

Product Support Bulletin

Subject: Proper Method for Running Benchmark and Diagnostics Programs

Date: 06/04/93

Page(s): 1 of 1

PSB No: S-0158

Originator: MWT

This bulletin describes the proper method for running any benchmark or diagnostics programs. This applies to any computer system.

In most cases, the computer should be started using an MS-DOS boot diskette that's 'clean' - in other words, one with no CONFIG.SYS or AUTOEXEC.BAT files. The appropriate executable can then be run, either from diskette or hard drive.

There will be some exceptions to the above rule. In attempting to benchmark or troubleshoot any add-on that requires a device driver (CD-ROM, local area network, etc.), obviously the necessary device driver(s) must be loaded. Also, some programs will require a minimum number of FILES or BUFFERS to be defined in the CONFIG.SYS file. Such programs will usually display this requirement if they are run without the necessary CONFIG.SYS file.

For the most consistent results, use the absolute minimal boot configuration that's allowed by the hardware being tested.

Product Support Bulletin

Subject: Equity Series SIMM Compatibility

Date: 12/4/91
Page(s): 1 of 1

PSB No: S-0136
Originator: JAD

Due to the influx of third party SIMMs on the market, there are some that are not compatible with Epson products. This bulletin is intended to be an aid in ensuring that only compatible SIMMs are chosen for use in Epson's Equity Series of computers.

The SIMMs in question were SEIMENS, CUMULUS and KINGSTON. Installing these SIMMs in Epson products may cause the following errors:

Parity Check 1
18FFFE 0000 202 Memory Address Error
164 System Options Not Set
1500 E000 201" DOS RAM Address Error

It was thought that the chips used in these SIMMs were of poor quality.

Epson Portland evaluated the SIMMs in question and found that this was not true. The problem is caused by the SIMM circuit boards (ITE and TECAP circuit boards) used to manufacture the SIMM modules. The dimensions of these boards are not compatible with industry standard SIMM sockets. This may result in incomplete contact between the SIMM assembly and it's socket. This is caused by insufficient size of the contact surfaces in these products. Also enlarged holes in the TECAP product allow the component pin to pass entirely through the hole without making contact.

It is recommended that only SIMMS meeting industry standard contact surface specifications be used in Epson Equity computer products.

Some recommended SIMMs that were tested and found Compatible are:

Toshiba
Matsushita
CDC Enterprises
Samsung
Aculogic

For more information contact Technical Support.

EPSON

EPSON AMERICA, INC.

INFORMATION

Product Support Bulletin

Subject: Maximum Number of Printers Supported by Current Equity Computers

Date: 02/06/91

PSB No: S-0128

Page(s): 1 of 1

Originator: KAS

As computing environments increase in complexity, there has been an increasing number of instances that require the support of several printers by one computer. One common example is that of using Novell Netware's print server capabilities to provide printer access to a large group of users with differing printer requirements. Netware is capable of supporting three (3) parallel and two (2) serial printers on one server. Recent testing has shown that the Equity 386/25 Plus, Equity 386/25, Equity 386/20 and the Equity 386SX Plus will support three (3) parallel ports along with two (2) serial ports. The key factor in providing support for a third parallel port is the need for a parallel interface card that can be set to the IBM Monochrome Graphics/Parallel printer I/O address at 3BCh. The computer looks for this address first and, if present, will assign the parallel port on that card as LPT1. The built-in parallel port (I/O address 378h) will then be addressed as LPT2. We also had an AST I/O Mini serial/parallel card addressed at I/O address 278h, which was then reassigned to LPT3. Each of the three parallel ports was attached to a printer. There was also a printer attached to each of the two serial ports. All five printers were then set to print simultaneously under Netware Version 2.15 Rev. C using PCONSOLE. All five printers were able to print the documents assigned to them, simultaneously. The units were then tested using WordPerfect 5.1 on the network and again were successful in printing to the five (5) printers at the same time. The last tests were run with the units booting under DOS 4.01 and screen prints being directed to each of the printers. WordPerfect 5.1 was also used to direct documents to each of the printers. Again all five (5) printers were able to print the files that were sent to them.

