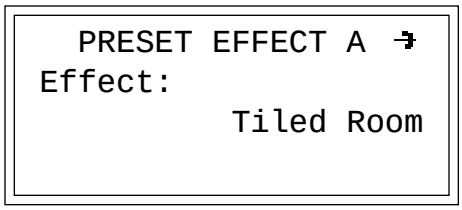
FX A Parameters

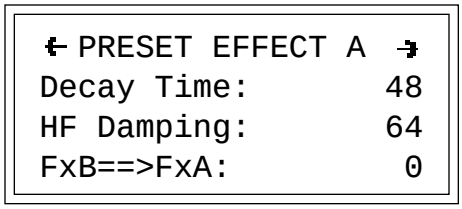
HF Damping

High frequency energy tends to fade away first as a sound is dissipated in a room. This parameter allows you adjust the amount of high frequency damping and thus change the characteristics of the room. Rooms with smooth, hard surfaces are more reflective and have less high frequency damping. Rooms filled with sound absorbing materials such as curtains or people have more high frequency damping.

1. Press the Preset Definition key. The LED illuminates and the Preset Definition menu appears.
2. Select Effects (9). The main Effect screen will appear.
3. Select Preset Effect A (0). The following screen appears.



4. Select one of the effects using the Data Entry Control or INC/DEC keys.
5. Press the Right Cursor key. The Effect Parameters screen appears.



6. Move the Cursor down to the second line and adjust the High Frequency Damping as desired.
7. Press the Preset Definition key to return to the main menu.

Effect B Into Effect A

The output of effects processor B can be routed into effects processor A. This connects the effects in series instead of their normal parallel configuration. Two effects connected in a series sound very different than the same two effects in parallel. For example, a chorus patched through reverb can turn a bland string section into a lush wall of sound. The B➡A amount can also be controlled for even more flexibility.

▶ To Send the Output of Effect B through Effect A:

In this example, 100% of Effect B will be sent into Effect A.

1. Press the Preset Definition key. The LED illuminates and the Master screen appears.
2. Select the Effects submenu (4). The Effects menu will appear.
3. Select Master Effects A (0).

4. Select an Effect using the Data Entry Control or INC/DEC keys. Do not use the “Master Effects” setting as this will cause the Master effects settings to be used.

```
   PRESET EFFECT A →
Effect:
                Room 1
```

5. Press the Right Cursor key to go to the second screen.

6. Cursor down to the third line of the display and set the FxB->FxA amount to 127.

```
← PRESET EFFECT A →
Decay Time:       40
HF Damping:       96
FxB==>FxA:       127
```

7. Press the Right Cursor key again to select the Send Amount screen.

8. Turn the Send Amounts down to zero since we only want to hear the two effects in series.

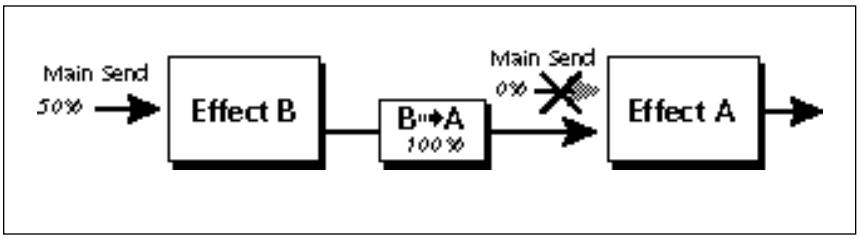
```
← PRESET EFFECT A
Sends:
Main:  0%  Sub2:  0%
Sub1:  0%  Sub3:  0%
```

9. Press the ESCAPE key to return to the Effects submenu.

10. Press the Right Cursor key to select Master Effect B.

11. Select an effect as before, then adjust the Main FX A Send percentage as desired.

◩ Note: Because the amounts are Sends, we want to open the Main Send to Effect B, turn B➟A up full and turn the Main Send to Effect A down to zero. This sends ALL of Effect B through Effect A.



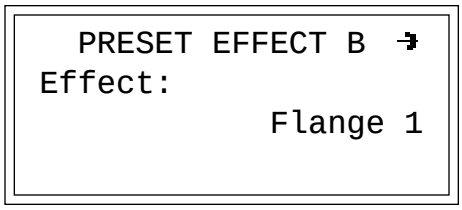
12. Play the keyboard and you should hear the B Effect running through Effect A. This patch is shown in the illustration above.

FX B Parameters

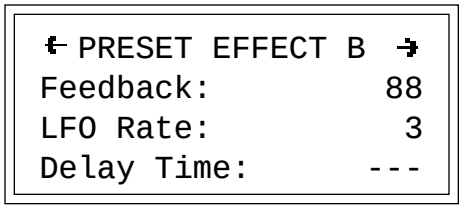
Feedback Amount

The Chorus and Flange effects have a controllable feedback loop after the delay element. Feeding back a small amount of the signal intensifies the effect by creating multiple cancellations or images.

1. Press the Preset Definition key. The LED illuminates and the Preset Definition menu appears.
2. Select Effects (9). The main Effect screen appears.
3. Select Preset Effect B (1). The following screen appears.



4. Select one of the effects using the Data Entry Control or INC/ DEC keys.
5. Press the Right Cursor key. The Effect Parameters screen appears.

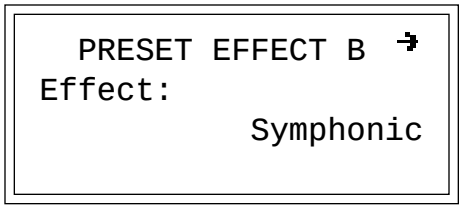


6. Move the Cursor down to the second line and adjust the Feedback as desired.
7. Press the Preset Definition key to return to the main menu.

