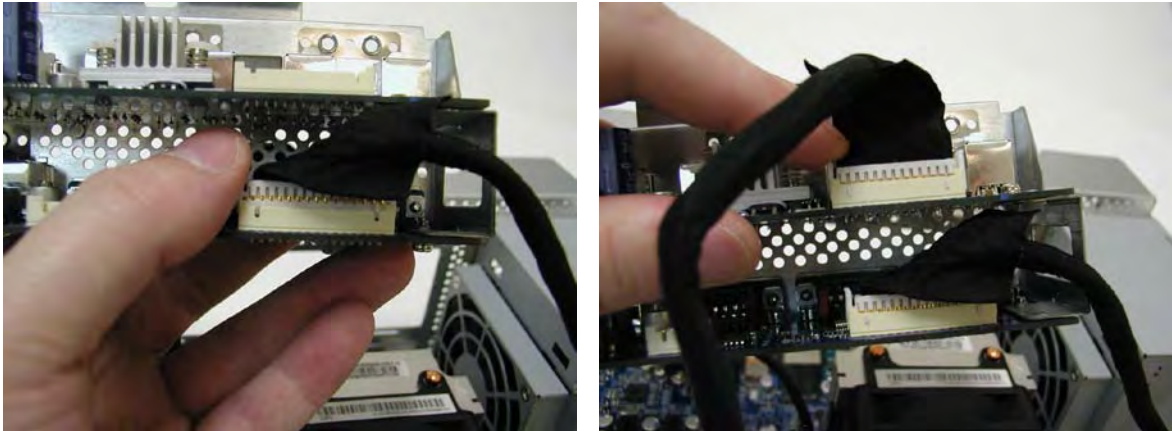


Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB / Legacy I/O board with Cash Drawer Port has 7 powered USB connections installed and 3 RS232 ports and 1 RJ25 port.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).

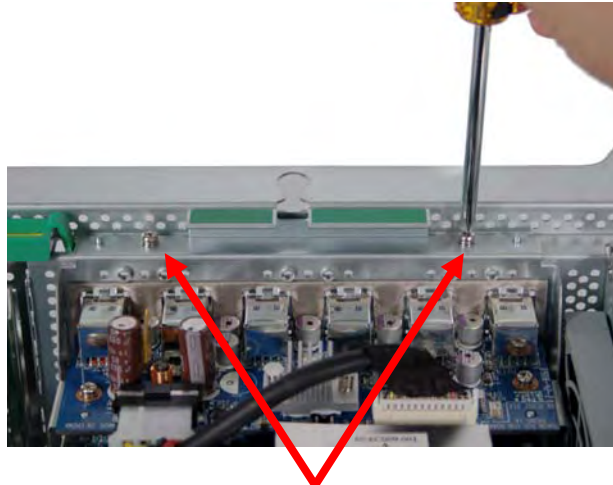
3. Connect the data cables to the I/O board



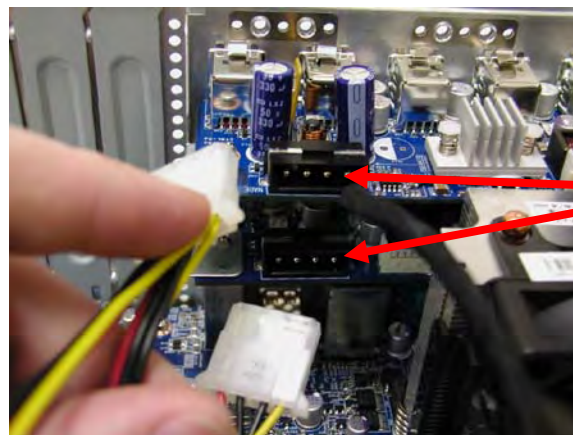
4. Insert the I/O board into the fitted slots on the motherboard assembly.



5. Secure the I/O board with two screws.



6. Connect the power cables to the I/O board.



Power ports

7. Connect the 3 I/O cables to appropriate slots on the motherboard.



Connect the I/O board connectors here

8. Reinstall the motherboard or top cover assembly.

5.7.6. Powered USB Board with Cash Drawer Port



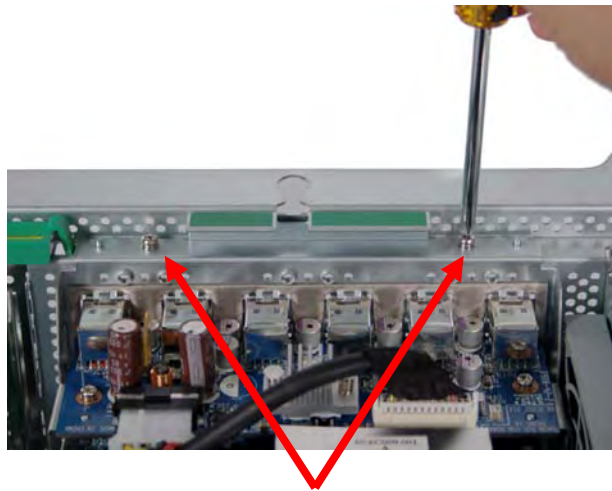
Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB / Legacy I/O board with Cash Drawer Port has 7 powered USB connections installed and 3 RS232 ports and 1 RJ25 port.

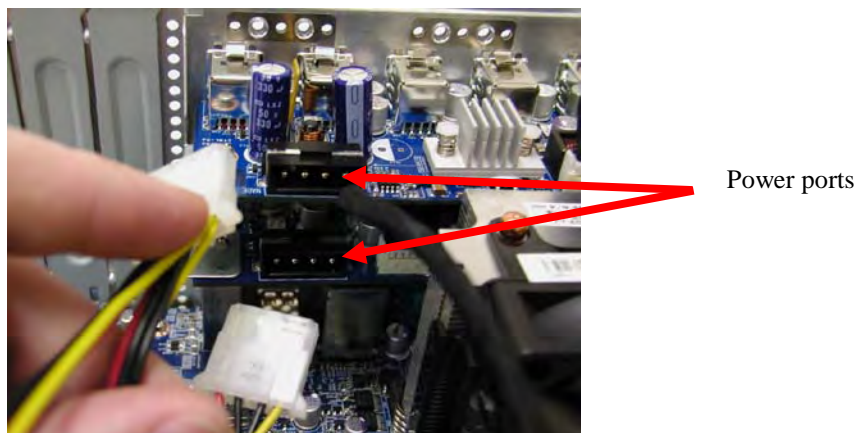
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Connect the data cables to the I/O board
4. Insert the I/O board into the fitted slots on the motherboard assembly.



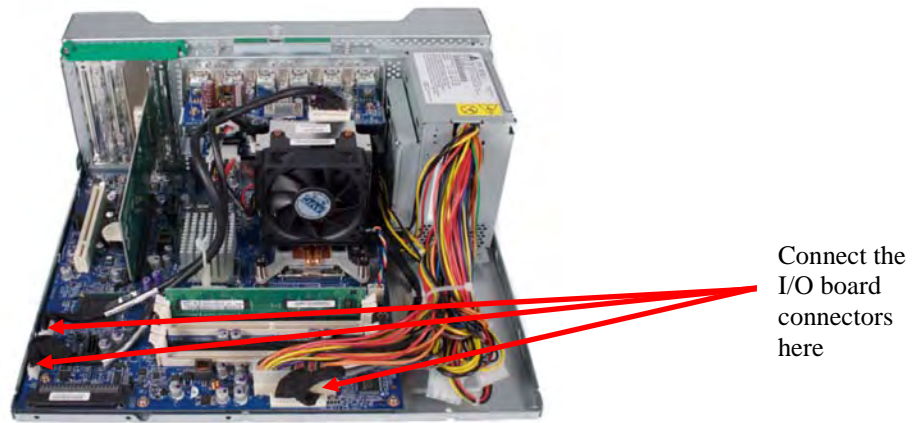
5. Secure the I/O board with two screws.



6. Connect the power cables to the I/O board.



7. Connect the 3 I/O cables to appropriate slots on the motherboard.



8. Reinstall the motherboard or top cover assembly.

5.8 Integration Kit Assembly and Controller Installation

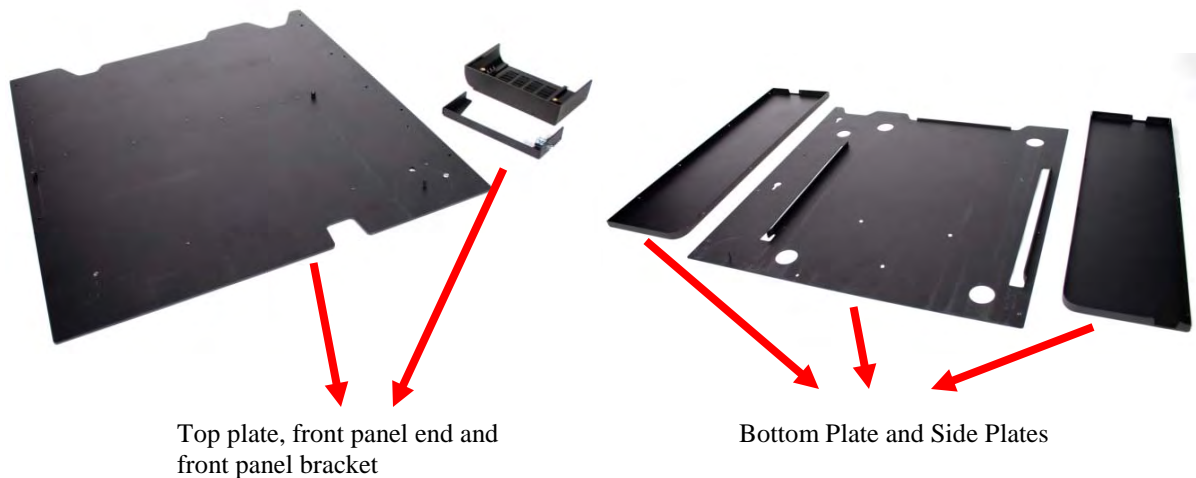
The integration kit is designed to contain the controller when the terminal is configured in a stacked condition. Six rubber feet are pre-installed on the bottom plate. Two spacers and two thumbscrews are provided for installation on top of cash drawers.



Note: Use the screws provided in the kit for attaching integration brackets and accessories.



1. Integration kit parts:





2. Assemble side plates together with the bottom plate by using the screws provided. Place bottom plate over the edge of a table to make installing the first side plate easier.



3. Assemble the front panel end and the front panel bracket together.



Screw the bracket together with the front panel

4. Place the assembled front panel end and bracket onto the bottom plate.



Insert the front panel bracket into the small pin on the bottom plate



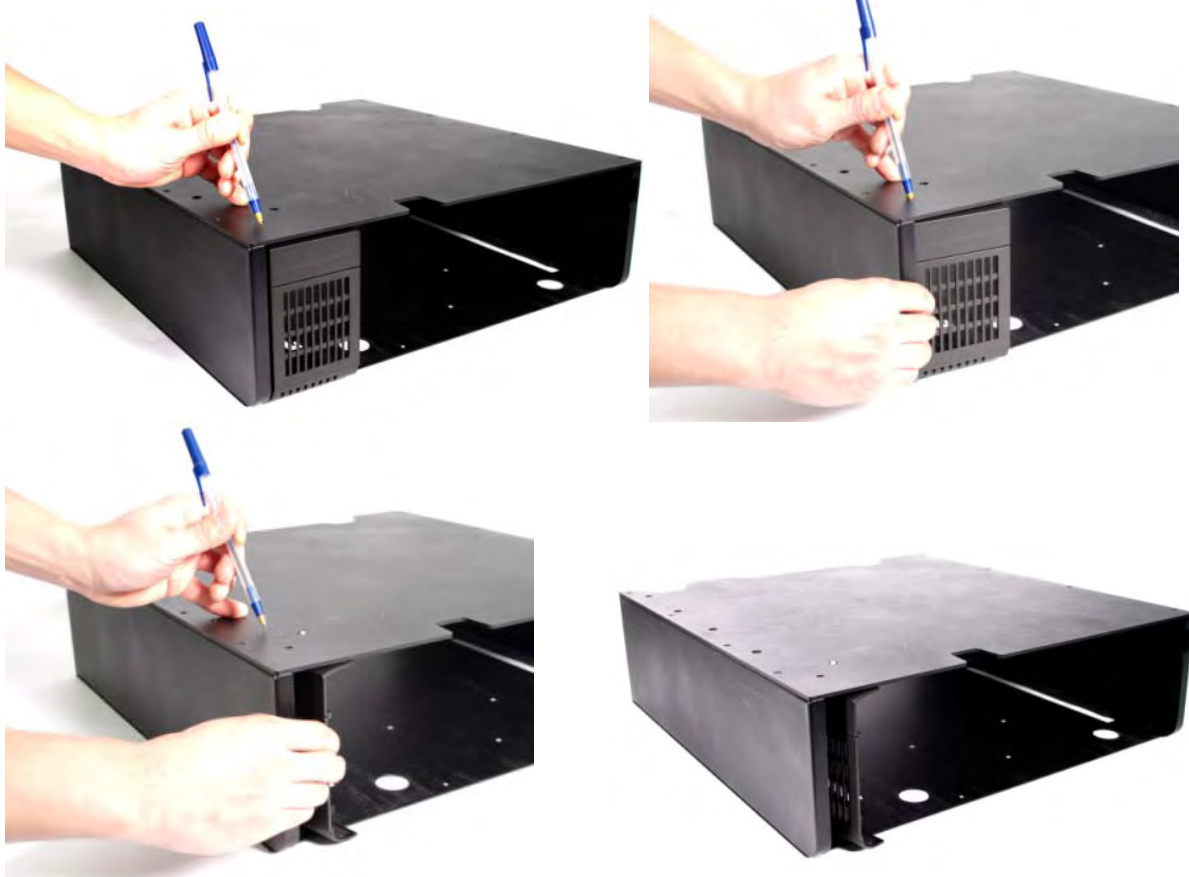
5. Place top plate and secure it with screws provided. Make sure the pin on the top plate is inserted into the front panel bracket.



6. Integration Kit assembly completed.



7. To insert TeamPoS 3600 Series controller, push down the spring loaded plunger with a pen or other tool and rotate the front panel clockwise until it locks into place.



Push down the spring loaded plunger with a pen or other tool and rotate the front panel clockwise until it locks into place



8. Remove the 4 rubber feet from the controller.



9. Slide the controller into the integration kit until it stops.



10. Then push the spring plunger down and rotate the panel counterclockwise back into position.



11. The panel should be locked in position and flush with the controller front panel.



12. Back panel is available if customers prefer to cover the rear end of the integration kit to provide cable security and pleasant visual presentation



13. Take the back panel and approach the rear end of the integration kit.



14. Note that there are two hooks on the back panel.



15. Make sure to attach the hooks on the back panel to the U opening on the rear end of the integration kit.



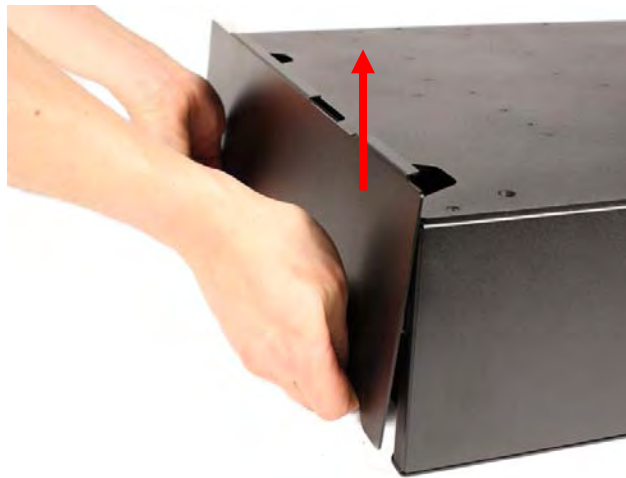
16. Push the panel down to secure the panel onto the integration kit.



17. Back panel installed



18. When removing the back panel, push up on the panel to release the hooks from the U opening



19. Remove the back panel.



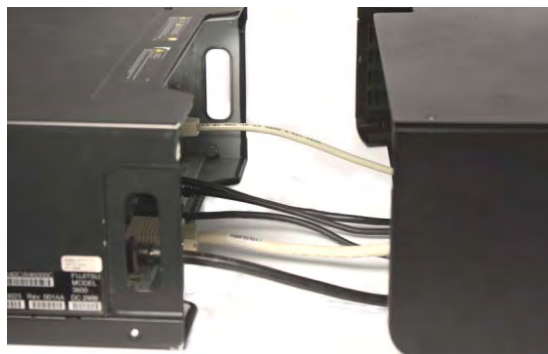
20. When removing the controller from the integration kit, if the cables are short, remove the cables at the back panels first.



21. And then either pull the controller from the front or push the controller from the back away from the integration kit for complete removal.



22. If the cables attached are long enough, they can be left on the controller when removing.



23. If you receive the shipment of the controller already installed in an assembled integration kit, remove the 3 security shipping screws at the bottom of the integration kit to allow the controller to be removed.



Chapter 6. General Operations

6.1 System Operations

This section contains general and periodic care and maintenance, and power ON and OFF procedures for the *TeamPOS 3600 Series* terminal.

6.1.1 General Care and Maintenance

General cleaning of the terminal is required on a regular basis. In particular, dust must be removed from external components, air vents, fans, and exhaust screens to allow sufficient airflow to maintain proper internal operating temperatures. The frequency of this cleaning depends on installed environments. Lack of this cleaning will greatly reduce equipment reliability.

To keep the terminal and its peripherals in good working condition, follow the guidelines in this section.

1. Wipe the terminal with a clean, soft cloth, dampened with water and mild soap. Never use abrasive pads or cleansers.
2. Make sure all cable connectors are securely installed on the terminal and peripherals to prevent the cables from being accidentally disconnected. Disconnecting and connecting cables (except USB cables) while the power is on could cause damage to the terminal and its peripherals.
3. Do not expose the terminal to liquids. Although the units are designed to resist liquids from entering the internal components, liquids should be kept away from the terminal.

6.1.2 Power ON and OFF Sequence

This section presents the general procedures for powering the *TeamPOS 3600 Series* controller ON and OFF. The instructions in this section assume that the terminal, operating system, and the application software have been installed. For any additional power on and off procedures dictated by the retail application, refer to the manuals provided with your PoS and application software.



Caution: With the exception of USB peripherals, never remove or connect any peripheral while power is on its port. To avoid damage to the controller and peripherals, when connecting and disconnecting RS232 peripherals from the I/O Boards, turn off the controller by depressing the *TeamPOS 3600 Series* power switch (in the front of the unit) or by disconnecting AC power.

6.1.3 Powering ON

1. Make sure all peripherals are securely connected to the controller.
2. Make sure the power cord is plugged into the power source.
3. Press the ON switch.



4. Confirm the power LED is ON and not blinking, indicating the successful completion of power-up diagnostics.

Any hardware errors detected on power up will appear on the operator display (CRT or LCD). Note that the Model VF60 two-line alphanumeric display does not display error messages.

6.1.4 Powering OFF

Note: Some peripherals, such as scanners and scales, may be separately powered.

1. Press the ON/OFF switch.

Note: Depending on the CMOS setting, a momentary depression of the switch may signal the application to shut the unit down, which could take a few minutes. If power is not immediately turned off, either wait for the application to shut the unit down, or keep the switch depressed for approximately 4 seconds. For proper shutdown procedures, see the application software documentation.

Chapter 7. Maintenance

Note: The procedures in this chapter are intended for authorized service personnel only.



Caution: Confirm that the external power source is 100-240 VAC before starting the operation. To prevent electrical shock, confirm that the AC cable is removed from the AC outlet anytime the covers are removed. Be sure to observe all ESD precautions and power OFF procedures.

7.1 Periodic Maintenance

The following procedures should only be performed by trained persons.

Vacuum all ventilation passageways on the controller and peripherals. Ensure that these passageways are open and free of dust and other debris that could restrict airflow. Check the Power Supply Unit fan for proper operation annually. See CMOS settings for typical fan speeds. If fan speed is below the normal level, the fan should be replaced. Fan speeds can be found under the hardware monitoring section of the CMOS.

7.1.1 Power ON and OFF Sequence

This section presents the general procedures for powering ON and powering OFF the *TeamPOS 3600 Series* controller. The instructions in this section assume that the terminal, operating system and the application software have been installed. For any additional power-up procedures dictated by the retail application, refer to the manuals provided with the application software.



Caution: With the exception of USB peripherals, never disconnect or connect a peripheral while power is on its port. To avoid damage to the controller and peripherals, when connecting and disconnecting RS232 peripherals from the I/O Board), press the *TeamPOS 3600 Series* power switch in the front of the unit or disconnect AC power.

7.1.1.1 Powering On

1. Make sure all peripherals are securely connected to the controller.
2. Make sure the power cord is plugged into the power source.
3. Press the ON switch.



4. Confirm the power LED is lit solid, indicating the successful completion of power-up diagnostics.

Note: Some peripherals, such as scanners and scales, may be separately powered. Check the peripheral manuals for instructions on powering on these peripherals.

Any hardware errors detected on power up will appear on the operator display (LCD). Note that the model VF 60 two-line alphanumeric display does not display error messages.

Note: Depending on setup, a momentary depression of the switch may signal the application to shut the unit down, which could take a few minutes. If power is not immediately turned off, either wait for the application to shut the unit down, or keep the switch depressed for approximately 4 seconds. For proper shutdown procedures, see the application software documentation.

7.1.1.2 Powering OFF

1. Press the ON/OFF switch.

Note: For proper shutdown procedures, see the application software documentation.

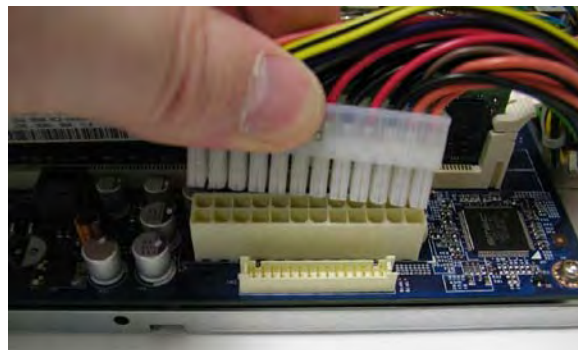
7.2. Replacing the Motherboard



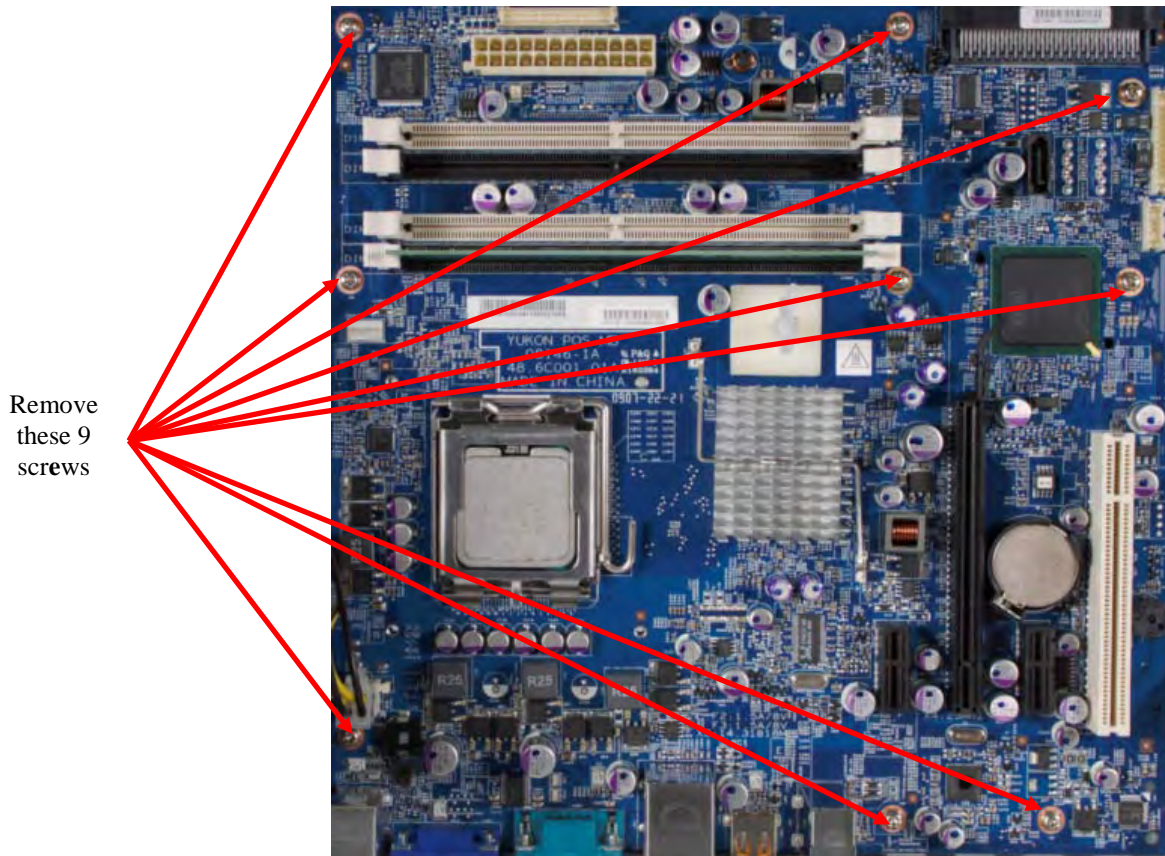
Caution: Be sure to observe all ESD precautions and power off procedures.