Although not all Equity computer models were tested in this situation, the Equity models 386SX, IIe, III+ and II+ should work in a similar manner if the instructions above are used as a guide. There is one item of which to be aware when using the this setup and that is the system will complete the RAM count and lock up if using a monochrome monitor. If you need to use three parallel ports, USE A COLOR MONITOR.

Product Support Bulletin

Subject: Novell Advanced NetWare 286 ND on an 80386 - based Server

Date: 4/11/90
Page: 1 of 1

PSB No: S - 0116
Originator: MWT 

This bulletin is to inform you of a potential problem that can occur when running Novell Advanced NetWare 286 in non- dedicated (ND) mode on an 80386 - based file server. This includes the Equity 386/20 and the 386SX.

When a DOS command is executed on the ND server and there is moderate network activity, the system may halt with the following error message:

Abend: INVALID TASK STATE INTERRUPT

This is apparently due to some 80286 - specific protected mode operations that do not function quite the same way when executed on an 80386. This has been observed in the following NetWare versions:

- Advanced NetWare 286 2.0a
- Advanced NetWare 286 2.11
- Advanced NetWare 286 2.12
- Advanced NetWare 286 2.15a
- Advanced NetWare 286 2.15b
- ELS Level I
- ELS Level II

Note that the problem does not occur with the latest version, Advanced NetWare 286 2.15c. Unless this version of NetWare 286 is being used, we cannot recommend non - dedicated file server operation with any Epson 80386 - based computer.

Product Support Bulletin

Subject: Equity Series Computers and Lotus 1 - 2 - 3 Release 3.0

Date: 12/7/89

Page: 1 of 1

PSB No: S-0108

Originator: KAS *KAS*

The advent of Lotus 1 - 2 - 3 Release 3.0 has raised a number of questions regarding memory management for the Epson Equity computers, specifically the Equity 386/20, Equity 386SX and Equity IIe. The purpose of this document is to discuss the memory requirements for Lotus 1 - 2 - 3 Release 3.0 and recommendations for installation.

Because programs run significantly faster with extended memory, Lotus recommends that you configure as much memory as possible as extended memory.

When installing Lotus 1 - 2 - 3 Release 3.0 on the Equity 386/20 or the Equity 386SX, do not use the EMS managers supplied with the system software (EEMM386.EXE for the Equity 386/20 and EMM386.SYS for the Equity 386SX). Neither of these EMS managers support the Virtual Control Program Interface (VCPI) which is required for compatibility with Lotus 1 - 2 - 3 Release 3.0.

NOTE: Should you require an EMS manager for your Equity 386/20 or Equity 386SX, there are third party software packages available that are compatible with Lotus 1 - 2 - 3 Release 3.0. Two such packages are **386MAX** version 4.03 or later, and Quarterdeck Expanded Memory Manager (**QEMM**) version 4.2 or later.

Do not use VDISK with the /E switch when running Lotus on the Equity 386/20. Though Lotus Release 3.0 will load, it will overwrite any data in the RAMDISK. VDISK supplied for both the Equity IIe and Equity 386SX is compatible with Lotus 1 - 2 - 3 Release 3.0 and does not have a problem with overwriting data in the RAMDISK.

When installing Lotus 1 - 2 - 3 Release 3.0 in the Equity IIe, use the EEMM286 memory manager in the hardware - emulation EMS mode. To do this, set memory as expanded memory on the Equity IIe and do not specify the expanded memory size. When the Equity IIe has only 1Mb system memory, you must select on - board memory type 5 in SETUP. When the Equity IIe has more than 1Mb of system memory, you must select type 3, 4 or 5.

Avoid the use of HDCACHE when installing Lotus 1 - 2 - 3 Release 3.0 on any of the Equity computer systems discussed in this document.