LFO Rate

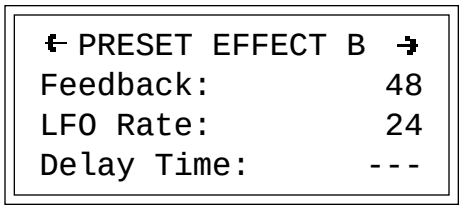
Chorus and Flange effects use a Low Frequency Oscillator (LFO) to animate the effect. An LFO applied to a chorus effect creates the slight changes necessary for a realistic choral effect. Applied to a flanger, the LFO moves the comb filter notches and adds animation to the sound.

1. Press the Preset Definition key. The LED illuminates and the Preset Definition menu appears.
2. Select Effects (9). The main Effect screen appears.
3. Select Preset Effect B (1). The following screen appears.



4. Select one of the effects using the data entry control or INC/DEC keys.

5. Press the Right Cursor key. The Effect Parameters screen appears.



6. Move the Cursor down to the third line and adjust the LFO Rate as desired.

7. Press the Preset Definition key to return to the main menu.

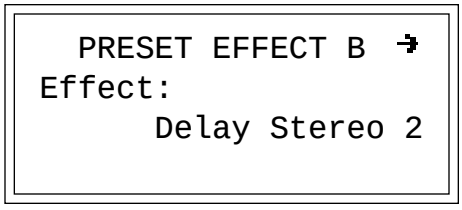
Delay Time

Flanging, chorus and echoes are all based on a delay line where the signal is delayed by some time period and mixed back together with it's un-delayed signal. This parameter varies the length of the delay or “how much time” passes before you hear the delayed signal. On some effects, this parameter is not adjustable, indicated by a dash in the field.

1. Press the Preset Definition key. The LED illuminates and the Preset Definition menu appears.

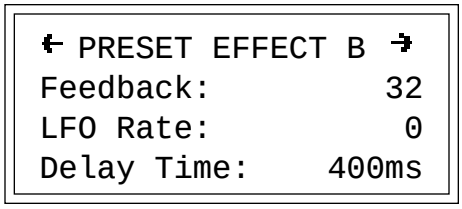
2. Select Effects (9). The main Effect screen appears.

3. Select Preset Effect B (1). The following screen appears.



4. Select one of the effects using the Data Entry Control or INC/DEC keys.

5. Press the Right Cursor key. The Effect Parameters screen appears.



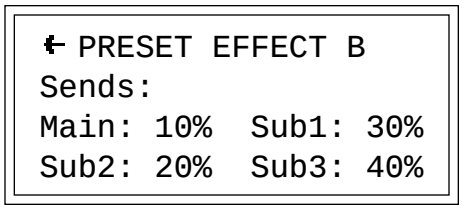
6. Move the Cursor down to the third line and adjust the Delay Time as desired.

7. Press the Preset Definition key to return to the main menu.

FX Amounts

The Effects Amount controls the percentage of effected (wet) signal to un-effected (dry) signal. This function would be analogous to the effects return on a mixing console. The effects amount for each of the four stereo submix outputs can be individually controlled.

1. Press the Preset Definition key. The LED will illuminate and the Preset Definition menu will appear.
2. Select Effects (9). The main Effect screen will appear.
3. Select Preset Effect A or B as desired (0 or 1).
4. Press the Right Cursor key twice to access the Sends screen. The Effect Send screen will appear..



5. Adjust the Effect Sends as desired.
6. Press the Preset Definition key to return to the main menu.

Using SCSI

SCSI (pronounced skuzzy) stands for Small Computer System Interface. SCSI is an industry standard hardware and software specification that allows high-speed data transfers between different pieces of equipment. SCSI devices can include hard disks, tape drives, optical disks and other types of digital equipment.

Why Use SCSI?

- SCSI is fast! SCSI is a parallel interface which transmits eight bits of information at a time at high speed over the SCSI cable. MIDI, in comparison, is a serial interface which can only send one bit of information at a time over its line.
- Compatibility: Since SCSI is an industry standard, equipment from many different manufacturers can be linked to work together.
- Expandability: Up to eight SCSI devices can be linked together (the ESI counts as one SCSI device on the chain).

The SCSI Bus

★ Tip: Use the “Mount Drives” utility (Master/Global, Disk Utilities, 1) whenever an external SCSI device does not appear in the list of available devices.

You may have noticed that the rear panel of most external storage devices have two SCSI connectors. This is because SCSI devices are connected together in a chain arrangement. The wires that connect the different pieces of equipment are called the SCSI bus.