Before installing a new motherboard, ensure that the replacement motherboard jumpers have been set correctly. (See Section 7.2.1 Motherboard Layout)

1. Disconnect the power cable from the controller.
2. Remove the motherboard tray assembly (See Section 5.2) or the top cover (See Section 5.5).
3. Remove the CPU fan, heat sink, PCI and the I/O board (See Sections 7.3 and 7.8).
4. Disconnect the Power cords from the power supply



- Remove the nine screws that connect the motherboard to the chassis.



Note: Depending on your maintenance procedures, it may be necessary to remove the CPU, heat sink, memory and/or PCI cards from the old motherboard and reinstall on the new motherboard. See appropriate sections of this chapter for removal and replacement instructions.

Note: When replacing the CPU, do not reuse the existing heat sink without having proper heat sink compound for heat dissipation. Otherwise damage to CPU could result.

Note: When holding Motherboard, please hold the edge of PCB. Please don't touch any component on Motherboard.

- Insert the replacement board onto the chassis and secure with nine screws.

7. Reconnect the all disconnected devices. Reinstall any other optional hardware. See note above.
8. Reinstall the motherboard tray assembly or the top cover.

7.2.1 Motherboard Layout

CN3 jumper setting: 1-2: Normal
2-3: Clear CMOS



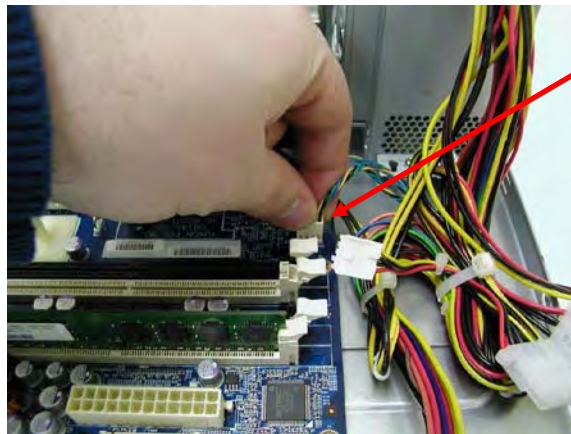
7.3 Replacing CPU and Heat Sink



Caution: Be sure to observe all ESD precautions and power off procedures.

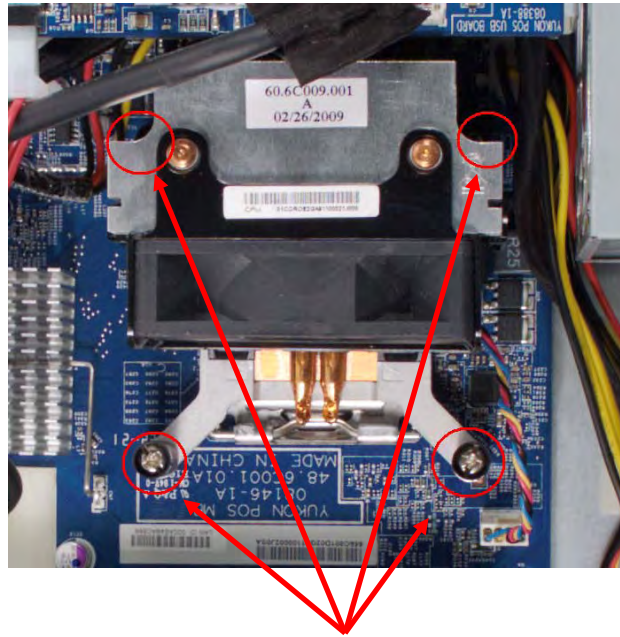
The heat sink and CPU are installed on the motherboard (towards the rear of the motherboard) just behind the memory. Both parts come in the same kit.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (see section 5.2) or remove top cover (see section 5.5).
3. Disconnect the power connector for the CPU fan.



Remove the fan power connector

4. Remove the heat sink by loosening the 4 spring-loaded screws that attach it to the motherboard.

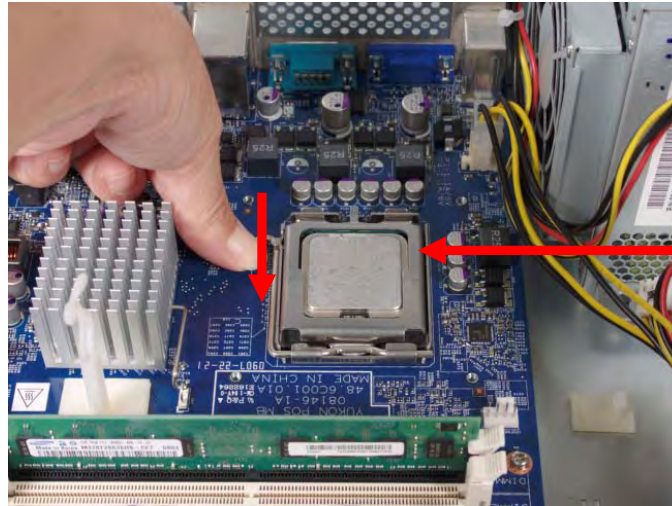


Remove these 4 screws



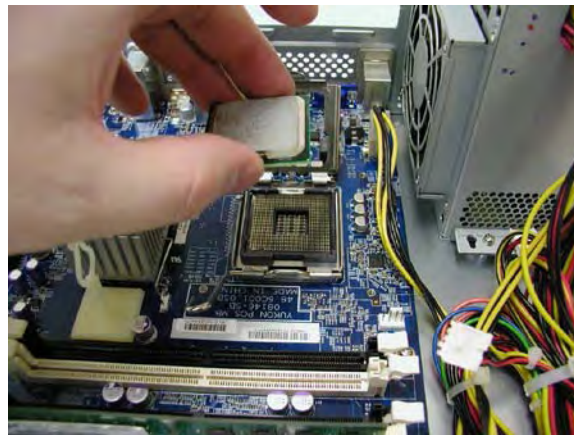
5. Open the CPU cover by pressing down on the lever to the left and unlatching it.

Push down and out to release the CPU latch



Open the cover to the CPU

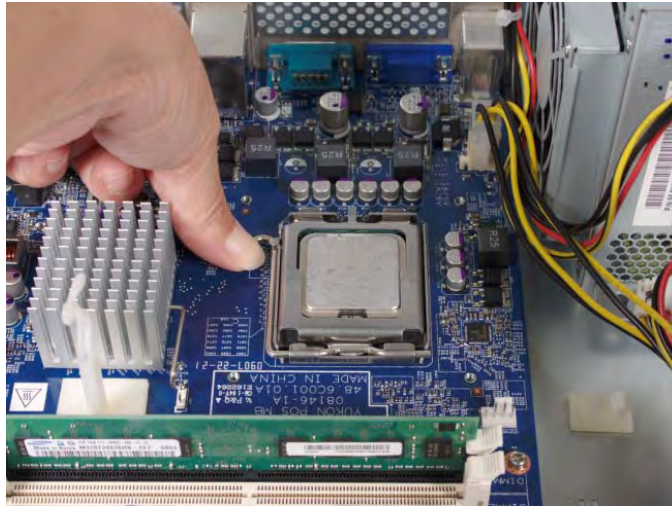
6. Place the new CPU on the CPU socket



7. Place the CPU on the socket with the arrow on the bottom left hand corner.

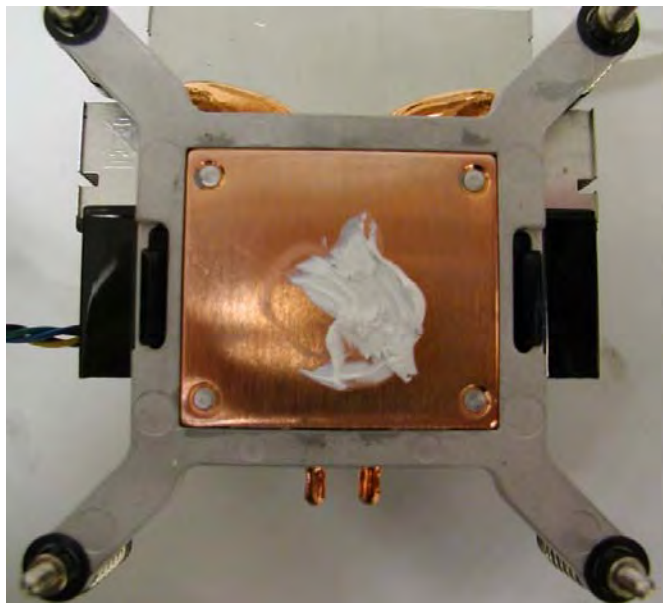


8. Close the CPU door by re-latching the cover.

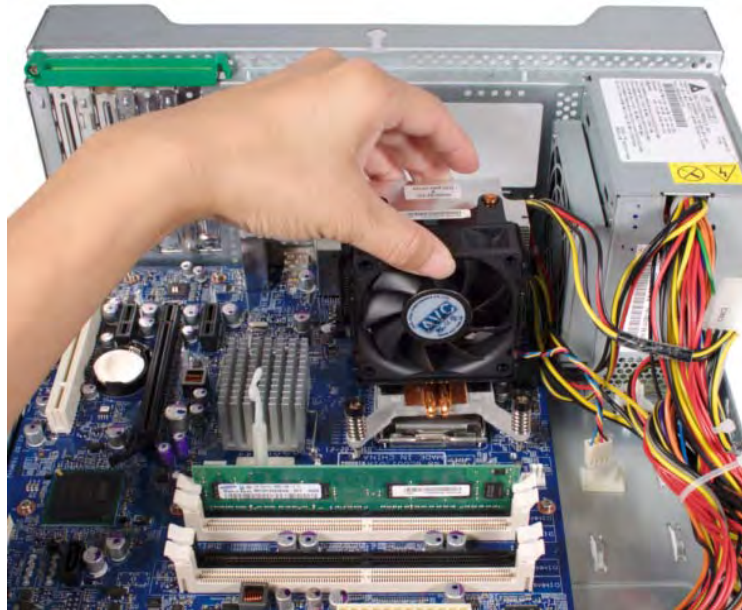


Note: When replacing the CPU, do not reuse the existing heat sink without having proper heat sink compound for heat dissipation. Otherwise damage to CPU could result. It is recommended to use **Arctic Silver 5 high-density polysynthetic silver thermal compound**.

9. Apply a small amount of heat sink compound to the bottom of the heat sink (cleaned with isopropyl alcohol) and spread it even on the center of the device.



10. Place the heat sink over the CPU with fins aligned front to back and secure the heat sink with the four screws attached to it. Grip the heat sink bracket to hold it in place while the spring-mounted screws are tightened. Then reconnect the heat sink fan power connector.



Warning: Do not plug or unplug the fan while the unit is powered on. Always power down before disconnecting.

11. Reinstall the motherboard assembly (See Section 5.2).

7.4. Replacing the Hard Disk Drives



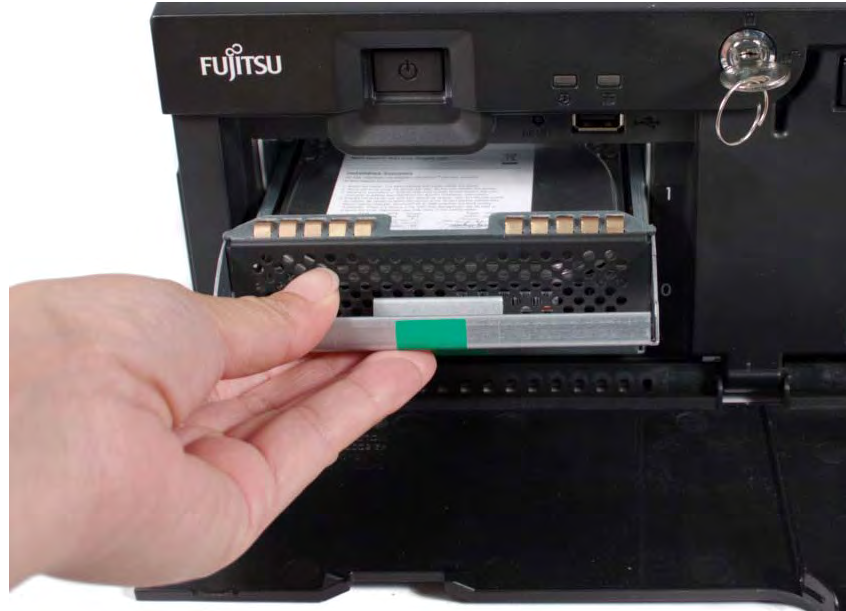
Caution: Be sure to observe all ESD precautions and power off procedures.

1. Open the front panel.(See Section 5.1)
2. Push down on the lever and then pull up on the latch to unlock the drive.

Push down on
the inside lever



3. Slide the hard drive out of the controller hard drive slot.



4. Pull on the release band on one side of the tray and then lift up and pull out.



5. Replace the drive with a known good one.

6. Attach hard disk drive to hard drive bracket.



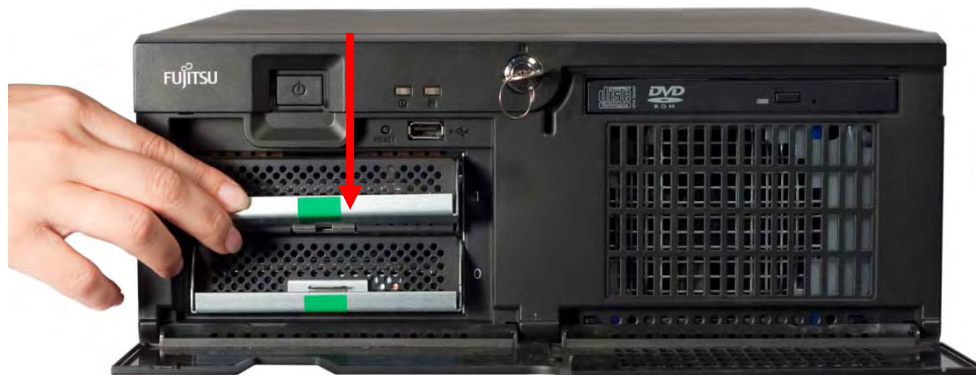
7. Pull on the release band in on one side of the tray and then slide the drive into the tray. Then repeat the process on the other side in order for the pins to lock into place on the drive.



8. Slide the hard drive into the controller hard drive slot until it cannot go in any further.



9. Press down firmly on the latch to make the drive lock in place.



10. Close the front panel (See Section 5.1).

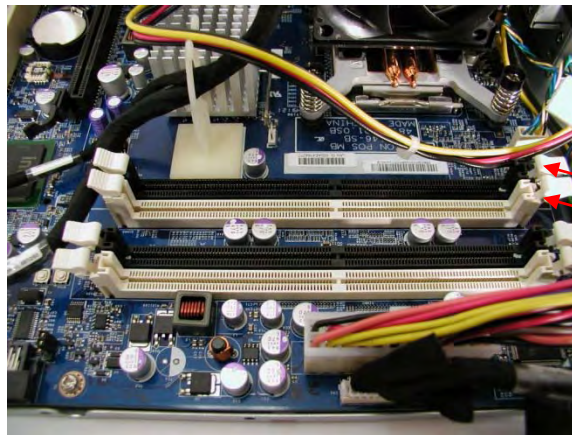
7.5. Replacing or Adding Memory



Caution: Be sure to observe all ESD precautions and power off procedures.

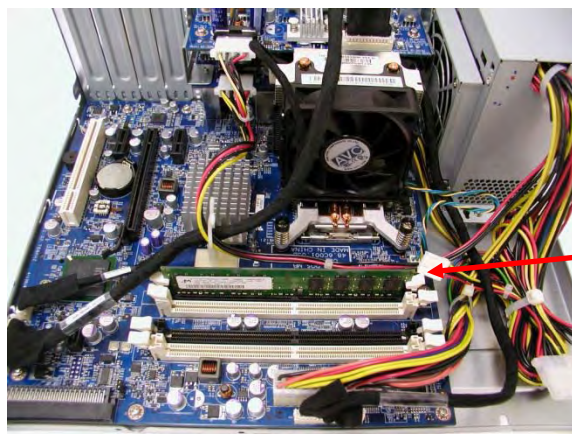
The *TeamPOS 3600 Series* motherboard has four memory sockets or slots that can use 1GB or 2GB DDR memory in any combination.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard tray assembly (See Section 5.2) or the top cover (See Section 5.5).
3. Insert memory (or additional memory) into an empty socket. (There is only one way the memory stick will fit.)



Install memory in this order

4 Memory slots
Slot 0: first memory
Slot 1: third memory
Slot 2: second memory
Slot 3: fourth memory



With memory in slot 0

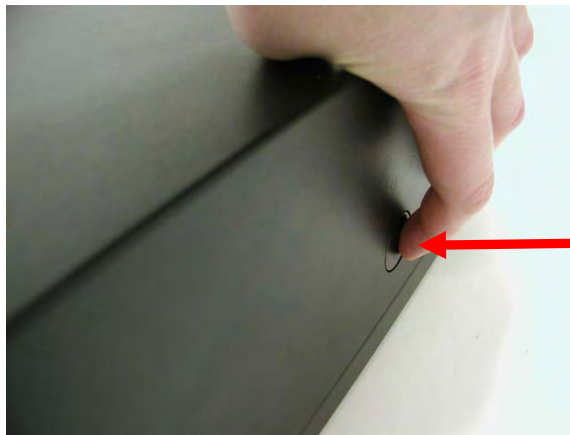
4. Push down on memory until both sides lock into place. Check to make sure that both levers for the socket are locked into place.
5. Reinstall the motherboard assembly (See Section 5.2).

7.6. Replacing the CD-RW/DVD Drive



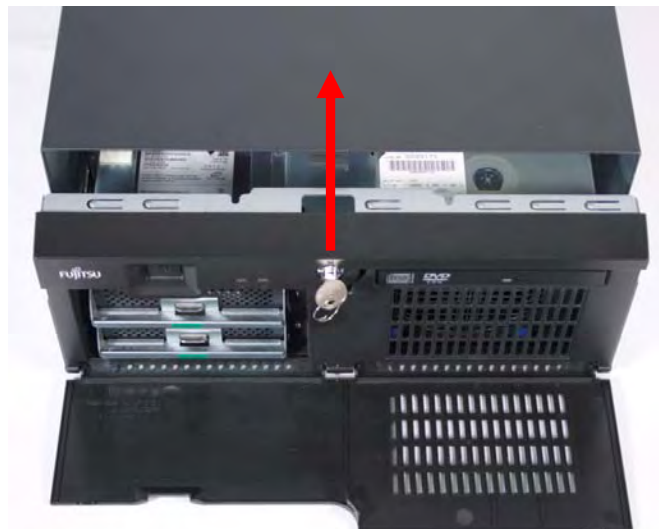
Caution: Be sure to observe all ESD precautions and power off procedures.

1. Disconnect the AC power cord from the controller.
2. Remove the top cover by first unlocking the front key lock and depressing the buttons on either side of the controller. (2~3 mm, 0.1 inch)



Depress this button
on both sides

3. Slide the cover back while depressing the buttons, and then lift up and take off.



4. Disconnect the retaining clips into both sides of the drive in the rear.



5. Disconnect the CD-RW/DVD drive connector into the rear of unit.



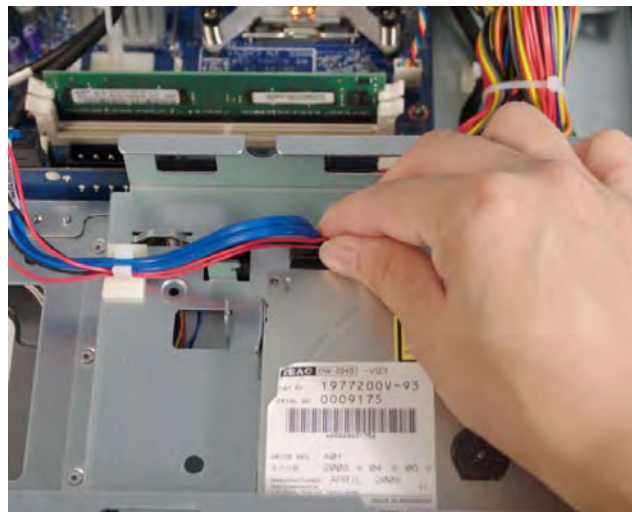
6. Slide the CD-RW/DVD drive out from the slot from the front of the controller



7. Slide the replacement CD-RW/DVD drive into the slot from the front of the controller



8. Insert CD-RW/DVD drive connector into the rear of unit.



9. Insert the retaining clips into both sides of the drive in the rear and then snap into place



10. Secure the cover of the controller back into place.

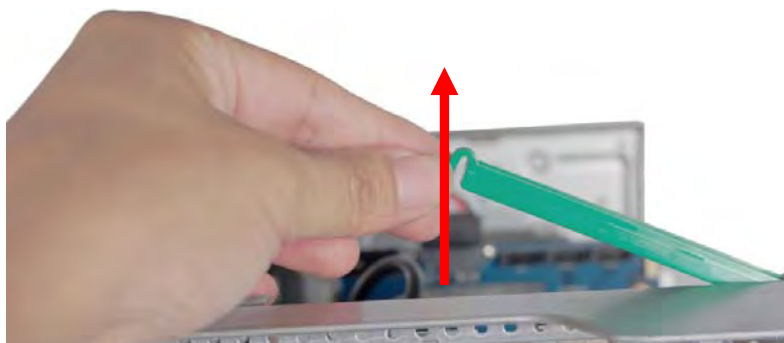
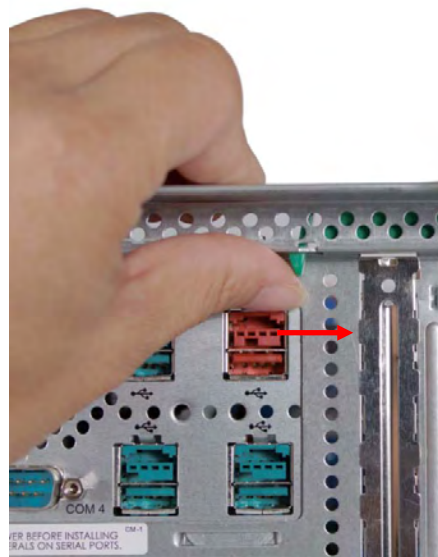
7.7. Replacing PCI Add-In Card(s)



Caution: Be sure to observe all ESD precautions and power off procedures.