Product Support Bulletin

Subject: Equity 386SX Questions and Answers

Date: 10/01/89

Page: 1 of 8

PSB No: S-0106

Originator: DS/PM

DS P.M

Questions and Answers on the Equity 386SX

GENERAL:

- Q1. What microprocessor does the Equity 386SX use?
- A. The Equity 386SX utilizes the Intel 80386SX - 16 microprocessor running at 8 or 16Mhz. Use of this CPU gives you 386 performance and compatibility in a 16 - bit based computer architecture.
- Q2. What speed does the Equity 386SX operate at?
- A. The Equity 386SX operates at either a 16Mhz or 8Mhz processor speed. The speed can be set by using the CPU speed switch located on the front of the machine. At either processor speed, the system bus operates at a fixed speed of 8Mhz.
- Q3. What is the Auto Speed function?
- A. The Equity 386SX is capable of operating at 16MHz or 8MHz. Some copy-protected applications require the computer to run at 8MHz while accessing the program diskette. By enabling the Auto speed function the computer automatically switches to 8MHz when accessing the diskette drive. It then switches back to 16MHz for optimal performance. Auto speed is accessed through the SETUP program under the Auto speed option.
- Q4. Does the Equity 386SX use the Phoenix or Award ROM BIOS?
- A. No. All Equity desktop computers utilize a Seiko - Epson proprietary ROM BIOS.

- Q5. Can the Equity 386SX support an 80387 co- processor?
- A. Yes, 80387SX support is available. The Equity 386SX has a socket for an optional 80387SX - 16 math co - processor which operates at 16MHz. This allows extra processing power for math intensive programs like Lotus 1 - 2 - 3 or AUTOCAD.
- Q6. Can the Equity 386SX use option cards that are available for the IBM PC/AT?
- A. The Equity 386SX uses an AT- compatible ISA (Industry Standard Architecture) bus structure that enables you to install any of the various add-on products designed for IBM PC, XT or AT computer, such as: expanded memory, EGA or VGA video, internal modems and many more. It also supports all of the option boards manufactured by Epson for the EQUITY series. There are 5 standard I/O expansion slots (one with 8 - bit bus and 4 with 16 - bit bus); one proprietary slot occupied by a serial/parallel interface card. The 16 - bit slots will also accept 8 - bit compatible cards. The Equity 386SX offers flexibility in tailoring the system to your needs.
- Q7. Are there any tested internal modems that can be used?
- A. The Epson Link PC and the Hayes 2400 baud internal modems have been approved.
- Q8. Does the Equity 386SX have a built in PS/2 mouse port?
- A. Yes, it has a PS/2 compatible mouse port on the rear panel of the computer. The connector is a 6 pin mini DIN for an IRQ12 mouse or other device.
- Q9. Can the Equity " + " keyboard be used on this machine?
- A. The Equity " + " keyboards are the same as the keyboards used on the Equity 386SX and are thus interchangeable. The cable on the Equity 386SX keyboard is longer in length than the cable used on the " + " keyboard.

- Q10. What is the Password Security?
- A. This system provides three levels of password protection against unauthorized access: password before boot, network - server mode password and password disable. The password is user definable and consists of a 7 - byte (character) string. The password protection feature is not case sensitive. When the system is booted for the first time, or the password has been disabled and re- enabled by moving jumper J1 on the system board, the user defines and enables the password using the Setup utility on the Reference disk.
- Q11. What terminal emulation boards are compatible w/ the Equity 386SX?
- A. The following products have been tested and approved:
- | | |
|---------------------------|----------|
| 3278/79 Emulation Adaptor | IBM |
| IBM 5250 Board | IBM |
| IRMA/2 | DCA Inc. |
| SDLC | IBM |
- Q12. Does the Equity 386SX have a battery for the Real Time Clock?
- A. The Equity 386SX is using a "Dallas" model DS1287 which incorporates an HD146818 compatible real-time clock with an internal battery.
- Q13. What VGA adapters are compatible with the Equity 386SX?
- A. The following VGA adapters have been tested in the Equity 386SX:
- Paradise VGA Plus 16 Card
Paradise VGA Professional Card
Video Seven Fastwrite Card
- Q14. Can the serial and parallel ports be disabled?
- A. No. The parallel and serial ports auto configure at boot up from the BIOS ROM. They are set up as LPT1 and COM1 respectively and there are no hardware jumpers or DIP switches to set them to LPT2 and COM2.