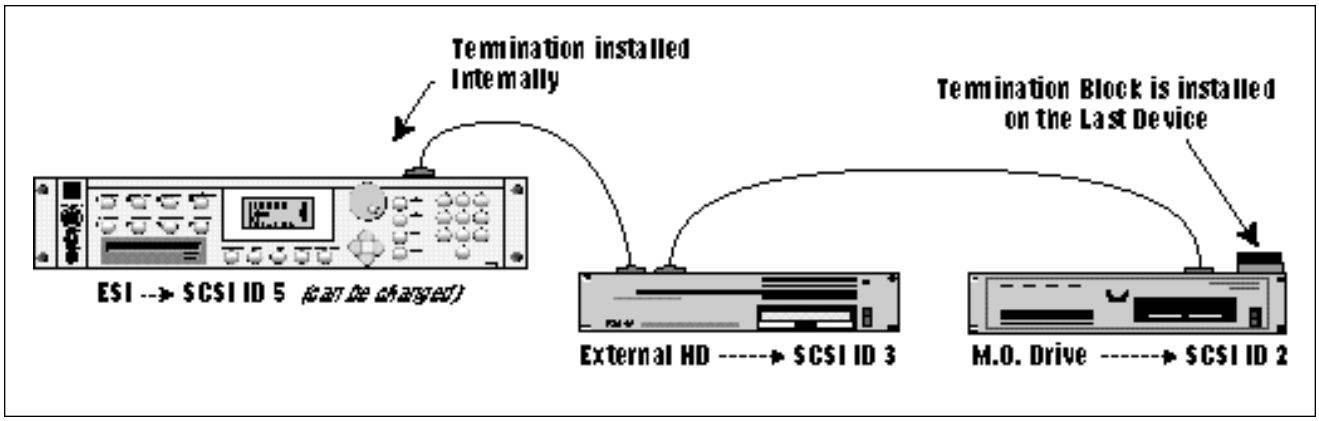
ID Numbers

Each device on the SCSI bus has its own ID number so that it can distinguish its data from data meant for another device. If data is being saved to a device with ID-2 for instance, all the other devices on the SCSI bus will ignore that data. If two devices have the same ID number, the system will not work. Each device must have its own unique ID number.

! Caution: Make sure that no two devices have the same ID number since this can corrupt the startup directories of the Macintosh or the ESI.

The SCSI ID number of the Macintosh is fixed at ID-7 and cannot be changed. The SCSI ID numbers of most other devices can be changed.

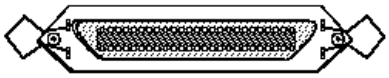
Many SCSI devices have hardware defined ID numbers, which means that they have a switch on the front or the back of the unit which allows the ID number to be easily identified and changed.



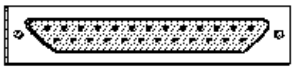
The following is a list of the default SCSI ID numbers:

ID - 7 (fixed)	Macintosh
ID - 6	Unassigned
ID - 5	ESI (this number can be changed)
ID - 4	Unassigned
ID - 3	Unassigned
ID - 2	Internal Iomega 100MB Zip Drive (if installed)
ID - 1	Unassigned
ID - 0	Internal Macintosh HD (if installed)

Types of SCSI Cables



50-pin Centronics Connector



25-pin DB Connector

There are two basic types of SCSI cables in use: DB25 and 50-pin Centronics. The two types of cable can be identified by their connectors, which are quite different. When buying SCSI extension cables, it is important to choose ones with the right type of connectors, since the two types will not interconnect without a special adapter. The type of SCSI connectors on the Macintosh are DB25 connectors. These are the type commonly found on the back of personal computers. The SCSI connector on the optional SCSI port is the 50-pin Centronics type. Use only high quality shielded cables that have all the pins connected. Many cables only have some of the pins wired.

★ Tip: Always use 50-pin Centronics-type cables with the ESI These cables have much better electrical characteristics and have fewer problems. Additionally, make sure that all 50 pins of the cables are actually wired. Some SCSI cables have only half of the pins wired.

Terminating SCSI Cables

The total length of the SCSI chain should not exceed 15 feet. A general rule for SCSI cables is: The Shorter the Better!

Terminating resistors or terminators are special resistor packs that are installed on the first and last device in the SCSI chain. Terminators are used to reduce line echoes or standing waves on the SCSI bus. An analogy in an audio system would be impedance matching.

Terminators can either be hidden inside a SCSI device or they can take the form of termination blocks which can simply be plugged into the SCSI port.

Terminators apply power to an array of resistors which ensure a full 5 volt swing between high and low levels on the SCSI line. The host system is required to provide Termination Power. Termination power has its own wire in the SCSI cable and supplies power to the termination block. On external hard disk drives, SCSI terminator power is almost always turned Off and the drives are left un-terminated.

! Caution: Turn all devices OFF whenever you change the SCSI cable. Serious damage to the ESI may result from connecting and disconnecting SCSI cables with the power on.

In addition, devices left on when the cable is unplugged may not respond properly until powered off and on.

The ESI is shipped with termination power On with the termination resistors left in place. This assumes that the ESI will be placed at one end of the SCSI chain. The ESI has an automatic system which ONLY supplies terminator power when it is NOT being supplied by another device. Therefore, you don't need to worry about terminator power when connecting the ESI.

The more devices you have connected to SCSI and the longer your cables are, the more it becomes important to have the cables properly terminated.

Using ESI and a Computer on the SCSI Bus

The ESI can now be connected to the SCSI along with another ESI an EIIIX, or a personal computer. Multiple “Master” devices on the SCSI bus is not normally allowed by the standard SCSI protocol. This is only possible because of ESI's advanced SCSI and SMDI (or SCSI Musical Data Interchange) implementation. The ESI's SMDI implementaion allows sample data to be exchanged over the SCSI bus in a way similar to the MIDI Sample Dump Standard, except MUCH faster.

★ Tip: You can check the “Memory Available” screen when downloading samples via SMDI to keep track of how much RAM you have left.

The computer should normally be positioned at one end of the chain and the ESI at the other. The SCSI chain is properly terminated at each end by the computer and the ESI. Devices in the middle of the chain should not have termination resistors installed.

PC Compatibles - The ESI has been tested with IBM PC compatible computers using the Adaptec model 1542C SCSI option card. Sound files can be transferred between a PC computer and the ESI using Sonic Foundry's Sound Forge™ or other sample editing software.

! Caution: When using Alchemy, you must add one to the sample number you want transferred.