Viewing the backplane assembly from the rear, there are four vertical slots on the right hand side for four PCI cards.

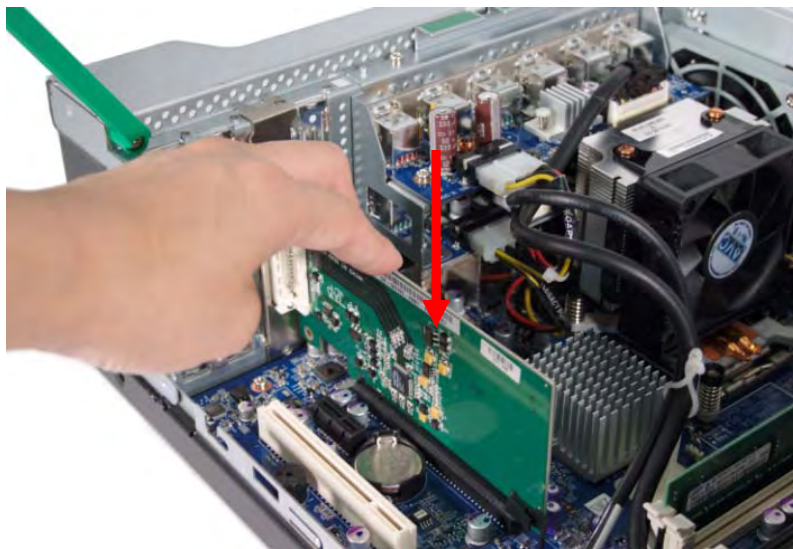
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See section 5.2) or the top cover (See section 5.5).
3. Unlatch the locking arm from the PCI card slots.



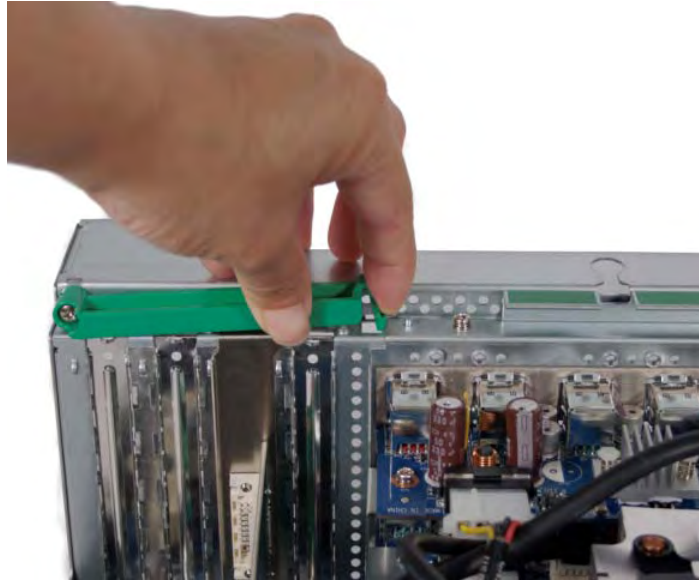
4. Remove the PCI card from the slot.



5. Insert the replacement PCI card into the slot and seat firmly. If installing PCIe cards only use low profile cards.



6. Secure the PCI locking arm back into place.



7. Reinstall the motherboard assembly or top cover and secure into place.

7.8. Replacing the I/O boards



Caution: Be sure to observe all ESD precautions and power off procedures.

The following I/O board options are available on the *TeamPOS 3600 Series*

1. No I/O board.
2. Powered USB I/O board (one board with 6 powered USB ports).
3. Legacy I/O board (one board with 3 RS232 ports and 2 powered USB ports)
4. Powered USB / Legacy I/O board (8 powered USB ports and 3 RS232 ports).
5. Powered USB with Cash Drawer Port (one board with 5 powered USB ports and one RJ25 Port)
6. Powered USB with Cash Drawer and Legacy I/O Board (7 powered USB ports and one RJ25 Port and 3 RS232 ports)

7.8.1. No I/O Board

Backplane assembly will have two filler plates that cover the entire I/O board opening.



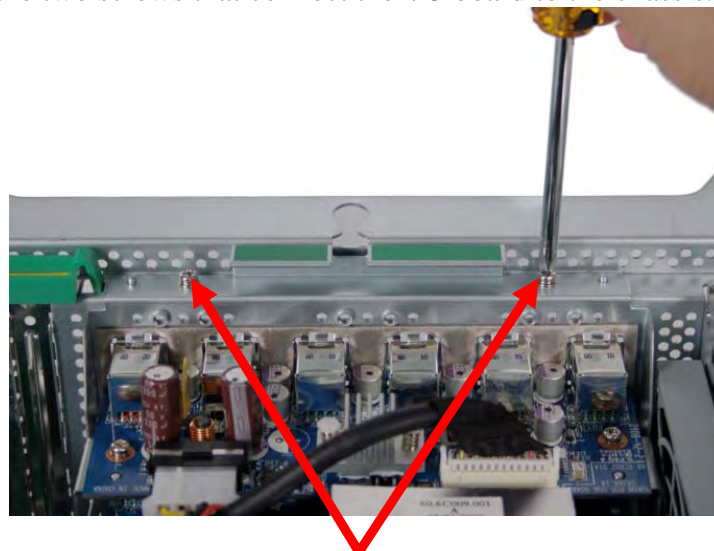
7.8.2. Powered USB/Legacy I/O Board



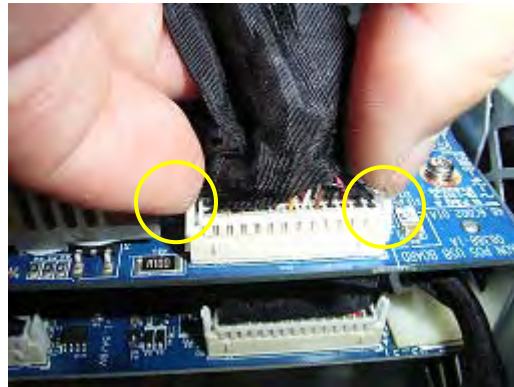
Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB / Legacy I/O board has 8 powered USB connections installed and 3 RS232 ports.

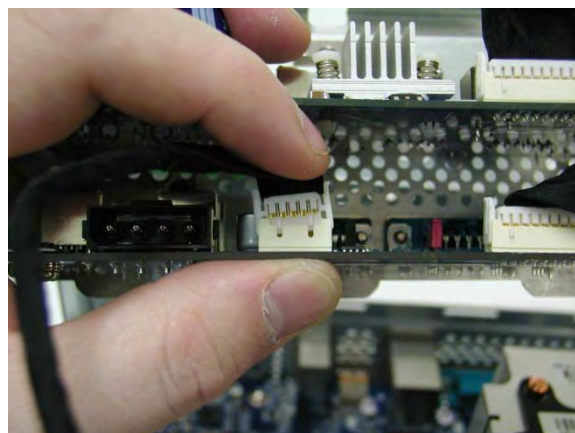
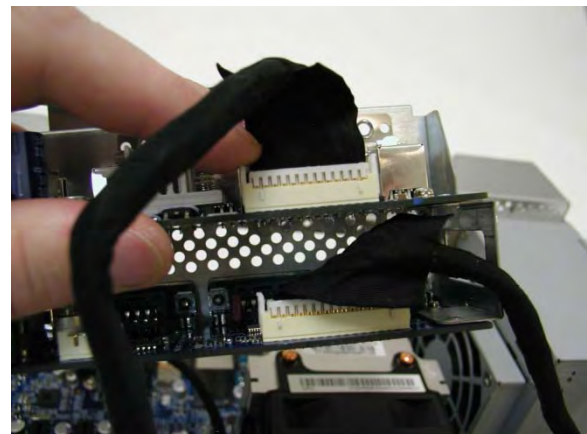
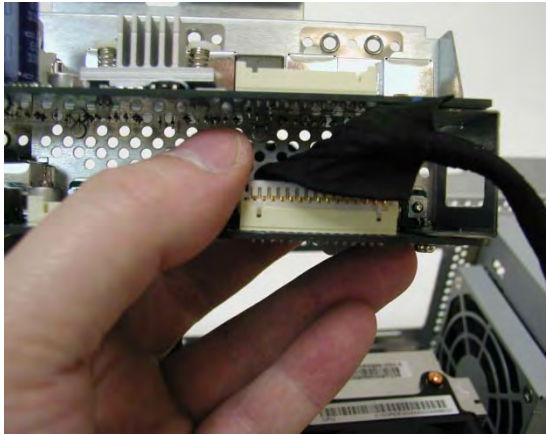
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Remove the two screws that connect the I/O board to the chassis.



4. Remove the I/O board
5. Remove the power cable.
6. Depress the locks on either side of the connector of the data cable, and remove the cable up vertically with depressing the locks.



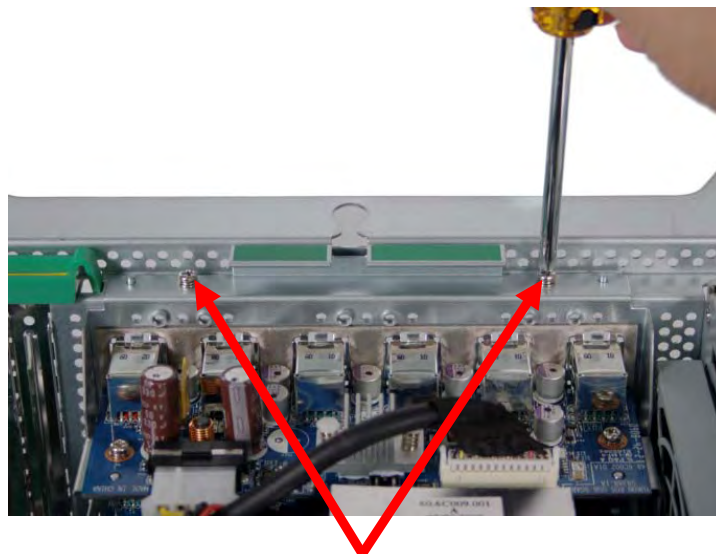
7. Connect the data cables to the new I/O board



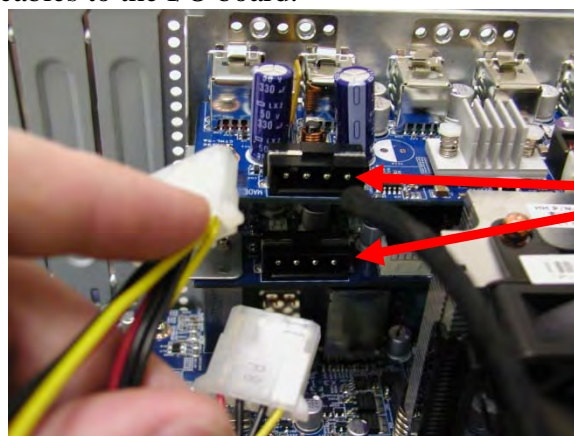
8. Insert the I/O board into the fitted slots on the motherboard assembly.



9. Secure the I/O board with two screws.

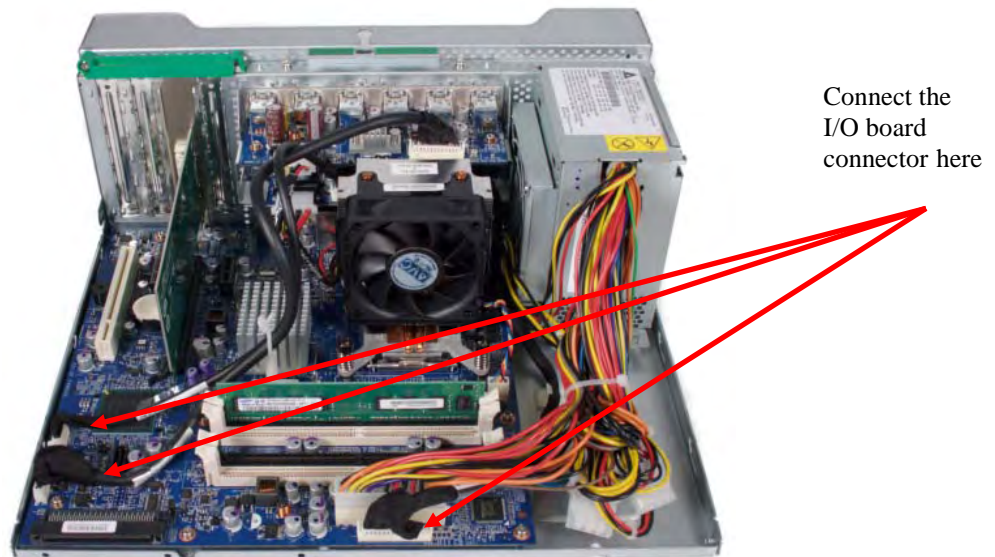


10. Connect the power cables to the I/O board.



Power ports

11. Connect the 3 I/O cables to appropriate slots on the motherboard.



12. Reinstall the motherboard or top cover assembly.

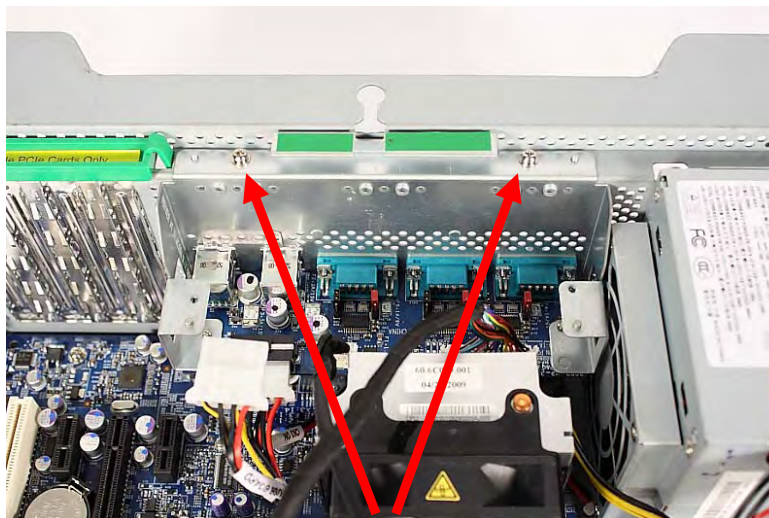
7.8.3. Legacy I/O Board



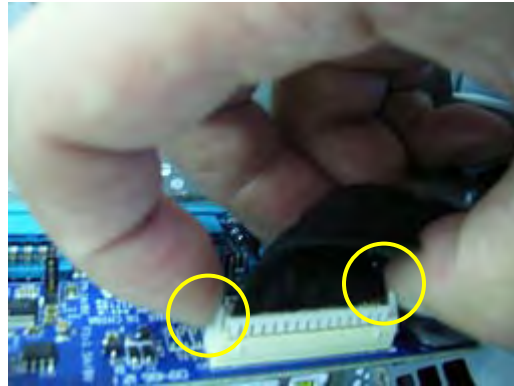
Caution: Be sure to observe all ESD precautions and power off procedures.

The Legacy I/O board has 2 powered USB connections installed and 3 RS232 ports.

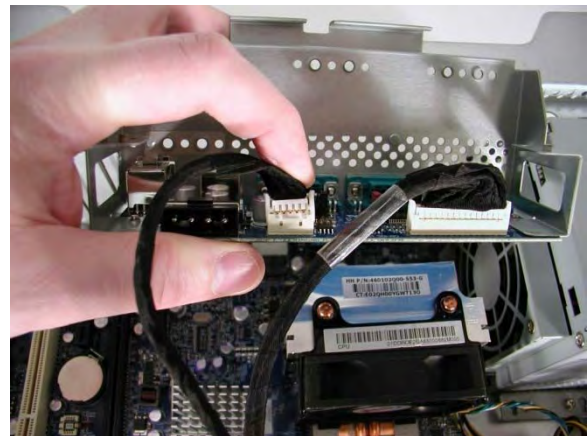
1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Remove the two screws that connect the I/O board to the chassis.



4. Remove the I/O board
5. Remove the power cable.
6. Depress the locks on either side of the connector of the data cable, and remove the cable up vertically with depressing the locks



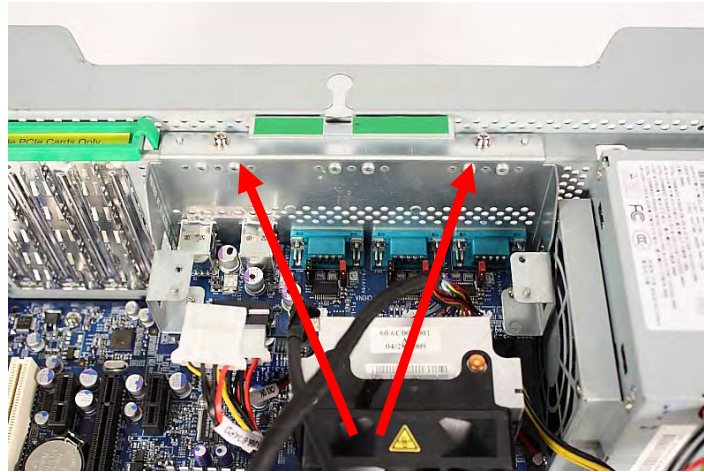
7. Connect the data cables to the new I/O board



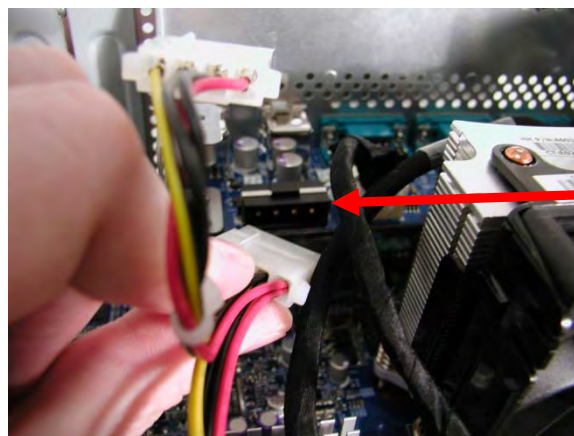
8. Insert the I/O board into the fitted slots on the motherboard assembly.



9. Secure the I/O board with two screws.



10. Connect the power cable to the I/O board.



Power ports

11. Connect the I/O cables to appropriate slot on the motherboard.



Connect the
I/O board
connector here

12. Reinstall the motherboard or top cover assembly.

7.8.4. Powered USB/Legacy I/O Board with Cash Drawer Port



Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB / Legacy I/O board with Cash Drawer Port has 7 powered USB connections installed and 3 RS232 ports and 1 RJ25 port.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Follow the rest of the same procedure as replacing the Powered USB/Legacy Board (see section 7.8.2).

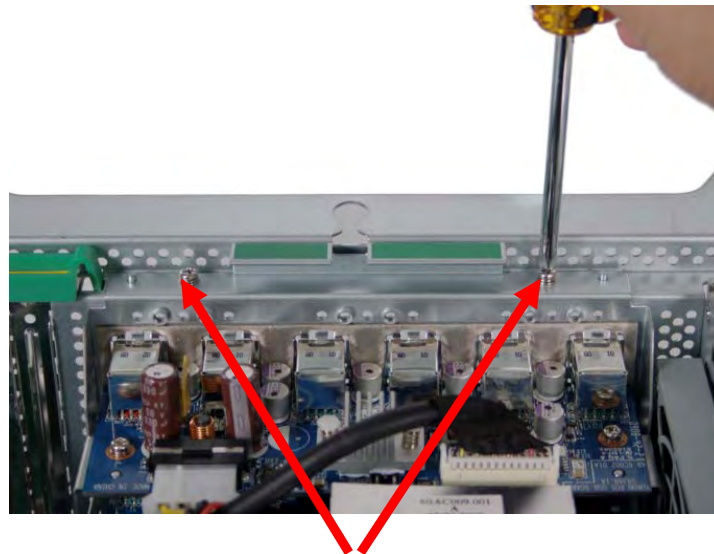
7.8.5. Powered USB I/O Board



Caution: Be sure to observe all ESD precautions and power off procedures.

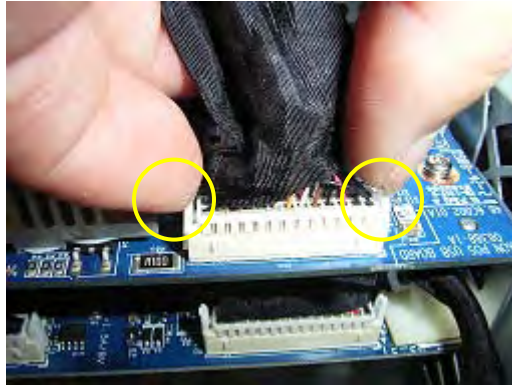
The Powered USB I/O board has 6 powered USB connections installed.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Remove the two screws that connect the I/O board to the chassis.



4. Remove the I/O board

5. Remove the power cable.
6. Depress the locks on either side of the connector of the data cable, and remove the cable up vertically with depressing the locks.