Q15. How many internal device bays does the Equity 386SX have and will it support a full - height device?

- A. The Equity 386SX has 3 half - height bays to support up to 3 half - height devices. The separator between bays 2 & 3 can be removed to allow for the installation of a full - height device.

Q16. How many wait states does the Equity 386SX have?

- A. At 16MHz the system utilizes a "1/4 wait state" architecture for memory access and 0 wait states for ROM BIOS access on the motherboard. At 8MHz, memory and ROM BIOS access require 1 wait state; on the expansion bus, all memory or device requests are 1 wait state. If additional wait states are required, devices on the I/O channel hold the READY signal low thus wait states are generated until the device can respond to the CPU.

Q17. Are the wait states user selectable?

- A. No, the Equity 386SX automatically inserts them when needed after the command phase of the processor clock cycle.

Q18. How many jumpers are on the system board?

- A. There are five (5) jumpers on the system board:

System Board:

Jumper 1: Co - Processor Installed/Not Installed

1 - 2: Installed

2- 3: Not Installed (Factory Setting)

Jumper 2: Password

1 - 2: Password Enabled (Default)

2 - 3: Password Disabled

Jumper 3: Embedded HDD Interface Enable/Disable
1 - 2: Embedded HDD Interface Disable
2 - 3: Embedded HDD Interface Enable (Factory Setting)

Jumper 4: BIOS EPROM Type
1- 2: Selects 27256 Kb ROM
2 - 3: Selects 27512 Kb ROM

Jumper 5: IRQ 12 Select
1 - 2: IRQ 12 From Option Slot
2 - 3: IRQ 12 From Built - in Mouse (Factory Setting)

Memory Board:

Jumper 1: Built in Buffers Enable/Disable
1 - 2: SIMM's Installed, Buffers Enabled
2- 3: SIMM's Not Installed, Buffers Disabled (Factory Setting)

HARD DISK DRIVES:

- Q19. What kind of hard disk drives are available for the Equity 386SX?
- A. The Equity 386SX is available in two hard disk configurations. A 40Mb 3.5" hard disk, (Conner CP- 344, 29ms access time) and a 100Mb 3.5" (Conner CP- 3104, 25ms access time) hard disk are available. These hard disk drives offer a 1:1 interleave and use embedded controllers with an AT interface. When installing the 40Mb drive use type 59 and with the 100Mb drive use type 60 in SETUP.
- Q20. What hard drive controller is used in the Equity 386SX?
- A. The Equity 386SX uses a controller embedded on the hard drive. This controller connects to a Task File Host interface that is integrated in the system board.
- Q21. Can the Equity 386SX use other hard disk drives and controllers?
- A. Yes, the Host Interface on the system board can be disabled and other third party hard drive controllers and drives can be used. The interface can be disabled by setting Jumper J3 to position 1 - 2. Other embedded controller AT- type drives can also be used with the Host Interface.

Q22. What extended hard drive support is available in the ROM BIOS that comes with the Epson Equity 386SX?

- A. The Seiko - Epson BIOS will directly support hard drives that range in size from 10Mb to 153Mb. There is direct support for the Seagate ST- 251 and the ST - 4096 hard disks, as well as, several ESDI drives. By providing this support for 3rd party hard disk drives, the Equity 386SX has the capability to use most 3rd party 8 - bit and 16 - bit hard disk controllers. SCSI drives have their own controllers attached to the drive and should work correctly when attached to the bus with a host adapter.