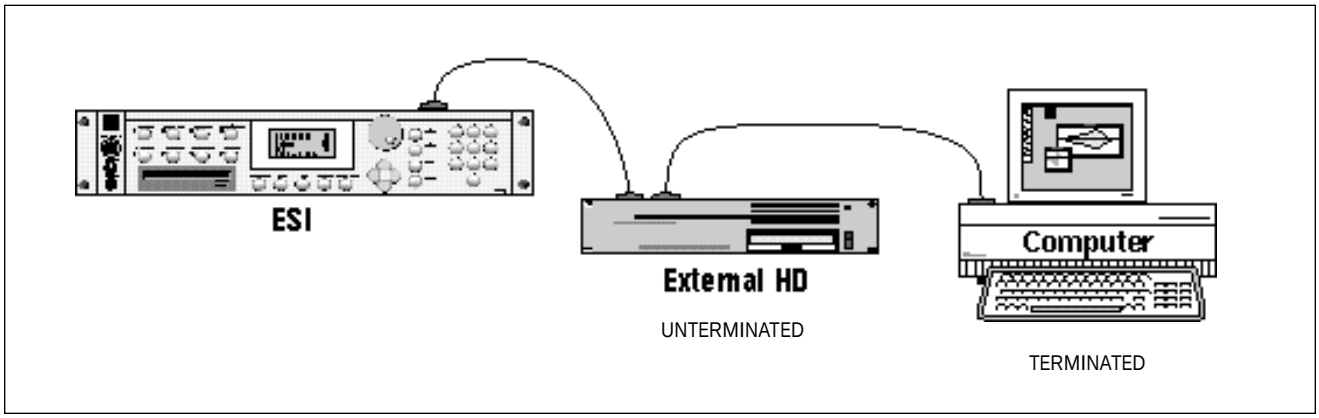
Macintosh - Sound files can be transferred between a Macintosh computer and the ESI using Passport's Alchemy™ or other digital sample editing software. The ESI is able to access approved Macintosh internal CD-ROM drives with CD-ROMs containing ESI compatible files. Similarly, a Macintosh can access an internal ESI Zip drive with a cartridge that has been formatted for the Macintosh.

- The ESI is strictly a “Slave Device” when using SMDI, meaning that it CANNOT initiate SMDI transfers. This should not normally present a problem however, since a computer based editor will always have a facility for initiating SMDI transfers.

✸ Caution: A sample transferred into the ESI is automatically placed across the entire keyboard, overwriting the current preset's sample placement. Create a new empty preset before downloading via SMDI to avoid trashing the current preset.

! Caution: You cannot transfer to or from sample 000 (the clipboard).

- Besides the raw sample data, additional information about the sample is included in a SMDI file.
  - ⩥ Sample name and number (samples 1-999)
  - ⩥ Multichannel/Stereo/Mono status
  - ⩥ Sample length plus one set of loop begin/end points
  - ⩥ Sample rate, pitch and bit resolution
  - ⩥ Sample key placement (an E-mu extension to SMDI)

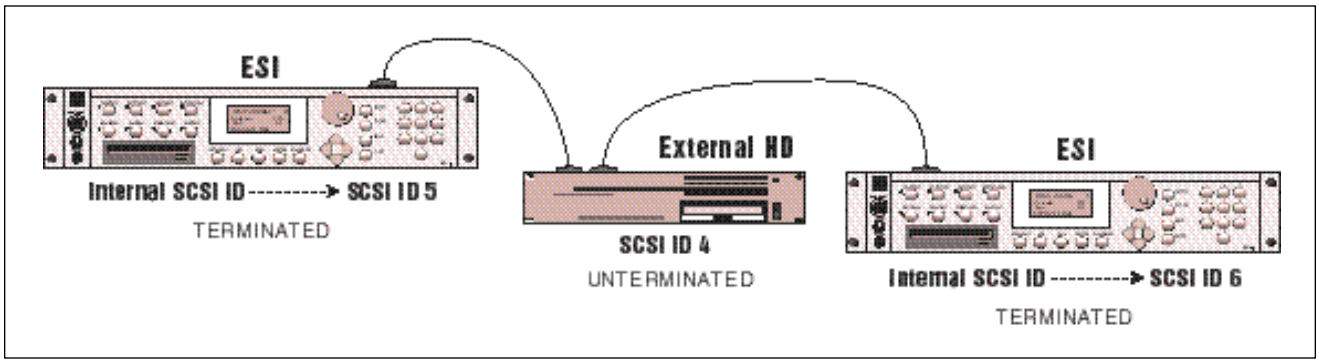


Using Multiple Samplers on the SCSI Bus

ESI version 2.0 software adds arbitration to the SCSI protocol so that multiple “Master” devices can share the bus without a system crash. Two ESI's (an EIIIX, an e-64, or an E-IV) can share the same sound library, without having to duplicate the storage media.

When connecting your system for use with multiple ESI's, be sure to observe the following rules:

- NEVER try to write to two devices at the same time or write to one device while loading from another. Designate one unit as the Master which is the ONLY unit allowed to write. Turn Undo Off on all units except the Master. Simultaneous reads are OK.
- Keep SCSI cable lengths as short as possible (Under 12 feet total).
- Make sure that each SCSI device has its own unique ID number. (Remember that the ESI and EIIIX each use up an ID number in addition to their internal hard disks.)
- Make sure the system is correctly terminated - The ESI's should normally be on the ends of the SCSI chain.