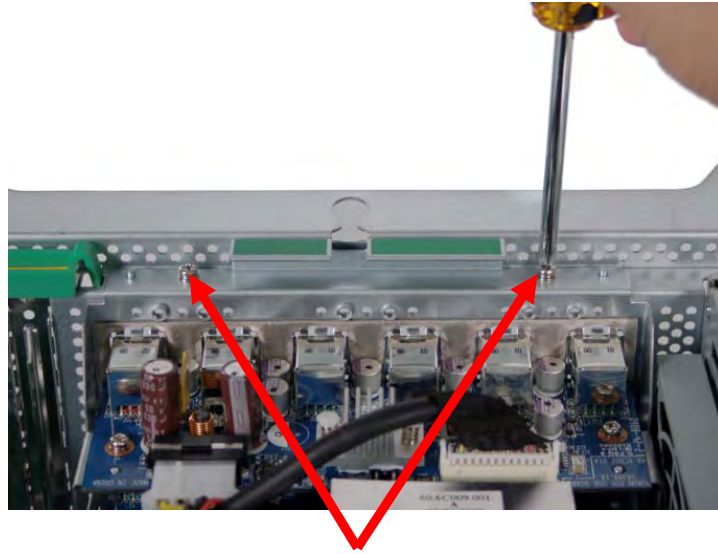
7. Connect the data cable to the new I/O board



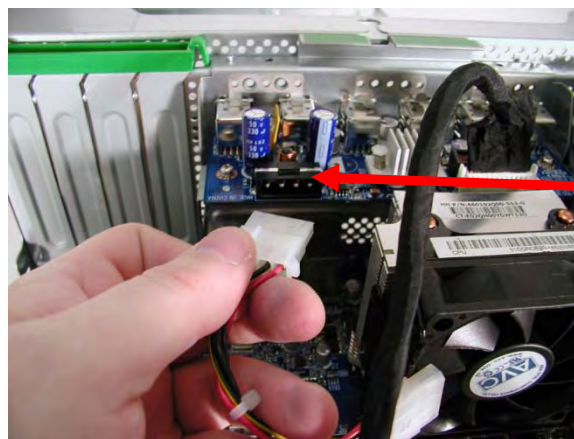
8. Insert the I/O board into the fitted slots on the motherboard assembly



9. Secure the I/O board with two screws.

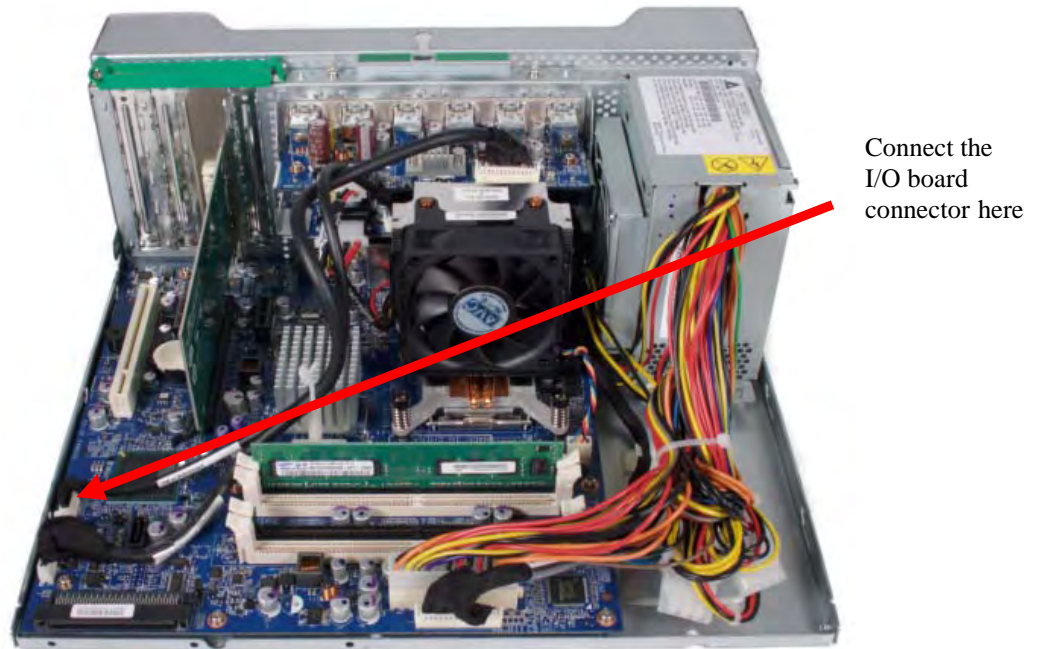


10. Connect the power cable to the I/O board.



Power ports

11. Connect the I/O cable to appropriate slot on the motherboard.



12. Reinstall the motherboard or top cover assembly.

7.8.6. Powered USB with Cash Drawer Port



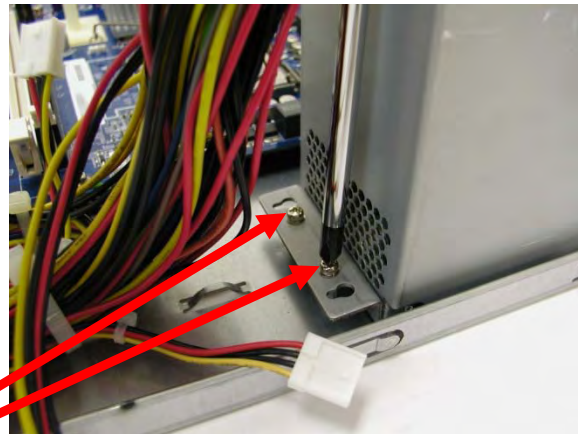
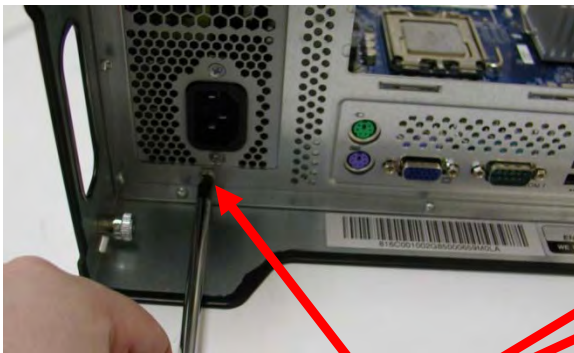
Caution: Be sure to observe all ESD precautions and power off procedures.

The Powered USB board with Cash Drawer Port has 7 powered USB connections installed and 3 RS232 ports and 1 RJ25 port.

1. Disconnect the AC power cord from the controller.
2. Remove the motherboard assembly (See Section 5.2) or top cover (See section 5.5).
3. Follow the rest of the same procedure as replacing the Powered USB/ (see section 7.8.5).

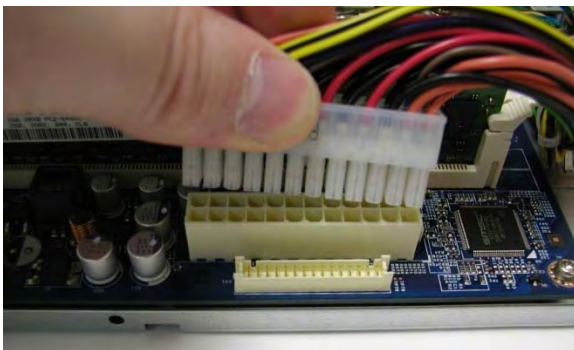
7.9 Replacing the Power Supply

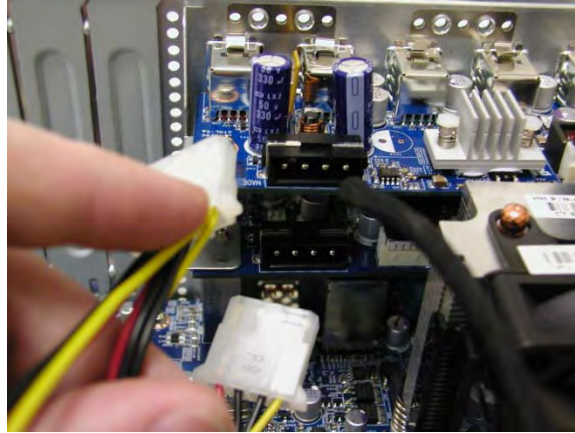
1. Disconnect the power cord from the controller.
2. Remove the motherboard tray assembly (See Section 5.2) or the top cover (See Section 5.5).
3. Remove the 3 mounting screws. Retain the screws.



Remove these
three screws

4. Remove the four connectors from the power supply.





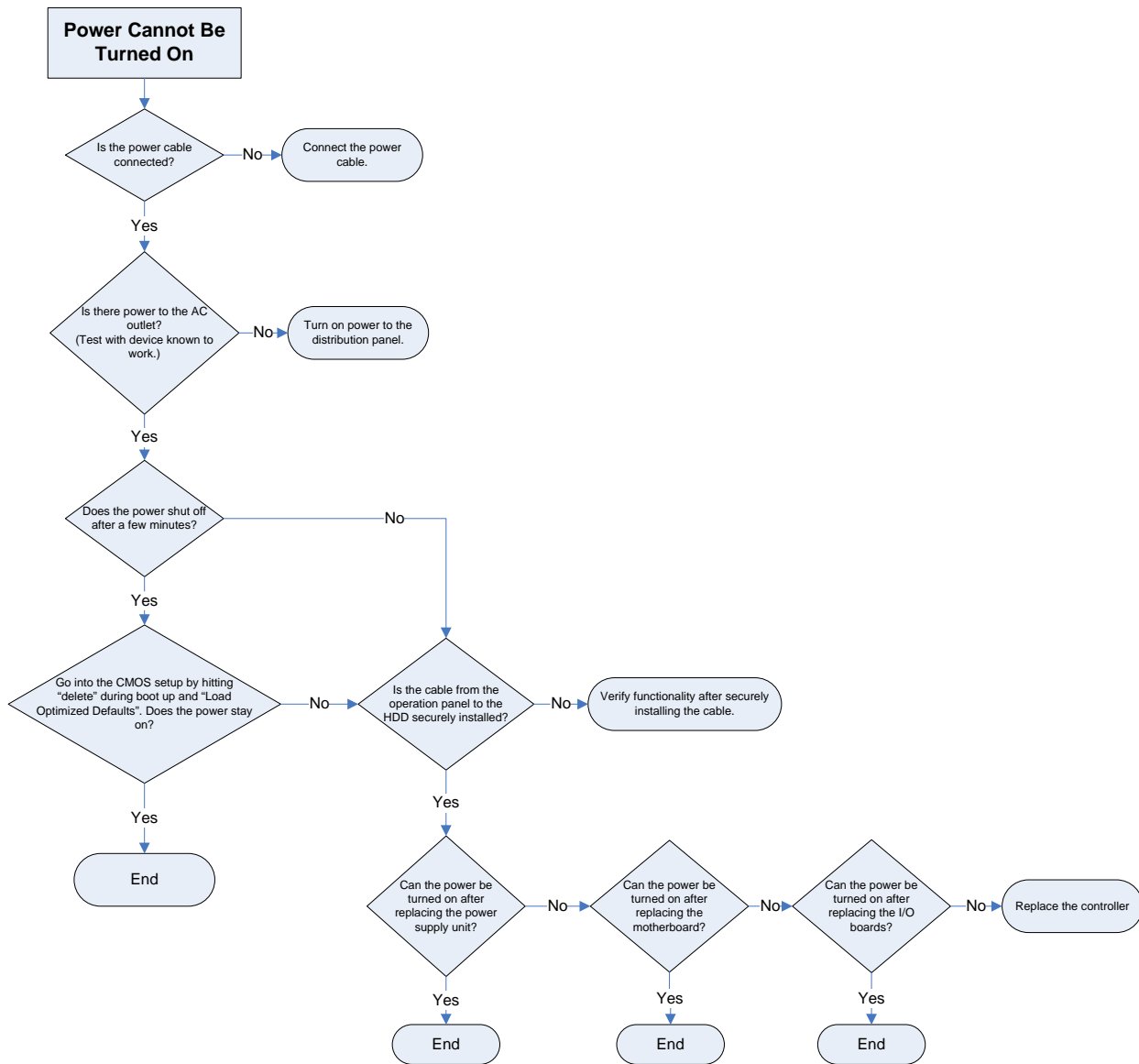
5. Install the new power supply using the three retained screws.
6. Connect the power supply connectors (they are keyed so that they cannot be incorrectly connected).
7. Reinstall the motherboard assembly or the top cover.

Chapter 8. Troubleshooting

Note: The procedures in this chapter are intended for authorized service personnel only.

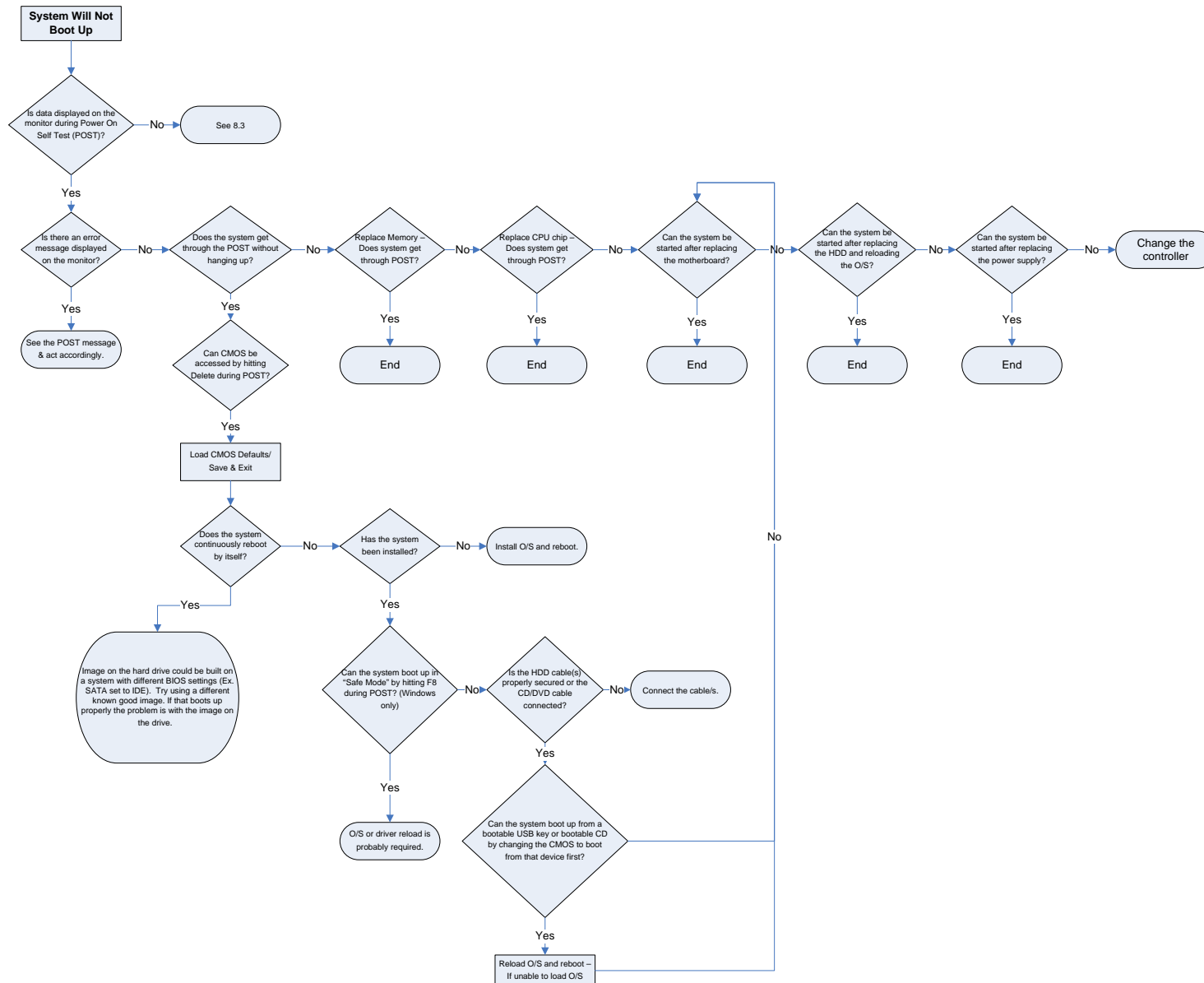
8.1 Power Cannot Be Turned On

Power cannot be turned on or the unit powers off after a few minutes. The power LED next to the power switch does not light up.



8.2 System Will Not Boot Up

The system fails to start up even though the power is turned on.

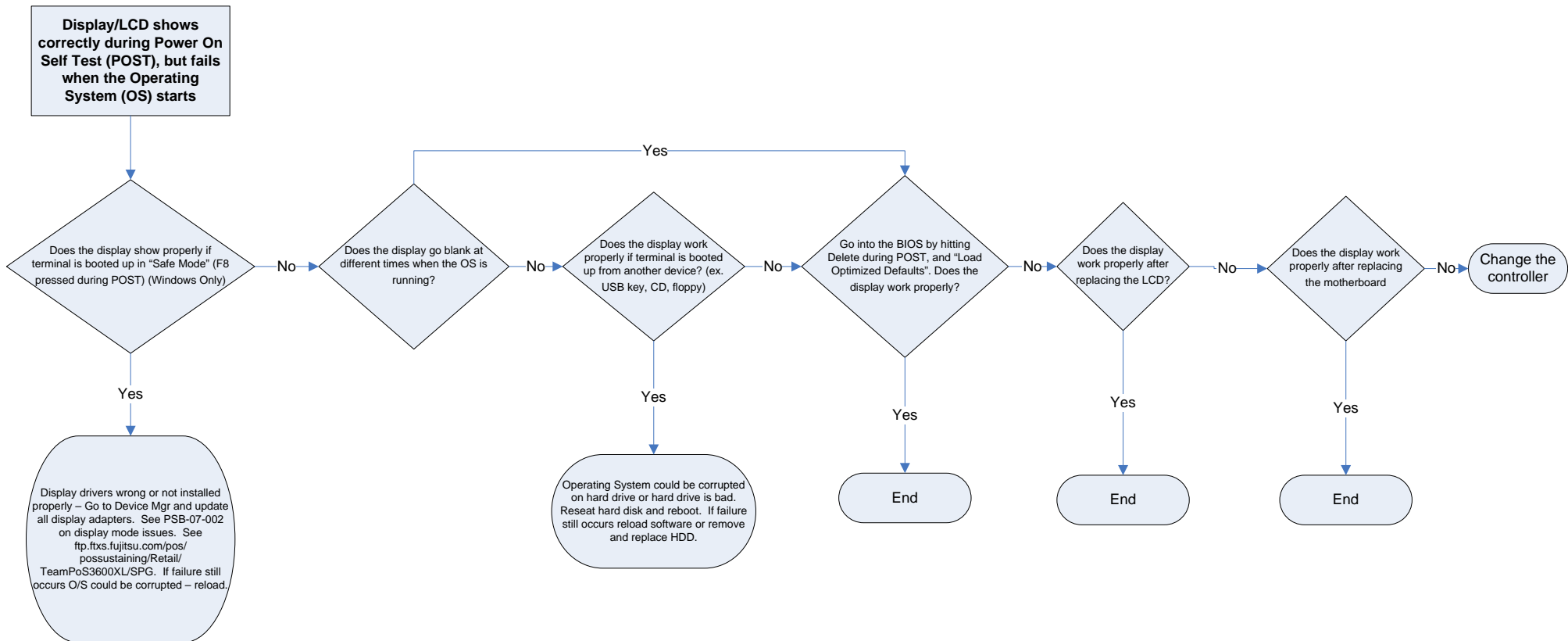


8.3 Display Issues

Display/LCD shows correctly during Power On Self Test (POST), but fails when the Operating System (OS) starts

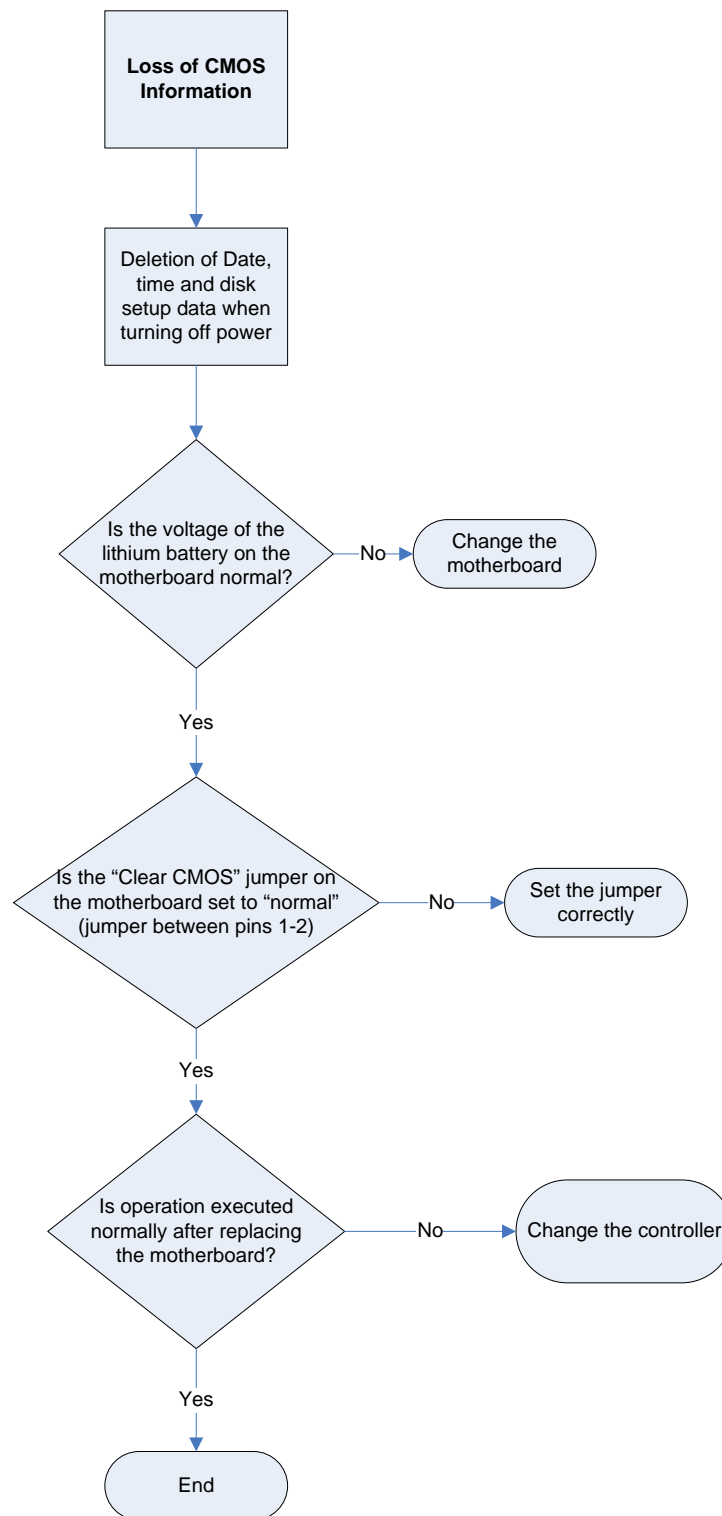


Caution: Before replacing any boards, unplug the power cable and make sure the motherboard standby power LED light is out.



8.4 Loss of CMOS Information

Deletion of Date, time and disk setup data when turning off power



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Chapter 9. BIOS Setup Procedures

Note: The procedures in this chapter are intended for authorized service personnel only.



Caution: Bios settings are critical to the proper operation of the terminal. Only Default settings should be used unless you are an experienced user and understand the proper settings and their functions. Abnormal operation of the terminal may occur if settings are changed from Default



Caution: If a user selected both the User and Supervisor Password to be the same, then the user will have full BIOS access after entering the said password.

If a motherboard is replaced in the field, it may be necessary to change the date and time and setup the BIOS for the customer's configuration. The following information shows the default screens from the factory.

9.1 Opening CMOS Setup Screen

Turn ON power and press the "Delete" key while the terminal goes through the power on self test. (POST).

9.1.1 CMOS Settings

If this is a new motherboard it will be necessary to set the date and time before releasing the terminal to the customer. To change the date and time, select STANDARD CMOS FEATURES, then input the current date and time. Run "LOAD OPTIMIZED DEFAULTS" then "SAVE & EXIT SETUP." Changing other default settings may be done at this time if the customer has settings other than the default settings listed here. **Changing settings that are not the default or not set for specific customer needs may adversely affect the operation of the unit.**

In most cases, the CMOS default settings are adequate and do not require changing.

9.1.2 Main Menu – Motherboard

Note: An arrow [▶] indicates additional screens. Use [Enter] to advance to the next screen. Text shown in blue is dynamic, meaning it changes as the unit operates, or it is set for automatic mode and is not selectable in that mode.

Instructions or information on how to change settings appears in the right column under “Item Help.” Information appropriate to the item selected appears under “Menu Level.”

Factory Default Settings (All screens shown below are from factory default settings configuration)

Main BIOS Screen

```

Phoenix - AwardBIOS CMOS Setup Utility
-----
* Standard CMOS Features
* Advanced BIOS Features
* Advanced Chipset Features
* Integrated Peripherals
* System Information
* Security Chip Configuration
* Power Management Setup
* FnP/PCI Configurations
* PC Health Status
Load Optimized Defaults
Set Supervisor Password
Set User Password
Save & Exit Setup
Exit Without Saving
-----
Esc : Quit
F10 : Save & Exit Setup
^ V > < : Select Item
-----
Time, Date, Hard Disk Type...
  
```


IDE HDD Auto-Detection (Press Enter) – No change in information status (Capacity, Cylinder, Head, etc. not changed).

Capacity 160 GB
Cylinder 65535
Head 16
Precomp 0
Landing Zone 65534
Sector 255

IDE Channel 0 Slave (DW-224S-V)

IDE HDD Auto-Detection (Press Enter) – No change in information status (Capacity, Cylinder, Head, etc. not changed) because this is a DVD ROM.

IDE Channel 1 Master (ST3160815AS)

IDE HDD Auto-Detection (Press Enter) – No change in information status (Capacity, Cylinder, Head, etc. not changed).

Capacity 160 GB
Cylinder 65535
Head 16
Precomp 0
Landing Zone 65534
Sector 255

IDE Channel 1 Slave (None)

IDE HDD Auto-Detection (Press Enter) – No change in information status (Capacity, Cylinder, Head, etc. not changed) because there is nothing on this slot.

Halt On:

When an error happens during POST, booting will stop or continue depending upon the option selected. To continue, press F1.