The Equity 386SX also has a User Definable setting that allows you to set up hard disk drives that are not supported by the Equity 386SX Drive Type Table. In SETUP, a sub - menu lists the settings you can change for each drive: the number of cylinders (tracks), the number of read/write heads, the number of sectors, the precompensation cylinder, the landing zone (the cylinder on which you want to park the heads when moving the computer), and the total storage capacity in megabytes.

FLOPPY DRIVES:

Q23. What types of floppy disk drives will work on the Equity 386SX?

- A. The Equity 386SX comes standard with a 3.5" 1.44Mb floppy disk drive. There is built- in BIOS support for industry standard 360Kb and 1.2Mb 5.25" half - height floppy disk drives as well as the 720Kb 3.5" floppy drive. All four drive sizes are available from Epson.

Q24. Will the Equity 386SX support 3 floppy disk drives?

- A. No, not directly. The Epson controller and ROM BIOS supports a maximum of two floppy drives. The internal floppy controller cannot be disabled.

Q25. Can the floppy disk controller be disabled?

- A. No. The floppy disk controller is integrated in the system board and there are no jumpers to enable or disable it. If an additional or 3rd party board is present the BIOS ROM auto- configure at bootup.

MEMORY:

- Q26. What type of RAM chips are used in the Equity 386SX?
- A. The Equity 386SX utilizes eight (8) 514256 - 70 (256x4), 70 nSec RAM chips plus parity on the system board.
- Q27. How do I increase the memory of the Equity 386SX?
- A. The standard Equity 386SX system includes 1Mb of on - board memory. You can add SIMMs (single in - line memory modules) for increased on - board memory by installing them onto the PNT- RM board already in the Equity 386SX. With added SIMMs the total amount of on - board memory in the computer must be one of the following: 2Mb, 4Mb, 6Mb, 8Mb, 10Mb 12Mb or 14Mb.

There are 16 SIMM sockets inside the Equity 386SX. The 4 centermost sockets MUST contain 256Kb SIMM's. All other sockets can contain one 256Kb or 1Mb SIMM. The following table shows possible SIMM configurations for the Equity 386SX.

HIGH BYTE								LOW BYTE								Total **
SIMM Location:																
1A	2A	3A	4A	5A	6A	7A	8A	12 A	13 A	14 A	15 A	16 A	17 A	18 A	19 A	
9H	8H	7H	6H	5H	4H	3H	2H	2L	3L	4L	5L	6L	7L	8L	9L	
					X	*	*	*	*	X						2MB
				X	X	*	*	*	*	X	X					4MB
			X	X	X	*	*	*	*	X	X	X				6MB
		X	X	X	X	*	*	*	*	X	X	X	X			8MB
	X	X	X	X	X	*	*	*	*	X	X	X	X	X		10MB
	X	X	X	X	X	*	*	*	*	X	X	X	X	X	X	12MB
X	X	X	X	X	X	*	*	*	*	X	X	X	X	X	X	14MB

Legend:

- * = 256Kb x 1 x 9 SIMM's
- X = 1Mb x 1 x 9 SIMM's
- L = LOW Byte.
- H = HIGH Byte.

** Total includes the standard 1 MB of System Memory

Memory can also be expanded through the use of third party memory boards using an I/O slot.

Q28. What SIMM chips should be used when adding memory to the Equity 386SX?

- A. Use the Epson 70 nSec - 9 bit SIMM module kits, either 1 - MB kit (4- 256Kb SIMM's, Part # A808231) or the 2MB kit (2 - 1Mb SIMM's, Part # A808101), to extend the system memory. Should you need to use third party SIMM modules we recommend the following:

Toshiba	1 MBit x 9	70 nSec
Matshushita	1 MBit x 9	70 nSec
CDC Enterprises	1 MBit x 9	70 nSec
Samsung (#KMM591000 - 7)	1 MBit x 9	70 nSec

****NOTE****

The following SIMM chips do not work in the Equity 386SX:

IBM	Panasonic
Compaq	NMBS

SOFTWARE:

Q29. What version of DOS is provided with the Equity 386SX?