SCSI Problems

In diagnosing SCSI problems the first rule is: Don't panic, Experiment! If you have several SCSI devices hooked up, try disconnecting one of the devices and maybe change the order of the units on the line. The following checklist may help you find the solution to your unique SCSI setup.

! Caution: Use the Install File System option #8 (see Master, Format) when formatting Iomega Zip drive cartridges. The normal format procedure will not work and corrupts the disk.

1. Make sure the drive is mounted. Mount the drives using the Mount Drive utility (Master/Global, Disk Utilities, 1).

2. Check the SCSI ID numbers. No two numbers can be the same.

3. Read the documentation again. Learn all you can about your peripheral devices. The answer may be right in front of you.

4. Play with the order in which devices are powered up. Normally the “Big Bang” method works best (turn everything on at once), but another order may work better in your unique system.

5. Always suspect the cable when something doesn't work on the SCSI bus. Remember: The shorter the cables are, the better.

6. Simplify the situation. Disconnect one or more drives until you get the system to work.

7. Are the ends of the SCSI bus terminated?

8. If all else fails, call us at 408-438-1921. Telephone support hours are 9:00 to 5:00 PST, Monday through Friday.

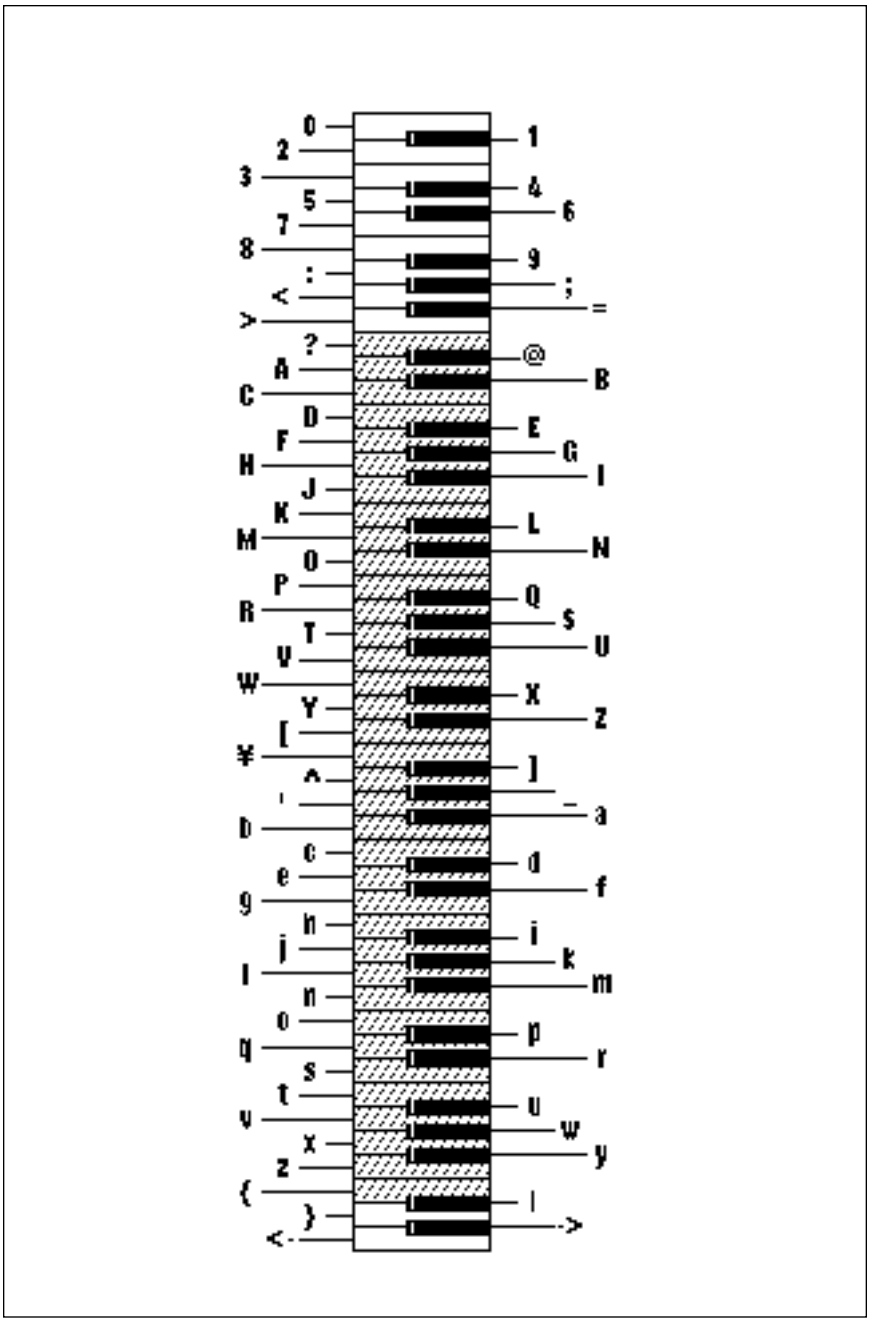
Disk Drive Compatibility Chart

This chart lists the hard disk drives, CD-ROM Drives and Magneto-Optical drives that are compatible for use with the ESI (as of 5-1-95). A current list of compatible disk drives is available on E-mu's web site: (http://www.emu.com). If a drive you wish to use is not listed, adhere to the rule, “Try before you buy!”. Be sure to check the revision number on the drive in question to make sure it will work with the ESI. A listed drive with a lower revision number than the one shown may not work.

If a drive you wish to use is not listed on this chart, be sure to adhere to the rule, “Try Before You Buy”. The chart only represents those drives which have been tested by E-mu Systems, Inc. Many others will also work.