All Errors: System will stop on any errors it detects.

No Errors: System will not stop on any errors it detects.

All, But Keyboard: (Default) System will stop on All Errors, except keyboard.

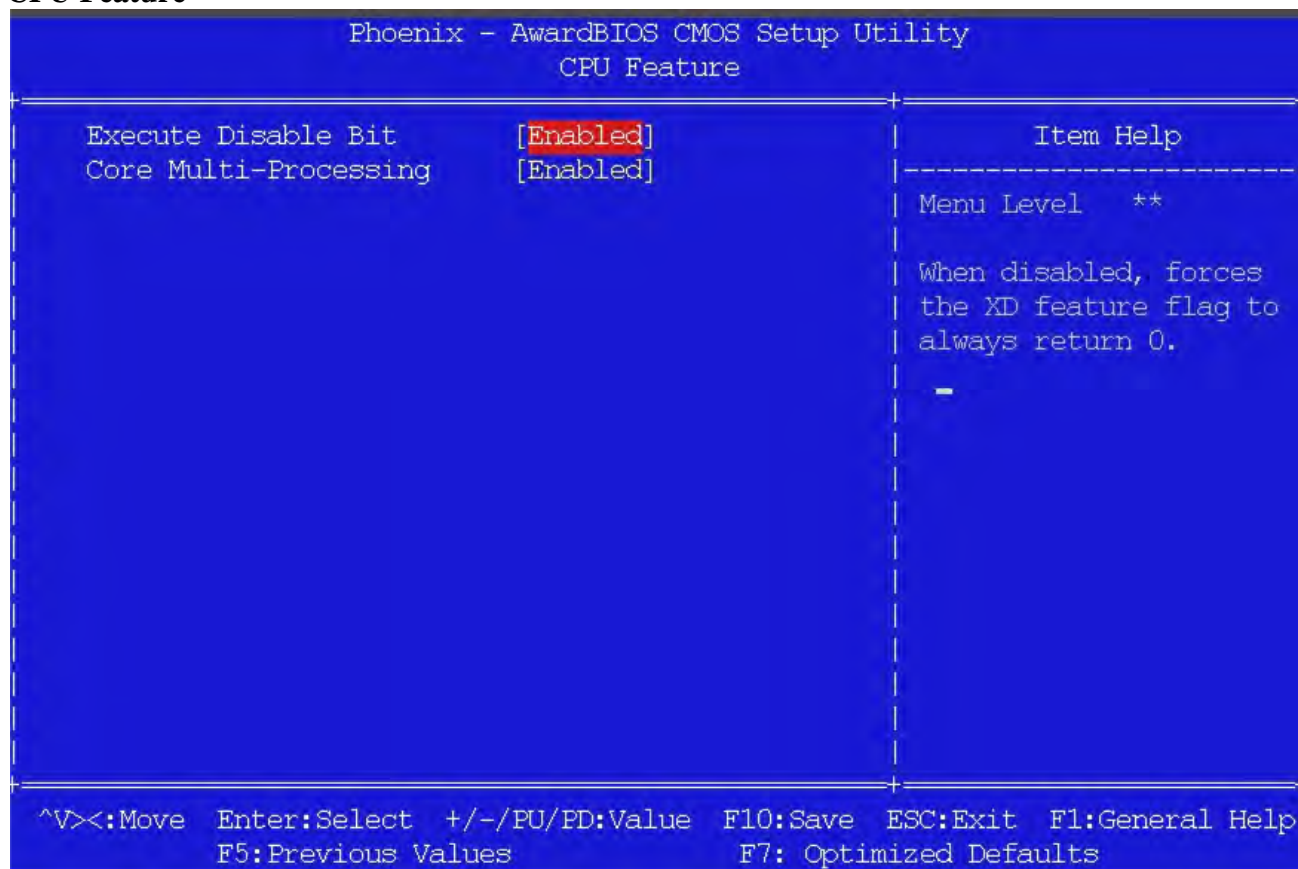
Advanced BIOS Features

```

Phoenix - AwardBIOS CMOS Setup Utility
Advanced BIOS Features
-----
* CPU Feature          [Press Enter]      ^
* Hard Disk Boot Priority [Press Enter]      #
* CD-ROM Boot Priority [Press Enter]      #  Menu Level  *
Virus Warning         [Disabled]          #
Quick Power On Self Test [Enabled]          #
First Boot Device     [CDROM]              #
Second Boot Device    [USB-FDD]            #
Third Boot Device     [Hard Disk]          #
Boot Other Device     [Enabled]            #
Boot Menu             [Enabled]            #
Boot Up NumLock Status [On]              #
Security Option       [Setup]              #
APIC Mode             Enabled              #
MPS Version Control For OS 1.4             #
OS Select For DRAM > 64MB Non-OS2         |
Console Redirection   Enabled              |
Baud Rate             19200                 |
Agent after boot      Enabled              |
Report No FDD For WIN 95 No                V
-----
^V<>:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
          F5:Previous Values                F7: Optimized Defaults
    
```

```

OS Select For DRAM > 64MB Non-OS2         #
Console Redirection   Enabled              #
Baud Rate             19200                 #
Agent after boot      Enabled              #
Report No FDD For WIN 95 No                #
Full Screen LOGO Show [Disabled]          #
Small Logo(EPA) Show  [Disabled]          #
DMI Event Log         [Enabled]            #
Clear All DMI Event Log [No]              #
View DMI Event Log    [Enter]              #
Mark DMI Events as Read [Enter]            #
Event Log Capacity    Space Available      V
-----
^V<>:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
          F5:Previous Values                F7: Optimized Defaults
    
```

CPU Feature**CPU Feature:****PPM Mode (Shown only with Dual Core CPU):**

Allow to Selected PMM mode and SMM mode if CPUs have support for EIST function .

SMM Mode : For legacy OS (ex. Win2K)

Native Mode: (Default) for full support of ACPI OS (ex. Win-XP, VISTA, etc.)

Limit CPUID Maxval (Shown only with Dual Core CPU):

Read only value. This item is always set to Disabled.

C1E Function (Shown only with Dual Core CPU):

Enables or disables C1E function. This function enables or disabled enhanced halt state of the CPU, if supported.

Disabled : Disable C1E function

Auto: (Default) enables C1E function

Execute Disable Bit:

Enables or disables Intel Execute Disable Bit function. This function may enhance protection for the computer, reducing exposure to viruses and malicious buffer overflow attacks when working with its supporting software and system

Disabled : Disable Execute disabled bit

Enabled: (Default) enabled Execute disabled bit

Virtualization Technology (Shown only with certain Dual Core CPU):

Enables or disables Intel Virtualization Technology.

Disabled : (Default) Disables Virtualization Technology

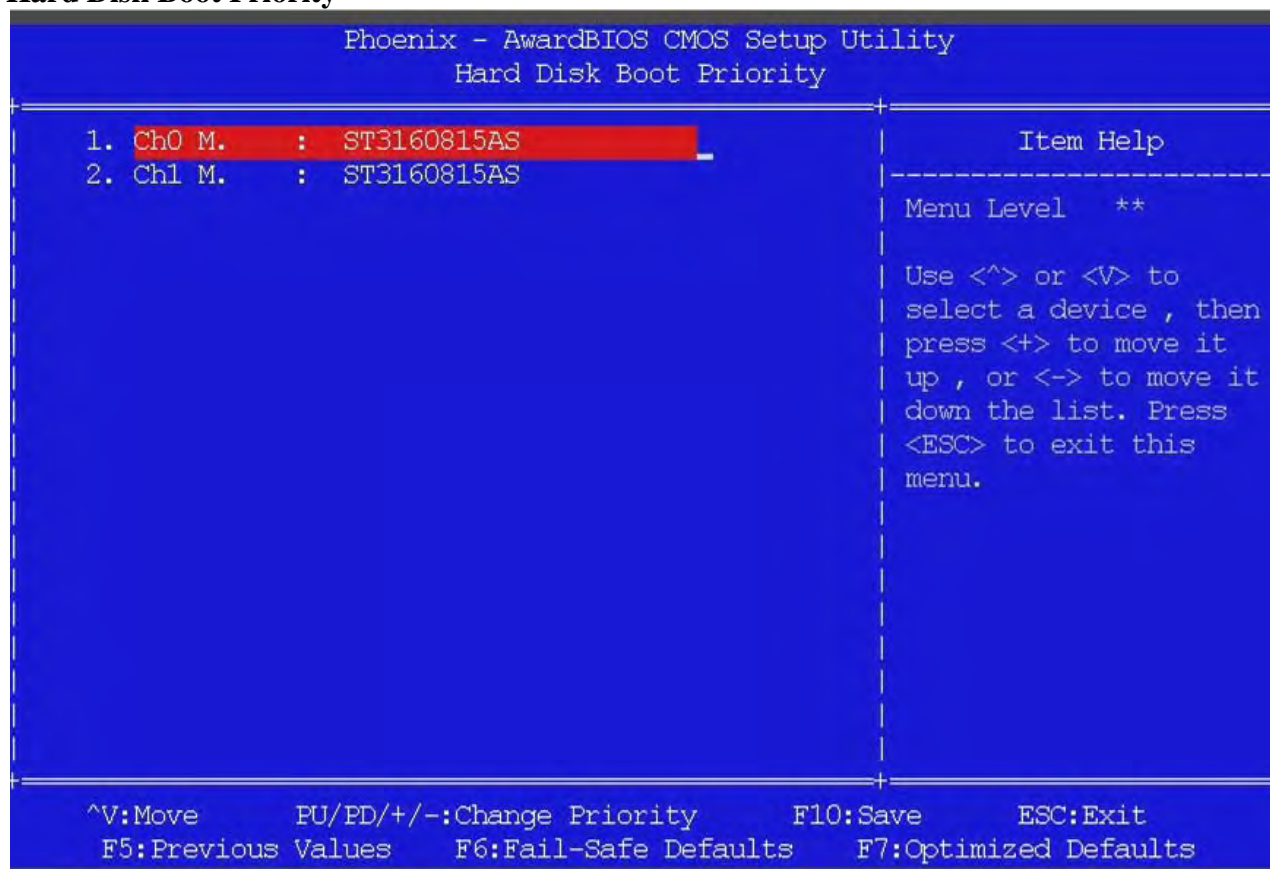
Enabled: Enables Virtualization Technology

Core Multi-Processing:

Allow to enable or disable Multi-Processor support

Disabled: Disable multi-processor support (signal processor support)

Enabled: (Default) Multi-processor support

Hard Disk Boot Priority**Hard Disk Boot Priority:**

Select Hard Disk Boot Device Priority (Include SATA ,Raid ,USB Hard Disk)

*****The following items are based on using the Seagate 160GB 7200 RPM SATA drive, model ST3160815AS in both Hard Drive slots and a TEAC DVD Rom, model DW-224S.*****

With SATA Mode selected to **RAID**: (Default)

1. SCSI-0 : Intel Volume0 Displays the RAID volume that was built

With SATA Mode selected to **AHCI**:

1. SCSI-0 : P0-ST3160815AS Displays the SATA HDD on slot 0

2. SCSI-1 : P1-ST3160815AS Displays the SATA HDD on slot 1

With SATA Mode selected to **IDE**:

1. Ch0 M. : ST3160815AS Displays the SATA HDD on slot 0

2. Ch1 M. : ST3160815AS Displays the SATA HDD on slot 1

CD-ROM Boot Priority: (Menu only shown when more than 1 CD-ROM device is available)

Select CD-ROM Boot Device Priority (Include SATA,USB CD-ROM)

*****The following items are based on using a TEAC DVD Rom, model DW-224S. For example purposes, a TDK USB DVD ROM, model 440N was used. *****

With SATA Mode selected to **RAID**:

1. USB-CDROM0 : TDK DVDRW0404N Displays the USB CD-ROM

With SATA Mode selected to AHCI:

1. USB-CDROM0 : TDK DVDRW0404N Displays the USB CD-ROM

With SATA Mode selected to IDE:

1. Ch0 S. : DW-224S-V Displays internal DVD ROM

2. USB-CDROM0 : TDK DVDRW0404N Displays the USB CD-ROM

Virus Warning:

Virus warning protection when boot sector be changed

Disabled: (Default) Allow User to change boot sector

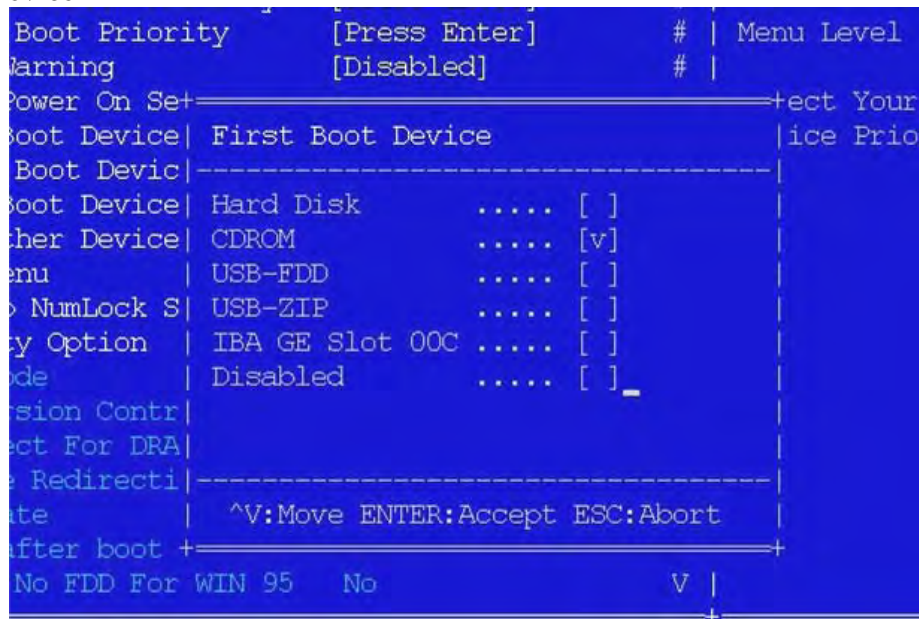
Enabled: Protect boot sector don't be changed

Quick Power On Self Test:

Quick POST Enable/Disable. When Enabled, System will speed-up during POST stage

Disabled: Disabled Quick POST function

Enabled: (Default) Enabled Quick POST function

First Boot Device

Warning: For a USB device boot only case, if a certain USB port pair/pairs are set to Disabled in the BIOS, hitting F10 and selecting a USB FDD to boot from the disabled port will cause the system to stop booting. To resolve this issue, either Re-enable the specific USB port pair or do not try to boot with a USB FDD from a port that is set to Disabled in the BIOS

First (Second, Third) Boot Device:

Select Boot Device Priority after POST stage is finished

Hard Disk (Default, Third)

CDROM (Default, First)

USB-FDD (Default, Second)

USB-ZIP

IBA GE Slot 00C

Disabled

Boot Other Device:

After 1st/2nd/3rd boot device has failed, system will try to boot from other bootable devices if selected.

Disabled: Disables other bootable devices when 1st/2nd/3rd boot device fail.

Enabled: (Default) Allows the system to boot from other bootable devices.

Boot Menu:

Enable or Disable Pop-up boot menu support.

Disabled: Does not allow system Pop-up boot menu support during POST

Enabled: (Default) Allow system Pop-up boot menu support during POST

Boot Up NumLock Status:

If On is selected , Keyboard status- Numlock will Enable

Off: Set Numlock off

On: (Default) Set Numlock on

Security Option:

This item will provide password protection during POST stage or Entry Setup menu

Setup: (Default) Set protection when user entry setup menu

System: Set protection during POST stage

Full Screen Logo Show :

Support Customer 's Logo Support in 640*480 Graphic mode

Disabled: (Default) Don't Show Full Screen Logo

Enabled: Show Full Screen Logo

Small Logo(EPA) Show:

Allow system to show EPA logo or not

Disabled: (Default) Don't show EPA Logo

Enabled: Show EPA Logo

DMI Event Log

DMI Event Log Support This function will log all errors during POST stage

Disabled: Disabled DMI event log function

Enabled: (Default) Enabled DMI event log function

Clear All DMI Event Log

DMI Event Log Clear Support after rebooting , This function will clear all DMI log list

No: (Default) Dont clear DMI event log

Yes: Clear DMI event log

View DMI Event Log

View DMI Pool content

Mark DMI Events as Read

Mark DMI content when log be read

Event Log Capacity

This Item will show DMI event log capacity status. The maximum number of DMI log is 6.

Advanced Chipset Features

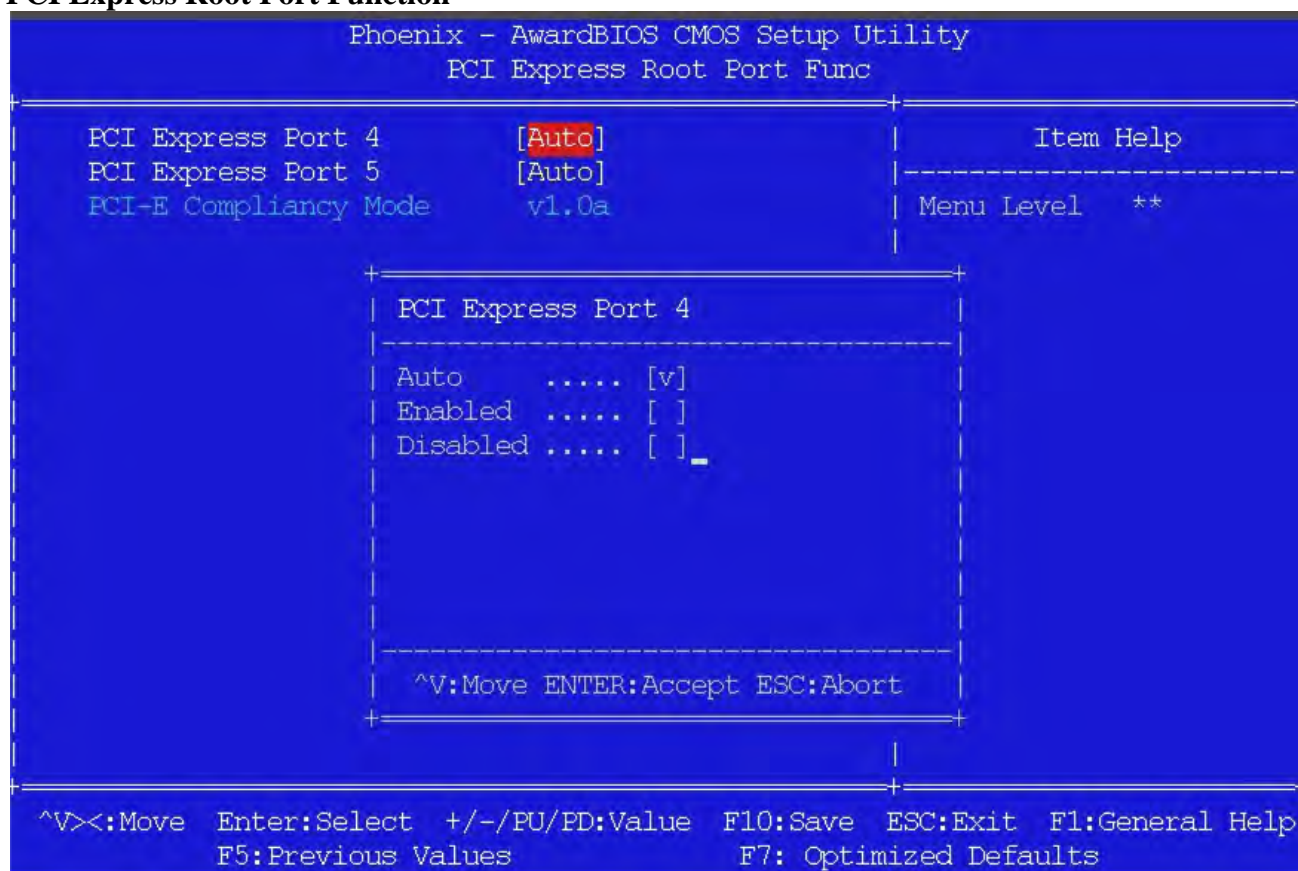
```

Phoenix - AwardBIOS CMOS Setup Utility
Advanced Chipset Features
-----+-----
* PCI Express Root Port Func [Press Enter]
* Advanced Fan Speed Control [Press Enter]
System BIOS Cacheable      Enabled
VT-d                        [Disabled]
AMT BIOS Support           Enabled
GbE LAN                     [Enabled]
SOL Support                 Enabled
IDE-R Support               Enabled
Platform Mng Selection     Intel AMT

** VGA Setting **
PEG/Onchip VGA Control     [Auto]
DVMt Mode                  [DVMt]
DVMt/FIXED Memory Size    [128MB]
-----+-----
^V<:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
F5:Previous Values          F7: Optimized Defaults

```

PCI Express Root Port Function



PCI Express Boot Port Func

PCI-E Root Controller Function

PCI Express Port 4~5

Disabled: Disable PCI-E root host controller.

Enabled: Enable PCI-E root host controller.

Auto: (Default) Auto checks PCI-E status. If any devices are detected in PCI-E root port, system will enable host controller. If no devices are connected in the root port, system will disable host controller.

Advanced Fan Speed Control



Advance Fan Speed Control

Advance Fan control function when iAMT support

CPU Speed Fan Monitor

CPU Fan Speed monitor support

Disabled: Disable Fan speed monitor

Enabled: (Default) Enable Fan speed monitor

VT-d

Intel Virtualization Technology for Directed I/O Function support

Disabled: (Default) Disables VT-d support

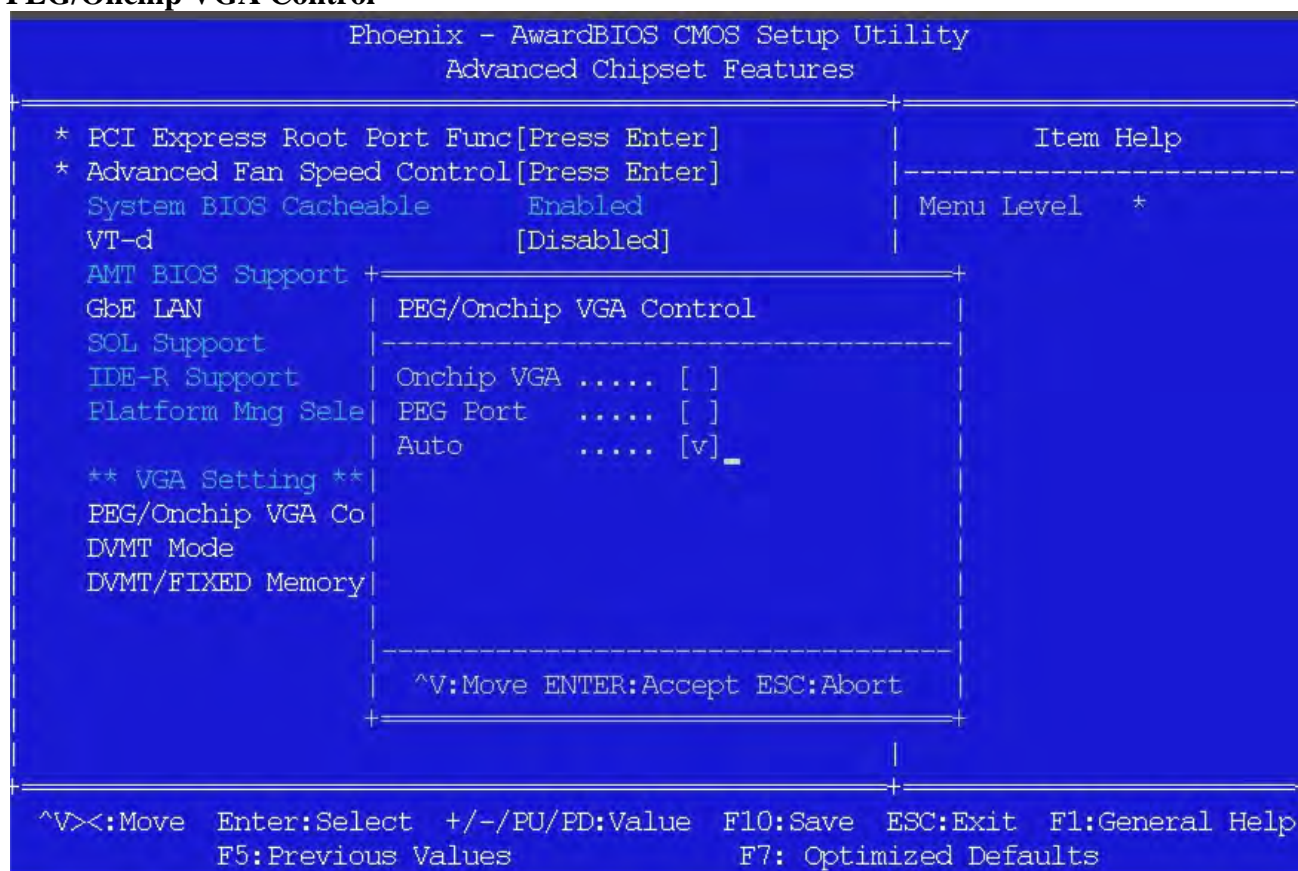
Enabled: Enables VT-d support

Gbe LAN

This item allows user to Enable/Disable LAN controller function,

Disabled: Disables LAN controller

Enabled: (Default) Enables LAN Controller

PEG/Onchip VGA Control**PEG/Onchip VGA Control**

PCI-E Graphic and Onchip VGA function control

Onchip VGA: Selection Onchip VGA to used

PEG Port: Selection PEG Port VGA to Use

Auto: ([Default](#)) VGA selection by auto detect

DVMT Mode

This item allows user to use one of the DVMT modes, dynamic or fixed.