- A. The Equity 386SX is packaged with MS - DOS version 4.01.

Q30. Is the Equity 386SX compatible with OS/2?

- A. Yes, since OS/2 is much more hardware - specific than MS - DOS, the Epson version of MS OS/2 is required.

Q31. Will it support Unix and/or Xenix? Which versions?

- A. The Equity 386SX has been tested w/ Santa Cruz Operations Xenix Rel. 2.1 and IBM PC Xenix Vers. 1.

Product Support Bulletin

Subject: Using High Capacity ESDI and SCSI Hard Disk Drives with the Current Equity Series Computers

Date: 10/10/90
Page(s): 1 of 2

PSB No: S-0091A
Originator: PNM

The purpose of this bulletin is to provide some specific examples of how to install high capacity ESDI and SCSI hard disk drives in the current Equity Series computers.

The largest drive directly supported by the ROM BIOS (ver 220) in the Equity II+ and Equity III+ has a capacity of 130Mb, while the largest supported directly by the ROM BIOS in the Equity IIe, 386SX, 386/20 and 386/25 is 153Mb. To allow our units to be used in stand alone and especially network environments that require higher drive capacities, the use of the Adaptec ACB 2320 controller (available with the Equity 386/20) with the optional ACB-BIOS (available from Adaptec) will provide support for a variety of ESDI drives up to 314Mb. The AC&BIOS also has the ability to read the ESDI drive parameters from the drive itself. This will allow it to configure virtually any ESDI drive.

NOTE: The Adaptec BIOS ROM should be installed in location U25. In order for it to work, the jumper J13 pin 1 must be installed. Caution should be used when ordering the BIOS ROM as problems have been experienced when using version B. Versions A and C perform normally.

The WD1007V-SE1 controller is another option that can be used with high capacity ESDI drives that are not supported by the ROM BIOS drive tables. When using this controller' make sure that all pins on jumper on W1 are open. You can run SETUP and use Type 1 for the drive type or let the controller automatically set it at the end of the low level format routine provided by the controller's BIOS. To start the WD-BIOS Format Utility, run DEBUG and enter G=CC00:5. This will bring up a menu listing the operations that are available. Run the low level format and either enter the defective blocks listed on the drive by hand or let the program enter them automatically. Continue with the "Verify" and "Surface Analysis" utilities and finally finish with the "Set Drive Type and Exit". At this point there are 5 options from which to choose using the "+" and "-" keys to toggle through the available choices. Select the "Translation Option-63 SPT (Sectors Per Track)" if the hard drive has more than 1024 cylinders or "Non-Translation" for drives with less than 1024 cylinders.

The next step after completing the low level format is to run the Novell COMPSURF utility. When setting up the COMPSURF Parameters it will ask if you want to "Format the drive?" where you will choose the "NO" response and proceed to the next option. When asked if you want to "Retain the Bad Track Table" answer "YES" and continue on with the rest of the COMPSURF options. After completion of the COMPSURF utility, continue on with the rest of the NETGEN installation.

The use of high capacity SCSI drives is another area where we are able to provide a solution for those customers who require storage capacities greater than the Epson Supplied options. When using a SCSI type hard disk drive, the hard disk controller usually is a part of the hard drive unit. The connection between the SCSI bus and the Equity's data bus is made by installing a host adaptor into the Equity computer and connecting the SCSI drive to the host adaptor. The Seagate ST-296N, 85Mb drive, used in a stand alone configuration in the current Equity Series computers has provided favorable results.