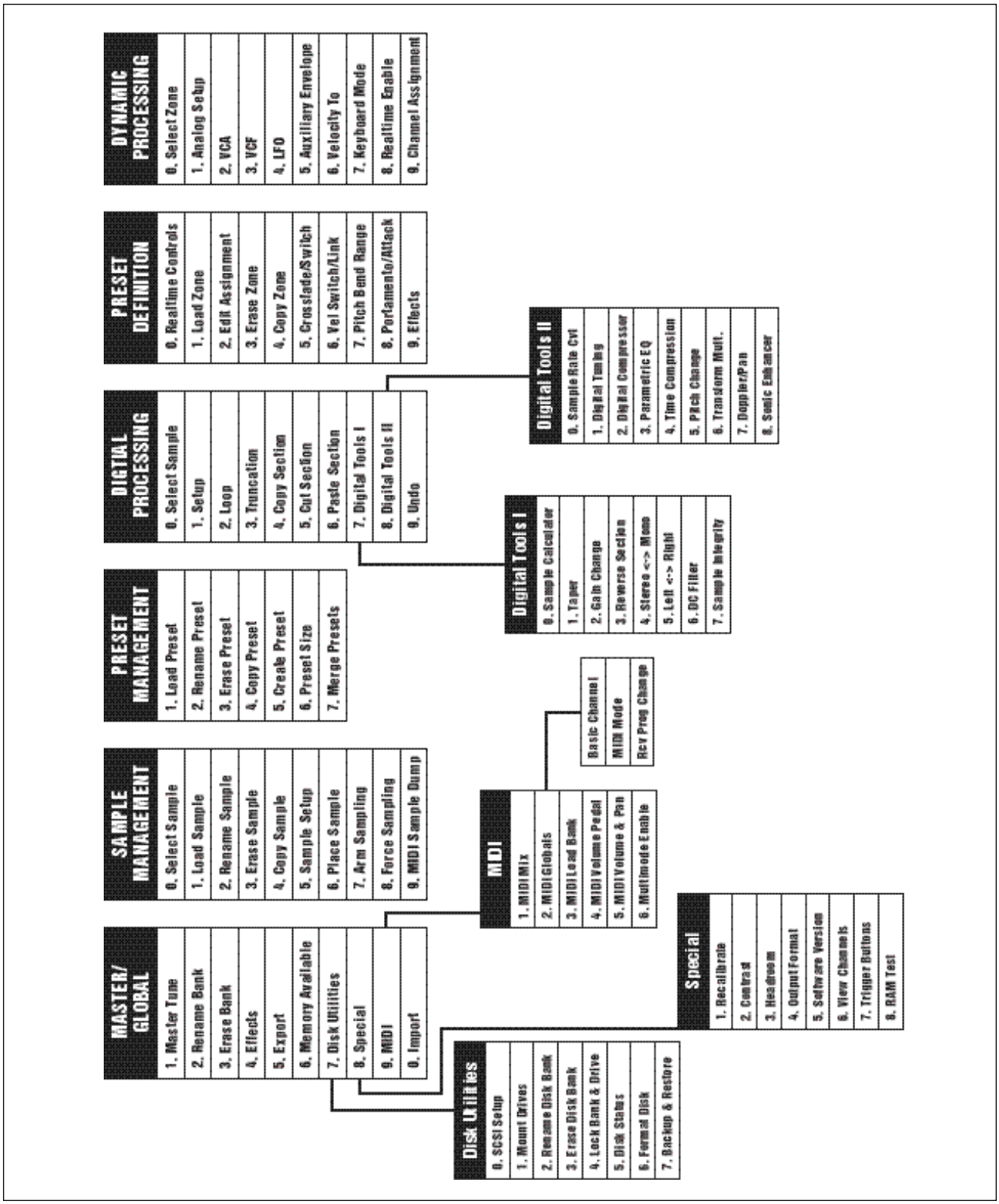
Keyboard Character Map

★ Tip: The shaded area represents a standard five octave keyboard range.