FIXED: This item does not provide user to adjust video memory size.

DVMT: ([Default](#)) This item provides user dynamic adjustment of video memory size.

DVMT/Fixed Memory Size

Video memory Size used in Fixed & DVMT mode

128 MB: ([Default](#)) Use 128MB

256 MB: Use 256 MB

Integrated Peripherals

```
Phoenix - AwardBIOS CMOS Setup Utility
Integrated Peripherals
-----+-----
* SuperIO Device          [Press Enter]
* USB Device Setting      [Press Enter]
  SATA Mode               [IDE]
  LEGACY Mode Support     Disabled
-----+-----
Item Help
-----+-----
Menu Level  *
-----+-----
^V><:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
          F5:Previous Values                F7: Optimized Defaults
```

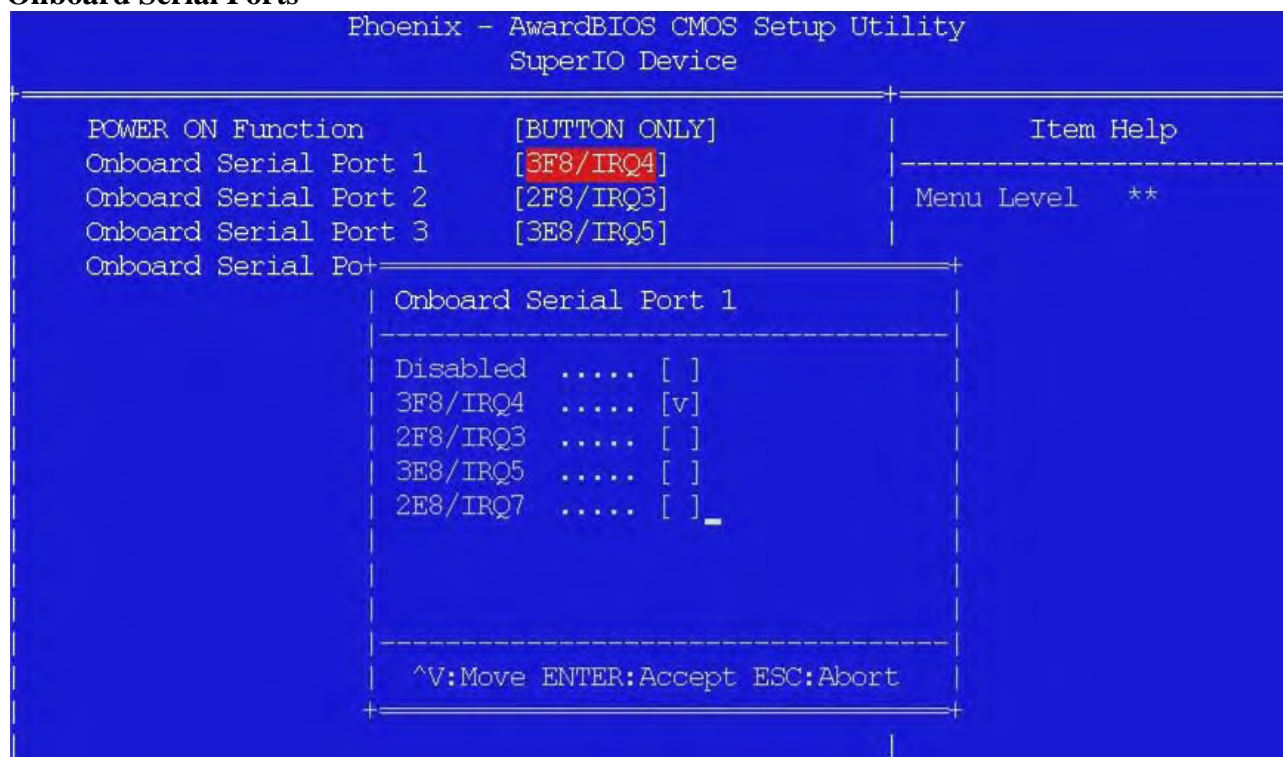
SuperIO Device

```
Phoenix - AwardBIOS CMOS Setup Utility
SuperIO Device
```

		Item Help
POWER ON Function	[BUTTON ONLY]	
Onboard Serial Port 1	[3F8/IRQ4]	
Onboard Serial Port 2	[2F8/IRQ3]	Menu Level **
Onboard Serial Port 3	[3E8/IRQ5]	
Onboard Serial Port 4	[2E8/IRQ7]	

^V><:Move Enter:Select +/-/PU/PD:Value F10:Save ESC:Exit F1:General Help
F5:Previous Values F7: Optimized Defaults

Onboard Serial Ports



SuperIO Device

POWER ON Function

Allow user to selection power on method function

Button Only: (Default) Power On by button only

Any Key: Power On by any key in PS/2 keyboard

Onboard Serial Port 1~4

Allow user to selection Serial Port I/O address and IRQ

Disabled: Disable Serial Port Function

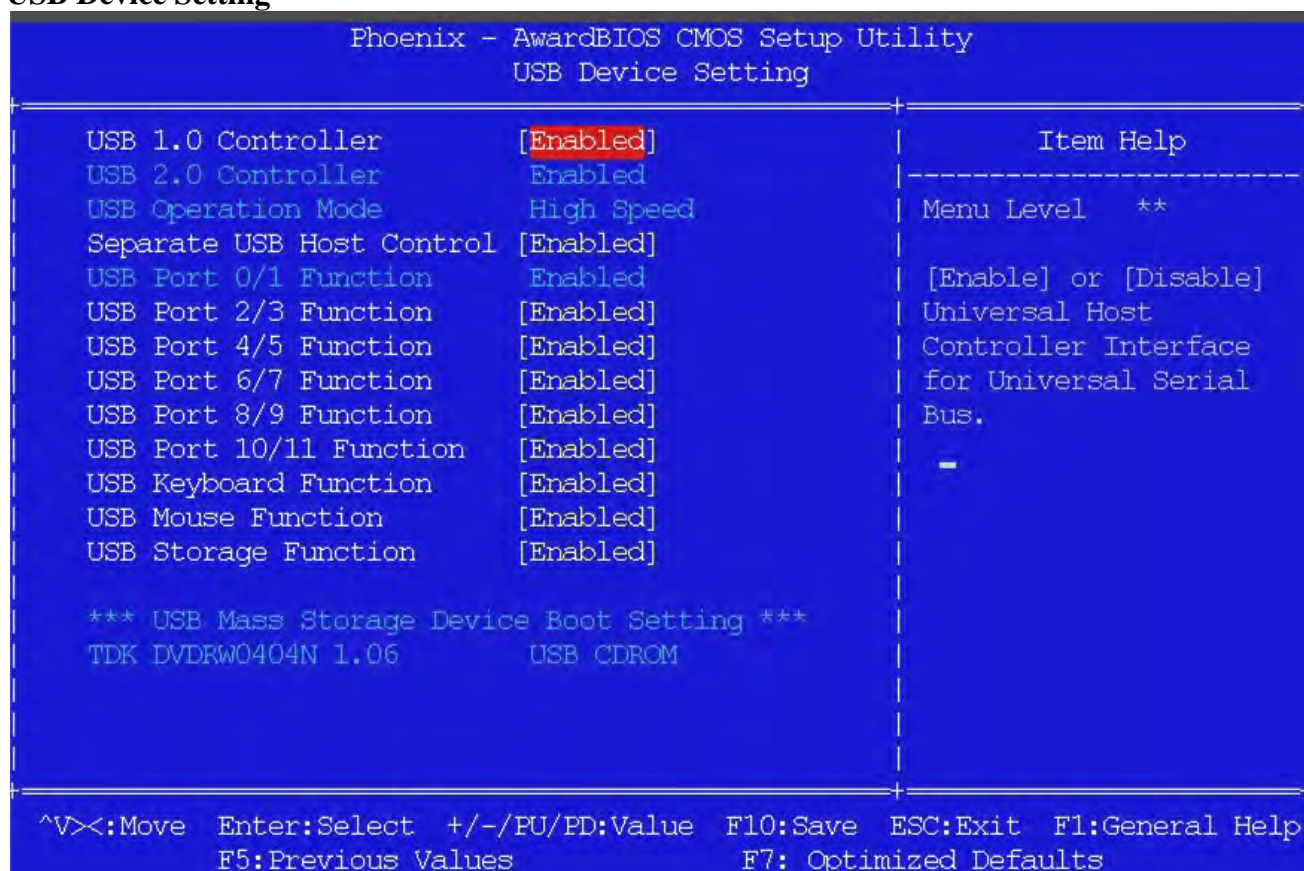
3F8/IRQ4: (Default,Com1)

2F8/IRQ3: (Default,Com2)

3E8/IRQ5: (Default,Com3)

2E8/IRQ7: (Default,Com4)

USB Device Setting



Warning: For a USB device boot only case, if a certain USB port pair/pairs are set to Disabled in the BIOS, hitting F10 and selecting a USB FDD to boot from the disabled port will cause the system to stop booting. To resolve this issue, either Re-enable the specific USB port pair or do not try to boot with a USB FDD from a port that is set to Disabled in the BIOS

USB Device Setting

USB 1.0 Controller

USB 1.0 (UHCI) function support

Disabled: Disable all USB Function

Enabled: (Default) Enable USB 1.0 Support

Separate USB Host Control

Allows user to Enable/Disable each USB Host control function

Disabled: Disables USB Host Controller

Enabled: (Default) Enables USB Host Controller

USB Port 0/1 Function:

USB Controller 1 Enable/Disable

Enabled: (Default) USB Port 0/1 will always remain Enabled

USB Port 2/3 Function:

USB Controller 1 Enable/Disable

Disabled: Sets USB Port 2/3 and USB Port 4/5 to be Disabled

Enabled: (Default)

USB Port 4/5 Function:

USB Controller 1 Enable/Disable

Disabled: Sets USB Port 4/5 to be Disabled

Enabled: (Default)

USB Port 6/7 Function:

USB Controller 1 Enable/Disable

Disabled: Sets USB Port 6/7, USB Port 8/9 and USB Port 10/11 to be Disabled

Enabled: (Default)

USB Port 8/9 Function:

USB Controller 1 Enable/Disable

Disabled: Sets USB Port 8/9 and USB Port 10/11 to be Disabled

Enabled: (Default)

USB Port 10/11 Function:

USB Controller 1 Enable/Disable

Disabled: Sets USB Port 10/11 to be Disabled

Enabled: (Default)

USB Keyboard Function

USB keyboard support if USB 1.0 enabled

Disabled: USB keyboard will be Disabled during POST

Enabled: (Default) USB keyboard will be Enabled during POST

USB Mouse Function

USB mouse support if USB 1.0 enabled

Disabled: This setting is effective on DOS/POST

Enabled: (Default)

USB Storage Function

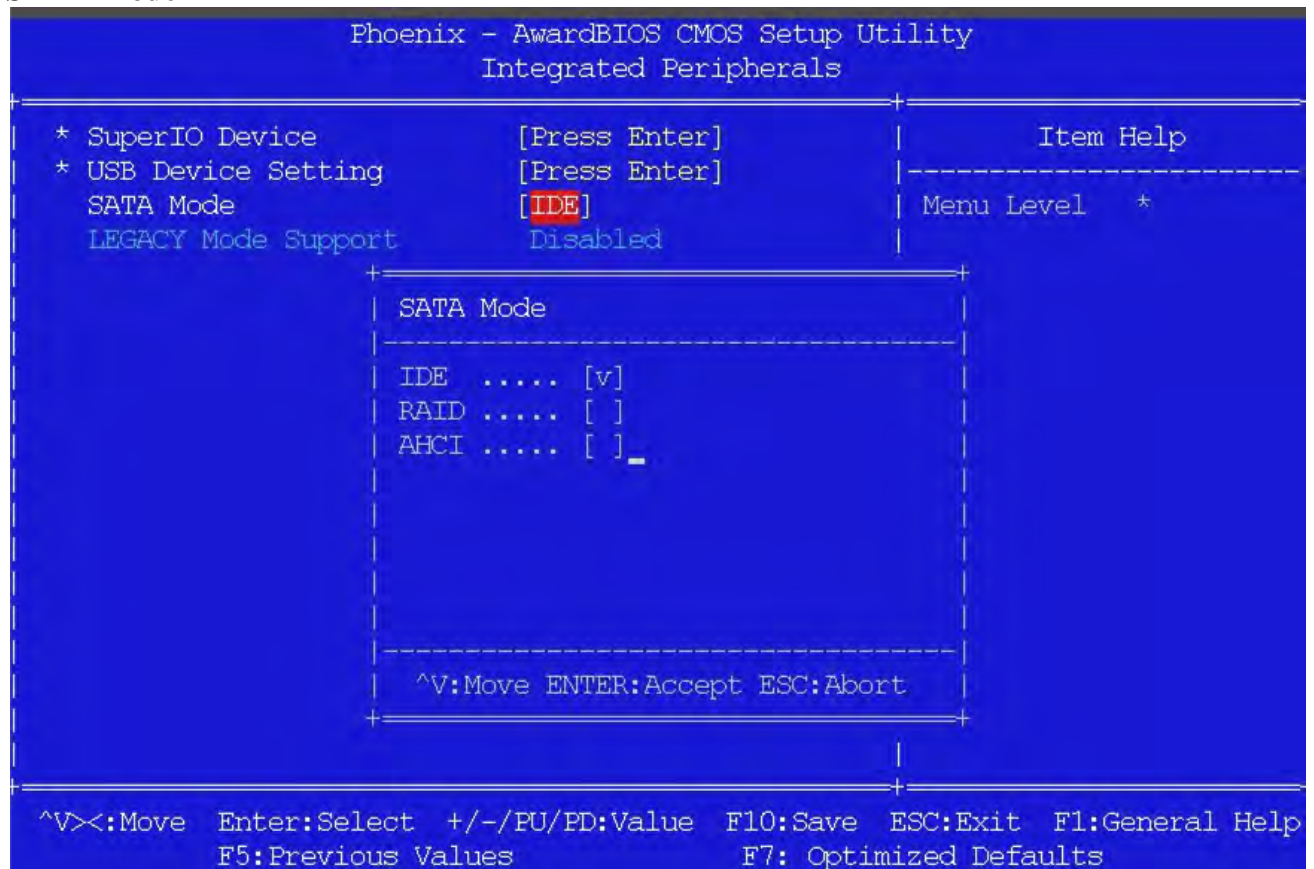
USB storage support if USB 1.0 enabled

Disabled: This setting is effective on DOS/POST

Enabled: (Default)

USB Mass Storage Device Boot Setting

This Item will Show USB device which is bootable device

SATA Mode**SATA Mode**

Allows user to select SATA mode to be used

IDE: As normal IDE Hard Drive

RAID: (Default) Provides Raid-0,1 function

AHCI: Provides AHCI function

Security Chip Configuration

```

Phoenix - AwardBIOS CMOS Setup Utility
Security Chip Configuration
-----
TPM Support          [Enabled]
TPM Current Status  Disabled & Deactivated
TPM Status          [No change]
-----
Item Help
-----
Menu Level  *
-----
Enable/Disable Trusted
Platform Module.
-----
-----
^V<:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
F5:Previous Values          F7: Optimized Defaults

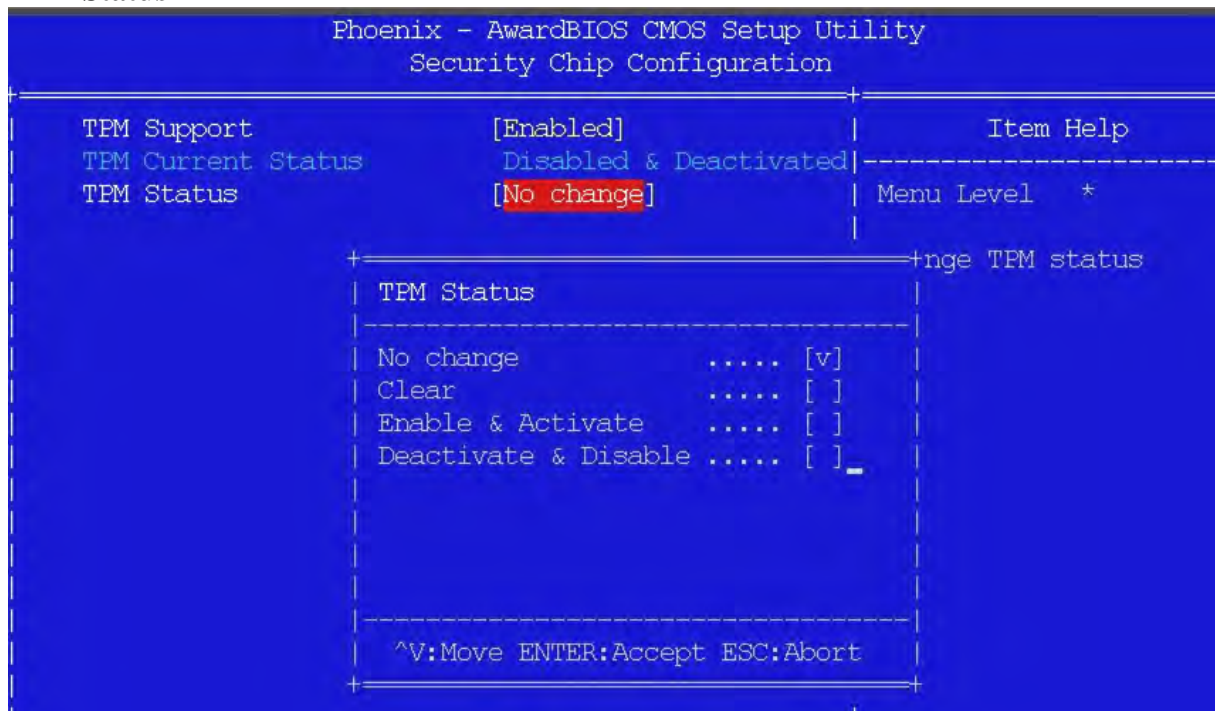
```

TPM Support

TPM function support (Trusted Platform Module)

Disabled: TPM function disabled

Enabled: (Default) TPM function enabled

TPM Status**TPM Status**

This item allows user to select TPM status

No Change: (Default) Does not change the current status of the TPM module

Clear: Resets to factory defaults and turns TPM off. Deletes all TPM keys.

Enable & Activate: Enables and activates TPM

Deactivate & Disable: Deactivates and disables TPM

Power Management Setup

```

Phoenix - AwardBIOS CMOS Setup Utility
Power Management Setup
-----+-----
ACPI Function           [Enabled]
ACPI Suspend Type      [S3(STR)]
Power Management        [User Define]
Video Off Method        [Blank Screen]
Video Off In Suspend   [Yes]
Suspend Type           PwrOn Suspend
Suspend Mode           [Disabled]
Soft-Off by PWR-BTTN   [Delay 4 Sec.]
PWRON After PWR-Fail   [Former-Sts]
Wake On Lan Function    [Enabled]
USB KB WakeUp From S3(S4) [Disabled]
Resume by Alarm        [Disabled]
x Date(of Month) Alarm  0
x Time(hh:mm:ss) Alarm  0 : 0 : 0

** Reload Global Timer Events **
COM Port               [Disabled]
HPET Support           Enabled
HPET Mode              32-bit mode
-----+-----
^V<>:Move  Enter:Select  +/-/PU/PD:Value  F10:Save  ESC:Exit  F1:General Help
F5:Previous Values          F7: Optimized Defaults

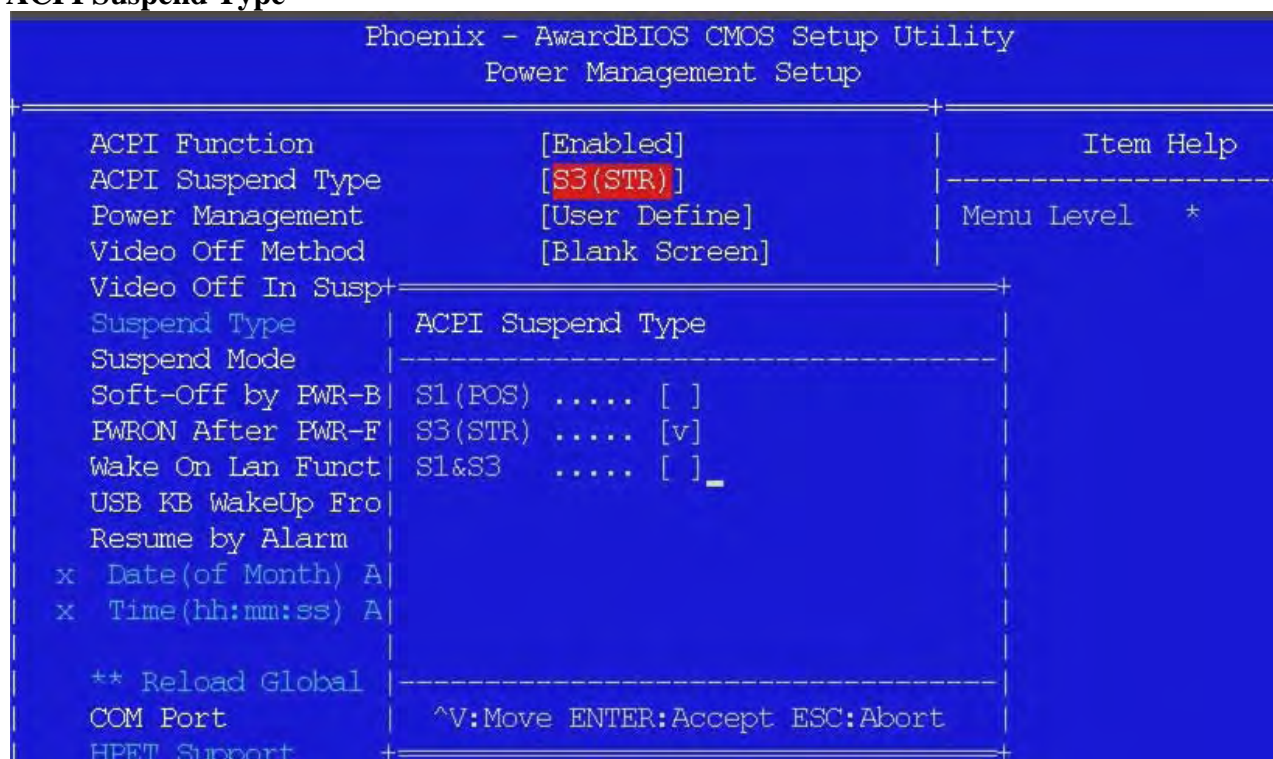
```