When using SCSI drives in a Novell network, the use of the Future Domain SCSI adaptor with high capacity SCSI drives such as CDC and Maxtor has also been very successful. Future Domain recommends using Version 1.4 of their device driver when installing Novell Netware Versions 2.1-2.15. When used with the TMC-830 (use ROM Vers. 4.0L) or the TMC-840 (use ROM Vers. 5.0C) host adapters, drive sizes of up to 800Mb (CDC 94181-702) can be accommodated.

Product Support Bulletin

Subject: Equity and Apex Series Compatibility with the Sysgen OmniBridge Controller and BridgeFiler External Floppy Drives

Date: 04/11/90
Page: 1 of 3

PSB No: S-0088B
Originator: KAS *Kas*

The purpose of this bulletin is to provide the results of compatibility testing conducted by the Computer Product Support Center with the Sysgen OmniBridge controller and Bridge - Filer external floppy disk drives.

<u>Model</u>	<u>Comments</u>
Equity I	The Equity I was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
Equity II	The Equity II was found to be totally incompatible with the OmniBridge controller.
Equity III	The Equity III was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
Equity I +	The Equity I + was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
Equity Ie	The Equity Ie was found compatible with the OmniBridge controller. It was able to support only one external floppy drive, unlike the other models tested. The drive could be used as a high density (1.2Mb and 1.44Mb) or normal (360K and 720K) disk drive.

- Equity II + The Equity II + was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- Equity IIe The Equity IIe was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- Equity III + The Equity III + was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- Equity 386SX The Equity 386SX was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- Equity 386/20 The Equity 386/20 was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- APEX The Epson APEX was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.
- APEX + The Epson APEX was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.

APEX 100 The Epson APEX 100 was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.

APEX 200 The Epson APEX 200 was found compatible with the OmniBridge controller. It was able to support one or two external disk drives (daisy chained) together. The external drives could be used as high density (1.2M and 1.44M) or normal (360K and 720K) disk drives.

NOTE: The recommended switch settings for the OmniBridge controller are as follows:

1-1	DOWN	2-1	DOWN
1-2	DOWN	2-2	DOWN
1-3	DOWN	2-3	UP
1-4	DOWN	2-4	UP

These settings select NO ADDRESS for the OmniBridge BIOS and allow it to coexist with the internal FDC of the computer in which it is being installed. This way you do not need to disable the internal FDC or connect any cables from the OmniBridge to internal floppy drives. This was found to be a universal setting for all of the computers listed above as compatible with the OmniBridge controller.

EQUITY 386SX					
VER	PART #	DESC	TYPE	LOC	REASON
1.03	Y192804001	CPAN-A2	27C256	U25	INITIAL RELEASE
1.03	Y192805001	CPAN-B2	27C256	U37	
1.15	Y192805002	CPAN-BO3	27C256	U25	To allow the use of the DEC DEPCA adapter. To allow the use of the Seagate ST-157A, Quantum, Maxtor, Rodime, and WD93044-A hard disk drives. To allow the use of two Imprimis 9244-383 , Conner CP344, CP3104, or CP3204 drives in the same system. To allow KEYB.COM to be used in conjunction with EMM386.SYS. To allow FDD auto-configuration in CMOS. See ECN EQ386SX-001 (2/6/91).
1.15	Y192804002	CPAN-AO3	27C256	U37	
1.16	Y192590801	CPAN-A04	27C256	U25	To resolve a problem with rapid keystrokes using the enhanced 10-key area of the keyboard. This problem may cause shift key lock and/or keyboard lockup. To allow the use of a SCSI HDD controller with the password function. To allow CMOS to indicate daylight saving time mode. To resolve problem with DECNET PCSA v. 3.01. See ECN EQ386SX-004 (4/3/92).
1.16	Y192590802	CPAN-B04	27C256	U37	

EQUITY 386SX PLUS DISKLESS WORKSTATION					
VER	PART #	DESC	TYPE	LOC	REASON
1.57	Y705809001	CTRTRD-B02	27C512	U73	INITIAL RELEASE
1.57	Y705808001	CTRTRD-A02	27C512	U96	