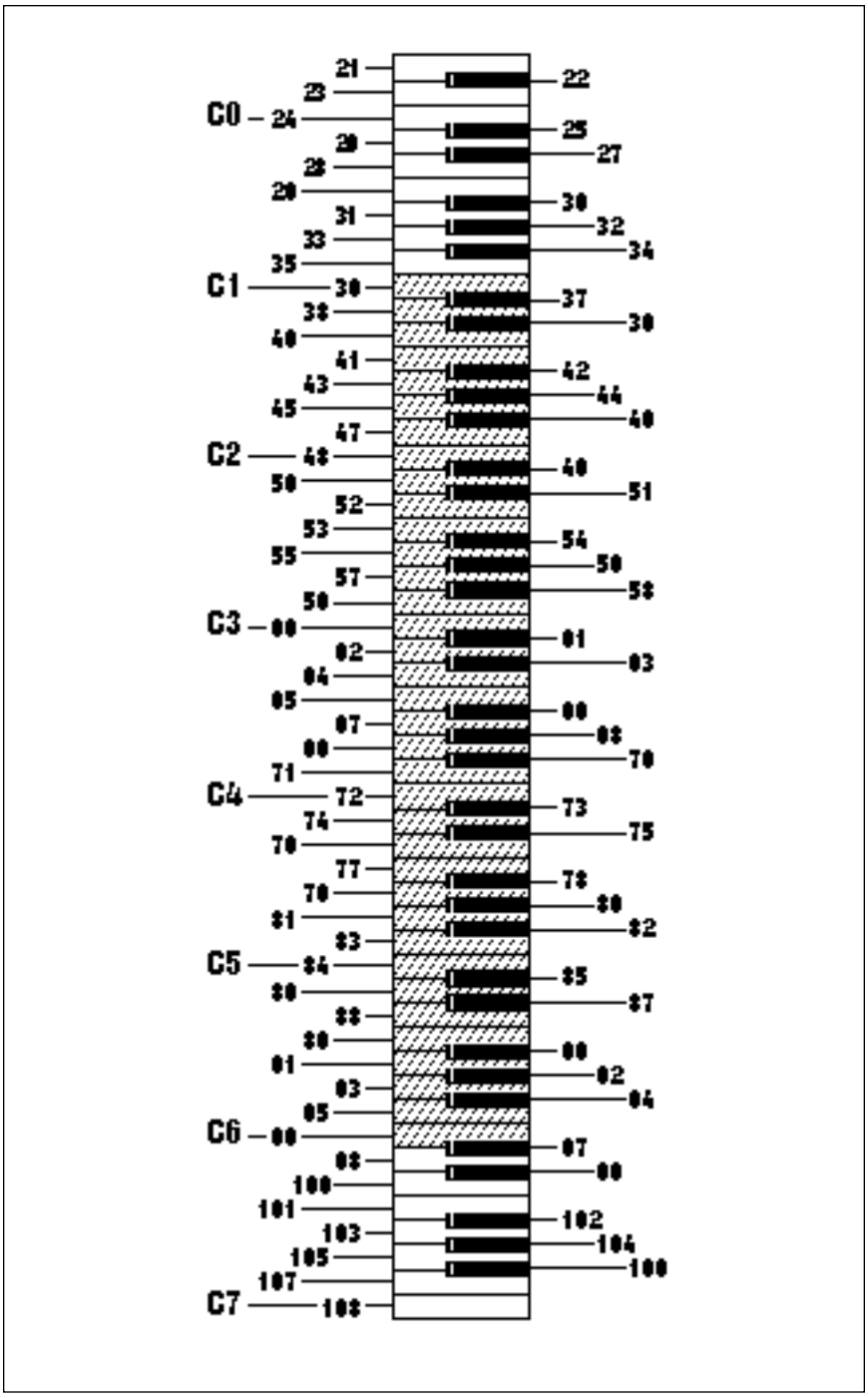


AVAILABLE CHARACTERS. Banks, drives, samples and presets can be named or renamed using these characters. Select the characters using the ten key pad, data entry knob, and keyboard. You can also use the up cursor to insert spaces and the down cursor to delete spaces. There are also additional characters (not shown above) which are only available through use of the data entry knob or increment/decrement buttons.

ESI
Menu Map


MASTER/ GLOBAL
1. Master Tune
2. Rename Bank
3. Erase Bank
4. Effects
5. Export
6. Memory Available
7. Disk Utilities
8. Special
9. MIDI
0. Import
SAMPLE MANAGEMENT
0. Select Sample
1. Load Sample
2. Rename Sample
3. Erase Sample
4. Copy Sample
5. Sample Setup
6. Place Sample
7. Arm Sampling
8. Force Sampling
9. MIDI Sample Dump
PRESET MANAGEMENT
1. Load Preset
2. Rename Preset
3. Erase Preset
4. Copy Preset
5. Create Preset
6. Preset Size
7. Merge Presets
DIGITAL PROCESSING
0. Select Sample
1. Setup
2. Loop
3. Truncation
4. Copy Section
5. Cut Section
6. Paste Section
7. Digital Tools I
8. Digital Tools II
9. Undo
PRESET DEFINITION
0. Realtime Controls
1. Load Zone
2. EdR Assignment
3. Erase Zone
4. Copy Zone
5. Crossfade/Switch
6. Vel Switch/Link
7. Pitch Bend Range
8. Portamento/Attack
9. Effects
DYNAMIC PROCESSING
0. Select Zone
1. Analog Setup
2. VCA
3. VCF
4. LFO
5. Auxiliary Envelope
6. Velocity To
7. Keyboard Mode
8. Realtime Enable
9. Channel Assignment
Disk Utilities
0. SCSI Setup
1. Mount Drives
2. Rename Disk Bank
3. Erase Disk Bank
4. Lock Bank & Drive
5. Disk Status
6. Format Disk
7. Backup & Restore
MIDI
1. MIDI Mix
2. MIDI Globals
3. MIDI Load Bank
4. MIDI Volume Pedal
5. MIDI Volume & Pan
6. Multimode Enable
Basic Channel
MIDI Mode
Rcv Prog Change
Special
1. Recalibrate
2. Contrast
3. Headroom
4. Output Format
5. Software Version
6. View Channels
7. Trigger Buttons
8. RAM Test
Digital Tools I
0. Sample Calculator
1. Taper
2. Gain Change
3. Reverse Section
4. Stereo <-> Mono
5. Left <-> Right
6. DC Filter
7. Sample Integrity
Digital Tools II
0. Sample Rate Cvt
1. Digital Tuning
2. Digital Compressor
3. Parametric EQ
4. Time Compression
5. Pitch Change
6. Transform Mult.
7. Doppler/Pan
8. Sonic Enhancer

MIDI Key Numbers



MIDI KEY NUMBERS. The shaded area represents a standard five octave keyboard range.