ACPI Function

Advanced Configuration & Power Interface Support

Disabled: ACPI Function disabled

Enabled: (Default) ACPI Function enabled

ACPI Suspend Type**ACPI Suspend Type**

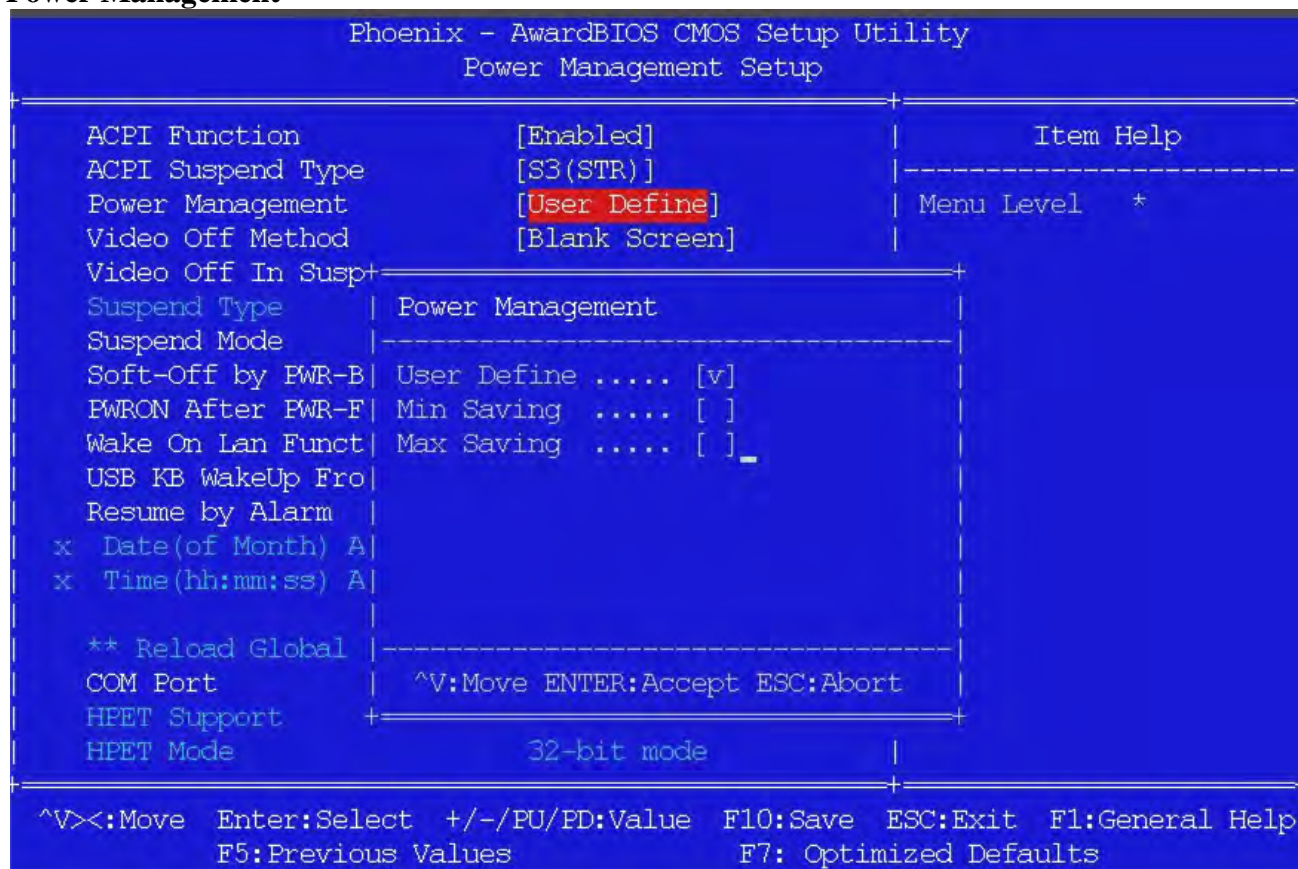
Allow user select suspend type when ACPI function support

S1(POS): Suspend type use S1 status

S3(STR): (Default) Suspend type use S3 status

S1&S3: Suspend type use S1&S3 status based on OS selection.

Power Management



Power Management

Power Management Setting Selected

User Define: (Default) By User Define

Min Saving: Min saving in Power Management policy

Max Saving: Max saving in Power Management policy

Video Off Method

Select method when Video Off

Blank Screen: (Default) Blank Screen

V/H SYNC+Blank: V/H Sync+Blank Screen

DPMS: Display Power Management Signaling

Video Off In Suspend

Allow user to select Video off when system in suspend mode

No: No Video Off

Yes: (Default) Video Off

Suspend Type

PwrOn Suspend: (Default)

Suspend Mode

Disable: (Default)

1,2,4,8,12,20,30,40 Min

1 Hour**Soft-Off by PWR-BTTN**

Set soft-off method when power button pressed

Instant-Off: Instant-Off

Delay 4 Sec: (Default) Delay 4 second then power off

PWRON After PWR-Fail

Power On Method After Power Reapply

Former-Sts: (Default) Record last status when power reapply

On: Power always on when power reapply

Off: Power always off when power reapply

PCI Express PM Function

PCI-Express PME function support if PCI-E root is enabled

PCI Express PME

Disabled:

Enabled: (Default)

Wake-Up by PCI card

Set PCI card wake-up event function

Disabled: (Default) PCI card wake-up event disabled

Enabled: PCI card wake-up event enabled

Wake-Up by GBE

Set On board Gigabit Ethernet wake-up event function

Disabled: (Default) On board GBE will not cause wake-up event

Enabled: On board GBE will cause wake-up event

USB KB Wake-Up From S3(S4)

Set USB keyboard wake-up event from S3 status

Disabled: (Default) USB keyboard wake-up event from S3 status function disabled

Enabled: USB keyboard wake-up event from S3 status function enabled

Resume by Alarm

Set Alarm wake-up event function

Disabled: (Default) Set Alarm wake-up event function disabled

Enabled: Set Alarm wake-up event function enabled

Date(of Month) Alarm: Set Alarm wake date when Resume by alarm enabled

0 (Default) Default Date

Time(hh:mm:ss) Alarm Set Alarm wake time when Resume by alarm enabled

0:0:0 : (Default) Default Time

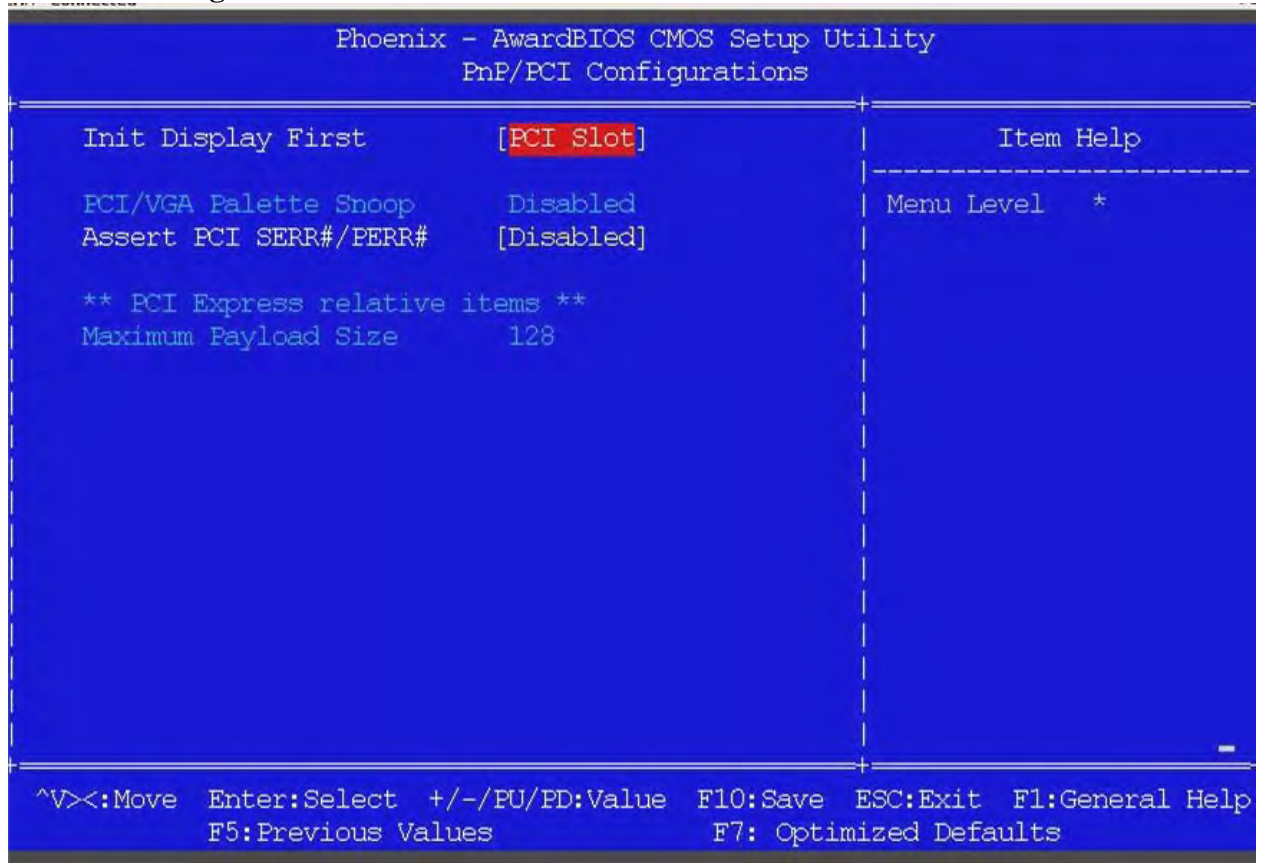
COM Port

Reload Global Timer By FDD and COM port

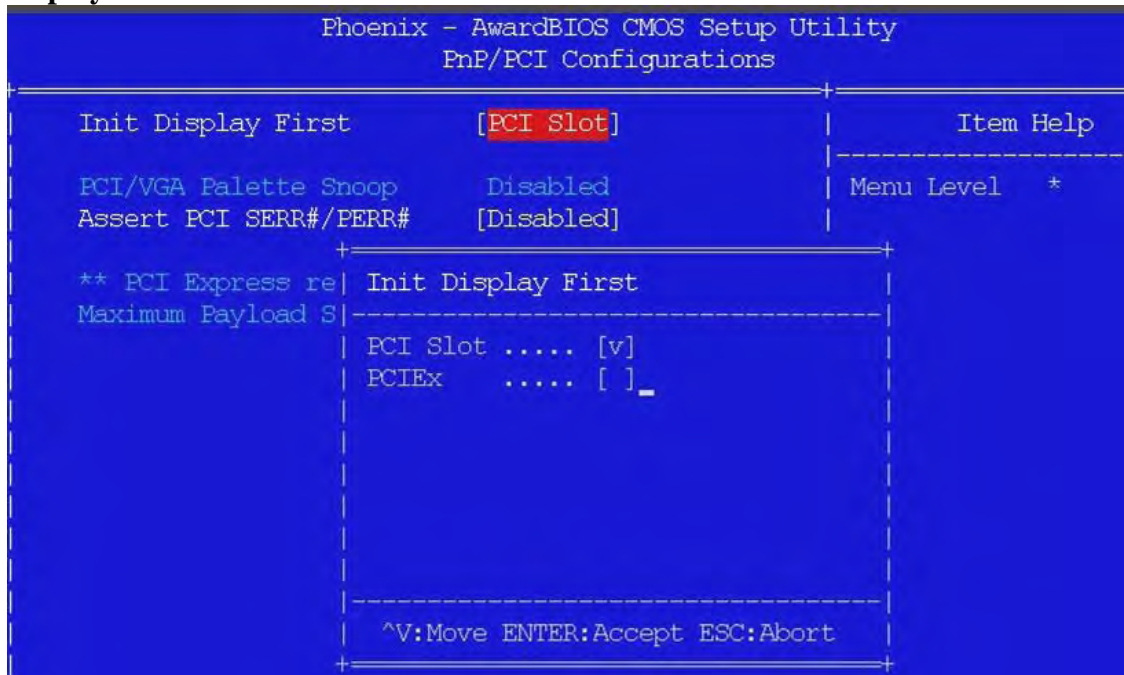
Disabled: (Default)

Enabled:

PnP/PCI Configurations



Init Display First



Init Display First

Booting VGA Device Selected

PCI Slot: PCI or PEG display device port first .

Onboard: (Default) On-Chip display device first, if PCI-E video card is not added

PCI-E: If PCI-E video card is added.

Assert PCI SERR#/PERR#

Assert SERR# or PERR# signal when PCI device error occurs

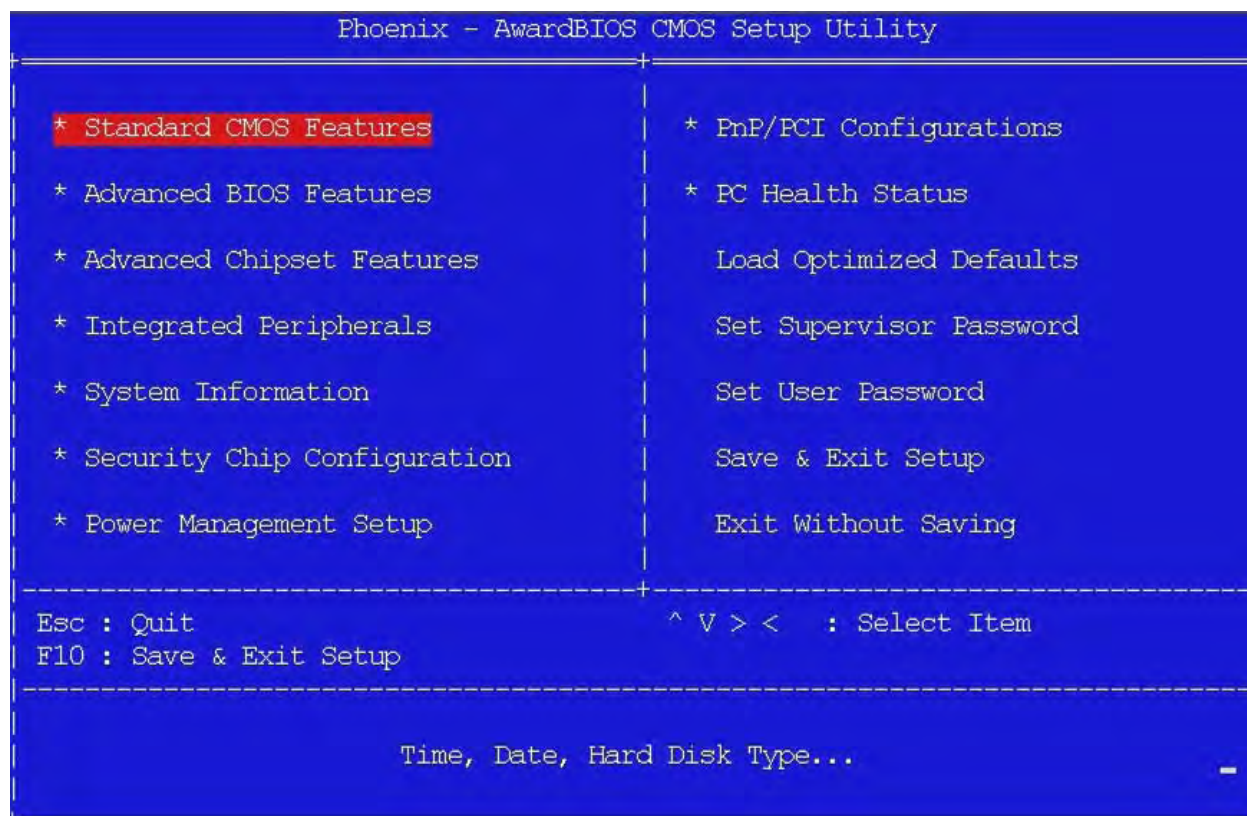
Disabled: Disables SERR#/PERR# event generation

Enable: Enables SERR#/PERR# event generation

PC Health Status

Phoenix - AwardBIOS CMOS Setup Utility		
PC Health Status		
CPU Relative Temperature	34 C	Item Help
MCH Temperature	71 C	-----
CPU FAN Speed	897 RPM	Menu Level *
Current System Temperature	29 C	
Chassis Fan Speed	1122 RPM	
VCore	1.29V	
1.8 V	1.78V	
5 V	4.94V	
12 V	12.02V	

^V<>:Move Enter:Select +/-/PU/PD:Value F10:Save ESC:Exit F1:General Help
F5:Previous Values F7: Optimized Defaults



Load Optimized Defaults

Load BIOS Optimized Default settings. After this setting is chosen, all BIOS settings are returned back to default states which is described in this document.

Set Supervisor Password

Input 8 characters to set Supervisor Password. If no input is entered, then no password will be selected.

Set User Password

Input 8 characters to set User Password. If no input is entered, then no password will be selected.

Save & Exit Setup

Save current BIOS settings and exit.

Exit & Without Saving

Do not save BIOS settings and exit.

9.2 BIOS Update

The *TeamPoS 3600 Series* (Yukon) BIOS update can come in 2 different types, a Type 1 or a Type 2. Depending on the type of BIOS the updates come as will dictate the proper procedure to follow for the BIOS upgrade. To recognize the different file types, the following syntax will be used for the BIOS .bin filename:

yunmARXX.bin

Where A is the BIOS Type (1 or 2) and XX is the BIOS revision number.

For example, the filename yunm2R20.bin is a Type 2, revision 20 BIOS.



Note: For specific instructions, always refer to the readme file for the BIOS update instructions for each release as instructions may differ depending on the case.

9.2.1 Upgrading with Type 1 BIOS

These instructions are provided for the upgrade of the *TeamPoS 3600 Series* (Yukon) BIOS to Rxx type 1 BIOS update" (xx is the BIOS revision number, R20 would be revision 20) This update only updates the system BIOS area, and does not update any other areas such as the Intel ME BIOS.

- Loading the Rxx BIOS
 1. Copy the folder "**Rxx**" (xx is the BIOS revision number, R20 would be revision 20) on to a bootable USB drive
 2. Boot to USB drive and go to the "**Rxx**" folder
 3. Type "**awdflash yunm1rxx.bin /py /sn /r**" and hit "**Enter**"
 4. After BIOS is done flashing, the system will reboot

9.2.2 Upgrading with Type 2 BIOS

Low Level (Type 2) BIOS Update on TP3600 Series: BIOS updates on the TP3600 Series will come in 2 different types: Type 1 and Type 2. A Type 1 BIOS update is a standard BIOS firmware update. A Type 2 BIOS update may have updates for one or all of the following components: Intel ME (includes AMT, ASF, QST), GbE and standard BIOS.

Items needed:

- 1 (one) 2.54 mm (0.1 inch) jumper
- The cover for the controller will need to be removed to access the motherboard



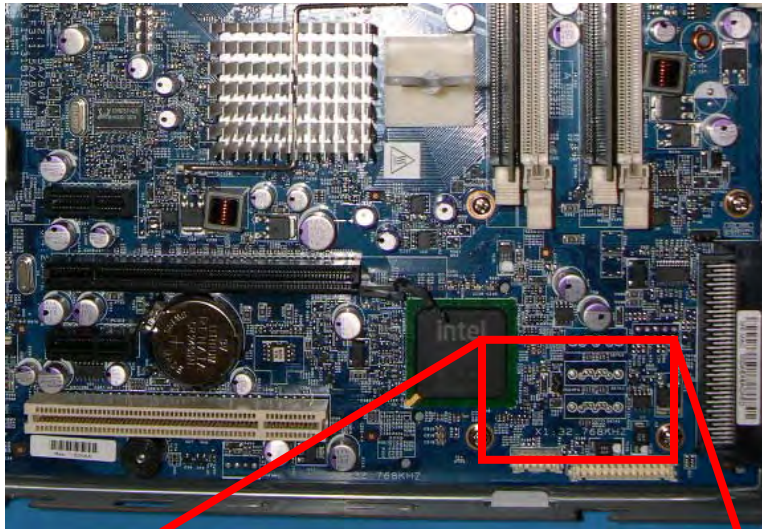
Note: The instructions below call for a use of a jumper across CN5. If a spare jumper cannot be found, the jumper that is across CN3 can be taken and used for CN5. The instructions were written so that only a single jumper will be needed. case.

To save current DMI information of current system to be restored after BIOS is updated:

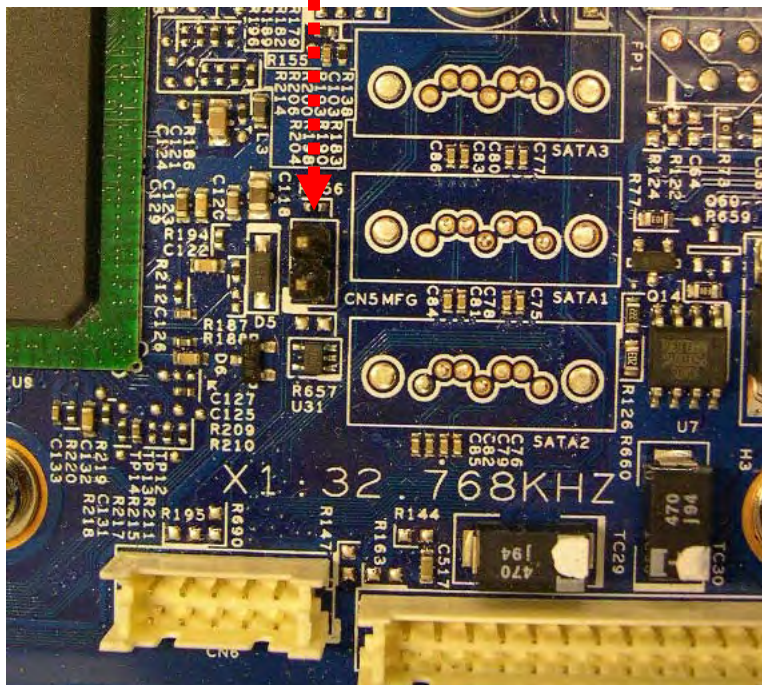
1. Navigate to the Yukon support folder at <ftp://ftp.ftxs.fujitsu.com/pos/possustaining/retail> and go into the BIOS update tools directory. Copy the contents onto a bootable USB drive (DMI Tool, RXX BIOS [YUNM2RXX.bin], and BIOS update programs)
*** The contents of DMI Tool and RXX should all reside in the same directory ***
2. Boot to bootable USB Drive and navigate to the directory where the files are located
3. Type "rinfo" and hit Enter
*** This should save the DMI contents onto the flash drive ***
4. Copy info on flash drive for later verification

Load RXX BIOS:

1. Turn off system and put a jumper (not supplied) on CN5 and leave on until update is over. If a spare jumper cannot be found, the jumper across CN3 can be taken and used for this purpose.

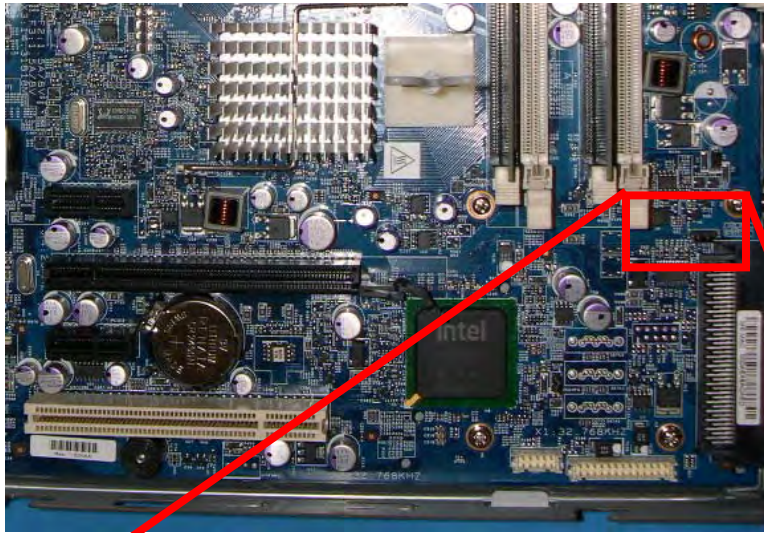


CN5

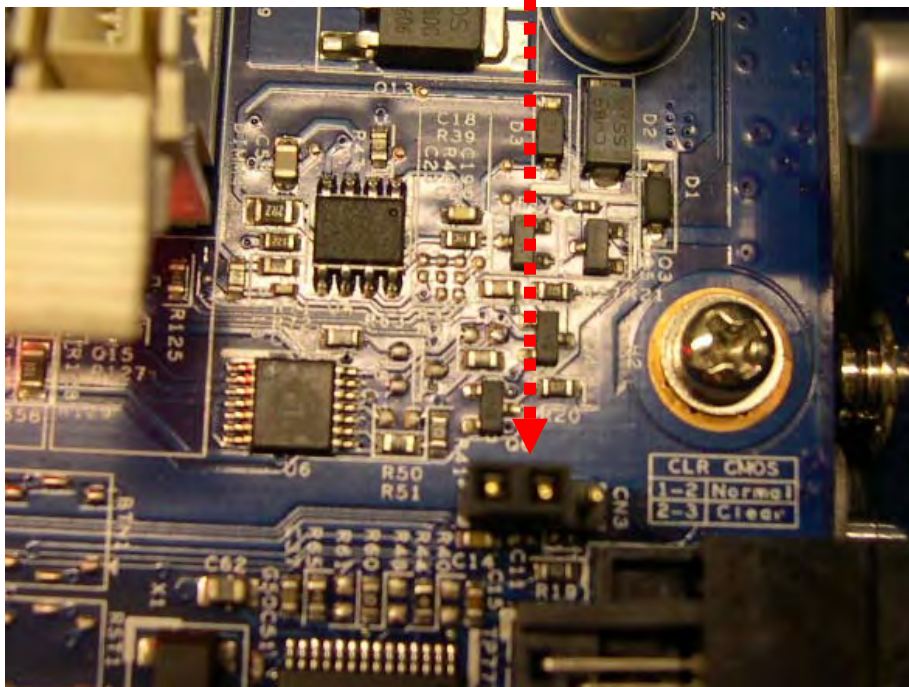


2. Boot to bootable USB Drive and navigate to the directory where the files are located
3. Type "fprog /f:yunm2rXX.bin" and hit Enter *** XX is the version of the BIOS
For R20, the syntax would be: fprog /f:yunm2r20.bin
4. After BIOS is done flashing, turn off and unplug the terminal
5. Remove jumper on CN5 to enable ME

6. CLR the CMOS by moving CN3 jumper across pins 2 and 3 for a second and then put back across pins 1 and 2.



CN3 with jumper across Pins 1 and 2 shown



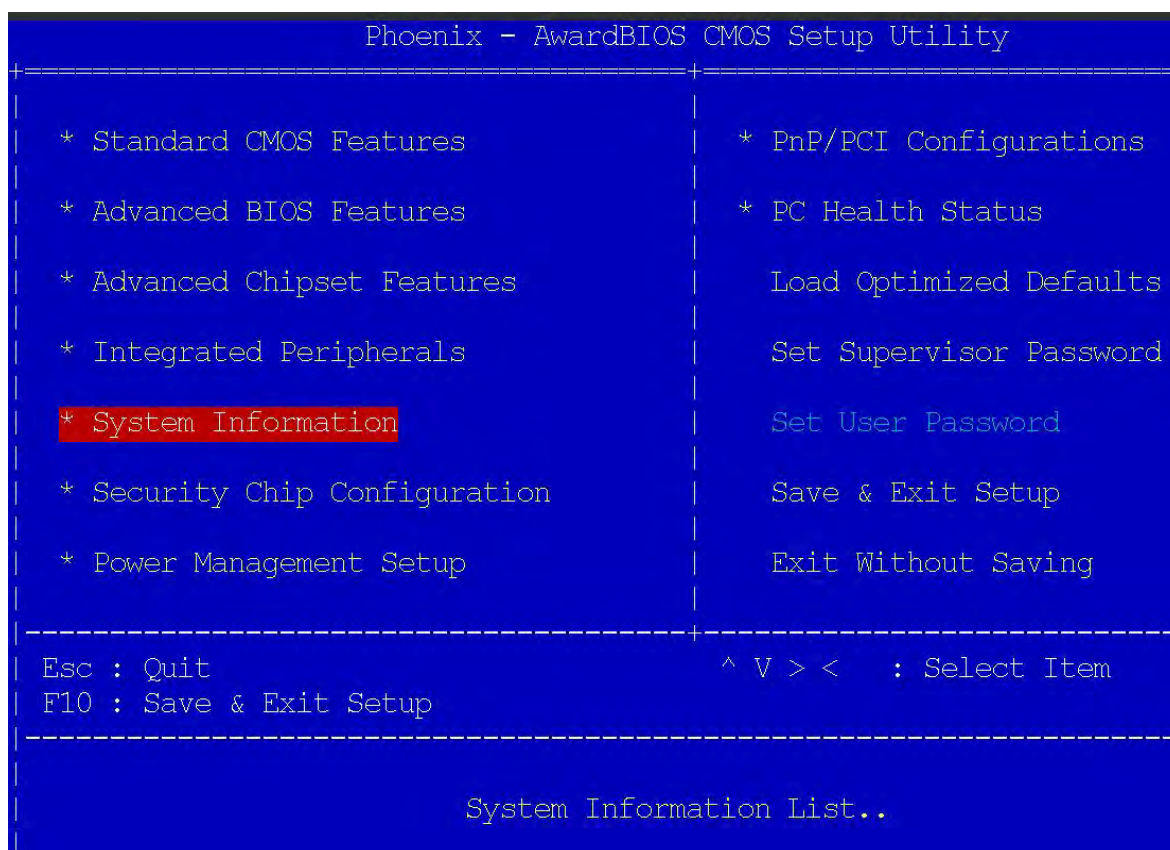
Load saved DMI information:

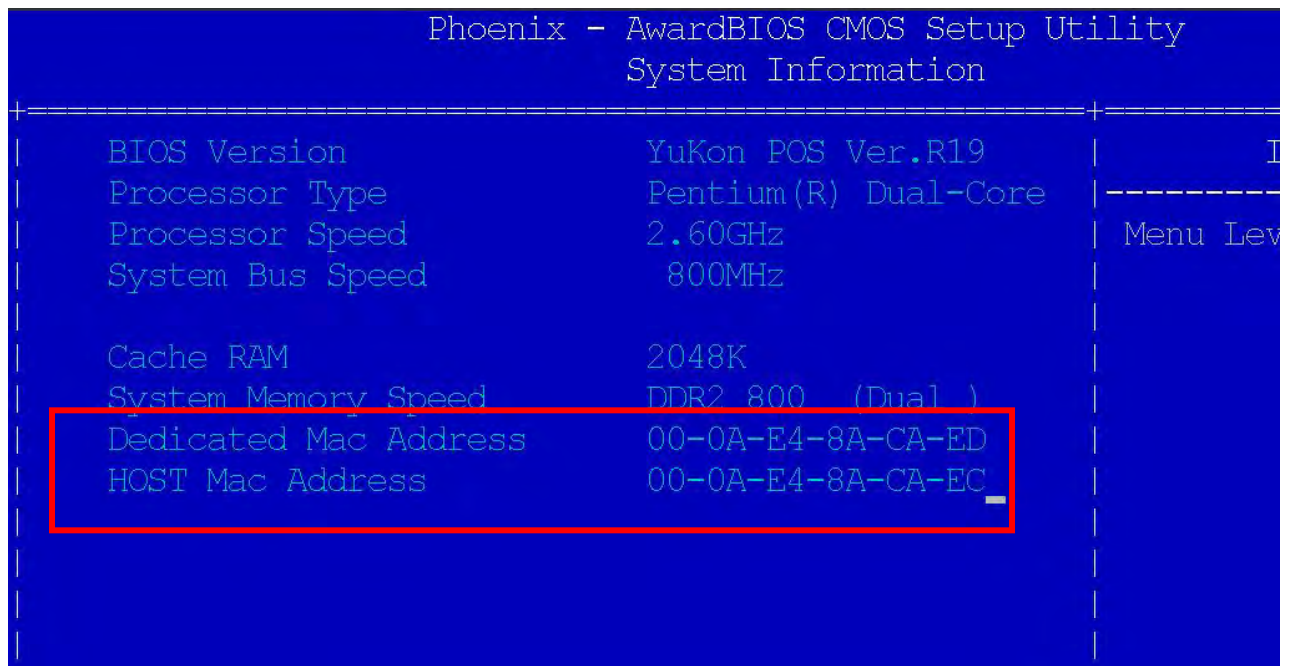
1. Reboot system to bootable USB Drive and navigate to the directory where the files are located
2. Type "winfo" and hit Enter
*** This should have restored the DMI contents ***
3. Power down and unplug the AC on the terminal
4. Power up and go into BIOS "System Info" and verify Mac Address and LAN are correct.
5. Load Optimized Defaults. If customer uses non default BIOS settings, make the changes after Load Optimized Defaults are set.
6. Save and Exit BIOS
7. Restart back into the OS and verify functionality

9.2.3 Checking LAN and Mac addresses for Type 2 BIOS

To make sure the correct Mac and LAN addresses are carried over to the new BIOS:

1. Boot the system up and go into BIOS by hitting “DEL”
2. Go to System Information and look at “Dedicated Mac Address” and “HOST Mac Address” fields

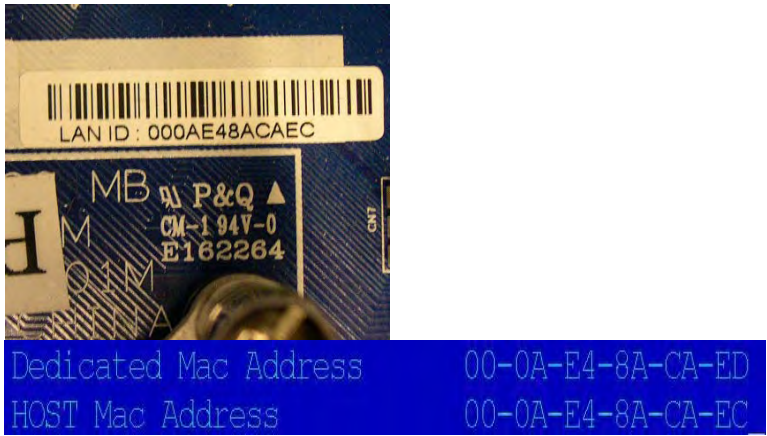




3. To verify the Dedicated Mac Address and HOST Mac Address fields in the above step is correct, these numbers can be verified with labels on the controller.

On the motherboard, there is a label on the connector that interfaces to the HDD board. This is the ME MAC Address. This should be the same number as the **Dedicated Mac Address**:





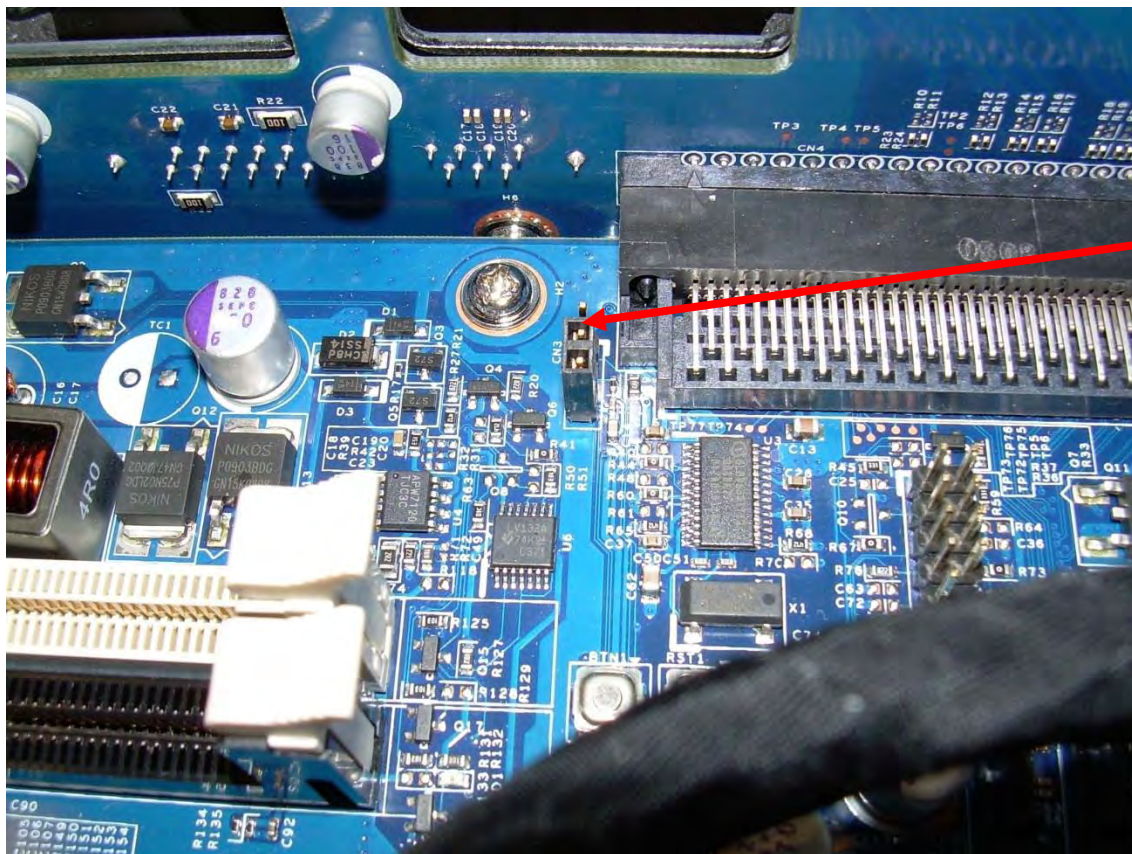
On the motherboard, there is another label next to the CPU. This is the LAN ID. This should be the same number as the **HOST Mac Address** from above:

9.3 Clear CMOS

The Clear CMOS jumper is located next to the connector going to the HDD converter board.

The label on the jumper is CN3 and is shown below in its normal operational state. In order to clear CMOS the following procedure needs to be followed:

1. Power must be turned off and the AC plug removed.
2. Move jumper CN3 from 1-2 to the 2-3 position.



Move jumper CN3 from 1-2 to the 2-3 position.

3. Move jumper back to position 1-2
4. Plug in the AC power cord and power up the terminal, this will clear CMOS

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Chapter 10. Spares and Upgrades Parts List

DESCRIPTION	PART NUMBER
TeamPoS 3600 Series	
Chassis, Bare Bones, No CPU, HDD or I/O Board, Black, BIOS R21	11003590
PCB, Motherboard, BIOS	11003499
PSU, Power Supply, SPS 350W, 100/240VAC	11003009
Kit, Operator Panel w/ Bracket	11003014
Cable, Operator Panel	11003017
Fan, Chassis, 12VDC	11003016
Panel Assy, Front w/ Door and Keylock, Black	11003188
Keylock	11003423
Keys	11003422
Front Door, Black	11003190
Lever, PCI Care Locking, Plastic, Green	11003416
Cable Clip, MB Cables, Plastic	11003417
Rubber Foot, Chassis	11003418
Cable Clip, HDD Cables, Plastic	11003419
Spring, CD-ROM HD-368	11003420
Gasket, PCI Shield	11003421
Assy, Powered USB I/O Board without Cash Drawer Port, Bracket, Cables	11002846
Assy, Legacy I/O Board, Bracket, Cables	11002847
Assy, Legacy I/O Board and Powered USB without Cash Drawer Port, Brackets, Cables	11003039
Assy, Powered USB I/O Board with Cash Drawer Port, Bracket, Cables	11003538
Assy, Legacy and Powered USB I/O Board with Cash Drawer Port, Bracket, Cables	11003539
Cable, Legacy I/O, 330mm	11003079
Cable, Powered USB I/O	11003080
PCB, Powered USB I/O Board without Cash Drawer Port	11003570
PCB, Legacy I/O Board	11003571
Bracket, I/O Board Mounting, P-USB Option, No Cash Drawer Port	11003572
Bracket, I/O Board Mounting, Legacy Option	11003573
Bracket, I/O Board Mounting, P-USB , No Cash Drawer Port, and Legacy Options	11003574
Cable Clamp, AB15C-NQ2	11003575
Plate, Rear I/O Blanking	11003040
Fan/Heatsink, 12VDC	11003015
CPU, Intel Core 2 Duo, E8400, 3.0Ghz	11003037
CPU, Intel, Celeron 440, 2.0Ghz	11003010
CPU, Intel Pentium Dual-Core, E5300, 2.6Ghz	11003058
CPU, Intel Core 2 Duo, E7400, 2.8Ghz	11003059
DIMM, Memory Module, 1.0GB DDR2, 800Mhz	11003011
DIMM, Memory Module, 2.0GB DDR2, 800Mhz	11003012
DIMM ASSY, Memory Modules, 3.0GB DDR2, 800Mhz	11003071
DIMM ASSY, Memory Modules, 4.0GB DDR2, 800Mhz	11003072
DIMM ASSY, Memory Modules, 5.0GB DDR2, 800Mhz	11003073
DIMM ASSY, Memory Modules, 6.0GB DDR2, 800Mhz	11003074
DIMM ASSY, Memory Modules, 7.0GB DDR2, 800Mhz	11003075
DIMM ASSY, Memory Modules, 8.0GB DDR2, 800Mhz	11003076

DESCRIPTION	PART NUMBER
HDD, Hard Disk Drive, 3.5, 160GB, SATA	11003013
HDD ASSY, 160G SATA HDD, w/ Chassis Hardware	11003042
Kit, HDD PCB Assy with Bracket	11003081
Kit, Adapter Tray, 2.5, SSD, Black	11003083
Tray, HDD Bay, 3.5, Black	11003085
Filler, HDD Bay, Black	11003041
CD/RW-DVD, 24X, w/Bezel/Cable/HW, w/NERO/WinDVD, Black	11003020
CD/RW-DVD, 24X, w/Bezel/Cable/HW, w/NERO, Black	11003087
CD/RW-DVD, 24X, w/Bezel/Cable/HW, No SW, Black	11003090
Cable, CD/RW-DVD Combo Drive	11003078
Card, Video/PCI/DVI	11001991
NIC, Intel Gigabit CT, 10/100/1000 Mpbs	11003597
STACKING KIT (Garage)	
Integration Kit, TP3600 Controller, Black	11003412
Front Panel End, Plastic, Black	11003340
Kit, Sheet Metal, Black	11003357
Plate, Top, Black	11003346
Plate, Bottom, Black	11003347
Side, Left, Black	11003348
Side, Right, Black	11003349
Bracket, Front Panel	11003350
Spacer, 4.5ODx3mmx3.2ID, Aluminum	11003393
Screw, Flat Head, Phillips, M3x0.5x8mm, Black	11003445
Foot, Rubber, 20mmx1mm, 3M Adhesive, Black	11003444
Screw, Thumb, M3x6.8, 10mm Dia, Black	11003446
Screw, Pan Head, Phillips, SEMS, M3x0.5x8mm	11003448
Screw, Flat Head, Phillips, M3x0.5x5mm, Nickel	11000629
Screw, Pan Head, Phillips, SEMS, M3x0.5x6mm, Nickel	11000595
DOCUMENTS & MANUALS	
Intelligent PIN Description Doc, TP3600	D900000317
Installation & Maintenance Manual, TP3600 Series	D900000338
Booklet, Safety Notice, English/French	11003214
CASH DRAWER CABLES	
CBL TP15/TP5C CDR to PTR/0.5/WHT	11000163
CBL TP15/TP5C CDR to PTR/0.5/BLK	11000164
CBL TP15/TP5C CDR to PTR/2.0/WHT	11000165
CBL TP15/TP5C CDR to PTR/2.0/BLK	11000166
CBL TP15/TP5C CDR to PTR/4.0/WHT	11000382
CBL TP15/TP5C CDR to PTR/4.0/BLK	11000384
Cable, TP36 Dual CDR, White, 0.65M	KD02906-2020
Cable, TP36 Dual CDR, Black, 0.65M	KD02906-2021
Cable, TP36 Dual CDR, White, 2.0M	KD02906-2022
Cable, TP36 Dual CDR, Black, 2.0M	KD02906-2023
Cable, TP36 Dual CDR, White, 4.0M	KD02906-2024
Cable, TP36 Dual CDR, Black, 4.0M	KD02906-2025
SOFTWARE	Prefix: OS = Preloaded

DESCRIPTION	PART NUMBER
	Image, DVD = Recovery Disk, IMG = Base SW Image
NERO Software, OEM Suite, V8.3	11000672
OEM Windows XP Pro for XL, Preloaded for XL	OS-XPPRO-3KXL855
OEM Windows XPe, Server Downloaded for XL	OS-XPECS-3KXL855
OEM Windows XPe, Preloaded for XL	OS-XPE-3KXL855
WINDOWS 2003 SERVER W/5CAL EMB for XL	OS-W2K3S-3KXL855
XP PRO OEM UNRES Operating System for XL	OS-XPPROUNR-3KXL855
WePOS Operating System for XL	OS-WEPOS-3KXL855
Vista Business Operating System for XL	OS-Vista-3KXL855
POSReady, Preloaded	OS-POSRDY-3KXL855
Windows® 7 Professional for Embedded	OS-W7P-3KXL855
Windows® 7 Ultimate for Embedded	OS-W7U-3KXL855
POS Ready Image for TP3K XL2	OS-POSRDY-3KXL965
WePOS Image for TP3K XL2	OS-WEPOS-3KXL965
XP Pro for TP3K XL2	OS-XPPRO-3KXL965

Chapter 11. Acronym

Acronym/Word	Definition
ACPI	Advanced Configuration and Power Interface
AHCI	Advanced Host Controller Interface
AMT	Intel Active Management Technology
BIOS	Basic Input/Output System
BLK	Black
CBL	Cable
CDR	Cash Drawer
CMOS	Complementary Metal Oxide Semiconductor
COM Port	Communications Port
CPU	Central Processing Unit
DMI	Desktop Management Interface
DSP	Display
DVMT	Intel Dynamic Video Memory Technology
GbE	Gigabit Ethernet
HDD	Hard Disk Drive
IDE	Integrated Drive Electronics
IDE-R	IDE Redirect
KIT	KIT
KYB	Keyboard
OPN	Options
PEG	PCI Express Graphics
PERR	Parity Error for PCI Devices
POST	Power On Self Test
PSU	Power Supply
PTR	Printer
PWR	Power
PWRON	Power On
RAID	Redundant Array of Independent Disks
RAM	Random Access Memory
SATA	Serial ATA
SCSI	Small Computer System Interface
SERR	System Error for PCI Devices
SOL	Serial Over LAN
TPM	Trusted Platform Module
UPG	Upgrades
USB	Universal Serial Bus
VGA	Video Graphics Array
WHT	White