MIDI Implementation Chart

Function...	Transmitted	Recognized	Remarks
Basic Default Channel Changed	No No	1 1-10	Memorized
Mode Default Messages	No	No	
Note Number True Voice	No No	21-108 (A-1 thru C7) 21-108 (A-1 thru C7)	
Velocity Note On Note Off	No No	Yes v=1-127 No	
After Keys Touch Channels	No No	No Yes	
Pitch Bender	No	Yes	
Control Change	No	Yes	0-31 64-70
Bank Select	No	Yes	*See note below*
Program Change True Number	No No	Yes 0-127 Yes 0-127	
All Sound Off	No	Yes	
All Notes Off	No	Yes	
Reset All Controllers	No	Yes	
System Exclusive	No	No	
MIDI Sample Dump	Yes	Yes	Also xmit/recv SMDI
System :Song Pos Common :Song Sel :Tune	No No No	No No No	
System :Clock Real Time :Commands	No No	No No	
Aux :Local On/Off Messages :Active Sense :Reset	No No No	No No No	

Notes: Pan 0=hard left 127=hard right

Bank Select: Bn 00 00 20 bb Cn pp (n= MIDI channel, bb = bank#, pp = program in bank)

Specifications

◩ Note: Use only 72-pin, low profile SIMMs in the ESI (4 MB, 16 MB or 64 MB). If different size SIMMs are used, the larger SIMM MUST be installed towards the rear of the unit (socket B). The smaller SIMM will be divided in half (you get only half the memory of the smaller SIMM).

Because there are lethal voltages present inside the ESI enclosure, additional sample memory should be installed only by your E-mu dealer or a qualified technician.

Number of Voices	64 mono, 32 stereo
Memory	4 MB standard, 128 MB maximum
Outputs	4 individual 1/4" unbalanced, polyphonic 6 additional with Turbo Option
Output Level	-10 dbm nominal, max 6 volts p-p
Output Impedance	1K Ω
Data Encoding	Input: 16 bit Output: 18 bit
Digital I/O (Turbo Opt.)	S/PDIF format, RCA connectors
SCSI	50 pin connector, advanced links
Sample Rates	44.1 kHz, 22.05 kHz
Frequency Response	20 Hz to 20 kHz at 44.1 kHz sample rate
THD + N	Less than 0.05%
THD	Less than 0.03%
Signal/Quiescent Noise	Better than 100 dB
Stereo Phase	Phase Coherent ±1° at 1 kHz
Weight	10 lbs (4.5 kg)
Dimensions	W - 17.125" (43.5cm), H - 3.5" (8.9cm), L - 9.75" (23.7cm)
Power	100-240 VAC, 50/60 Hz, auto-switching supply, less than 30 watts consumption

Error Codes

This section explains some of the error codes you might possibly encounter while working with the ESI. This listing covers only the error codes whose meaning might be confusing or unclear. Most of the error codes explanations in the ESI are readily apparent.

`Drive Not Formatted!`
Trying to access a hard drive that has not been formatted for the ESI.

`FD Data Lost Error!`
Bad disk or floppy drive.

`FD Data CRC Error!`
Bad disk or floppy drive.

`FD Data Save Error!`
Bad disk or floppy drive.

`Floppy Disk Error!`
Bad disk or floppy drive.

`Floppy Seek Error!`
Bad disk or floppy drive.

`Insert Unlocked FD!`
Floppy disk is locked.

`Loop Start (End) Zero!`
Sample header is corrupted and needs to be repaired using the "Fix Samples" function.

★ Tip: If the Error Code has the word "Zero" anywhere in it, use the "Fix Samples" utility to repair it.

`Mono Start (End) Zero!`
Sample header is corrupted and needs to be repaired using the "Fix Samples" function.

`No Samples in Preset!`
No samples mapped to any zones.

`No Samples Exist!`
No samples in bank.

`No Presets Exist!`
No presets in bank.

`No Valid Drives!`
1) Conflicting SCSI devices. 2) No SCSI termination at each SCSI cable end. 3) SCSI cable too long. 4) Reboot entire system after changing SCSI cables or ID numbers.

`Not Enough Memory`
Trying to load in a bank that is too large.

`Preset Memory Full!`
Not enough preset memory for the operation.

`Sample Memory Full!`
Not enough sample memory for the operation.

`Sample Overload!`
A/D converter headroom has been exceeded.

`SCSI Bank Locked!`
Trying to write to a locked bank.

`SCSI Hardware Error!`
No HD, Cable, No power, Wrong SCSI ID number.

`SCSI Media Error!`
Media defect on the hard disk.

`Wrong Floppy Number!`
Wrong disk in loading sequence.

`Wrong Floppy Type!`
Sound disk <-> Software Disk.

Troubleshooting

This section explains some of the problems you might possibly encounter while working with the ESI. Before assuming that your ESI is faulty, check the following list which details the corrective action you can take yourself without having to call a service center. If you have any doubts or questions, get in touch with your nearest E-mu dealer or call the E-mu customer service department at (408) 438-1921, between the hours of 8:30 am and 5:30 pm Monday through Friday.

The ESI seems dead

If the ESI seems dead, first disconnect any external SCSI devices and try again.

Problem: The unit is completely dead. No lights no sound.

Cause: The power supply may be damaged.

Solution: Consult your dealer or authorized E-mu service center.

Audio Problems

Problem: The ESI powers up normally, but does not make any sound.

Cause: Proper audio connections may not have been made.

Solution: Try listening directly to the stereo output using headphones to verify that the ESI is at fault. Check that proper audio connections have been made.

Problem: The ESI powers up normally, but does not make any sound.

Cause: The front panel volume control may need recalibration.

Solution: Recalibrate the volume control using the Recalibrate function located under Special in the Master/Global module.

Problem: The ESI powers up normally, but does not make any sound.

Cause: Proper MIDI connections may not have been made.

Solution: Try using the trigger buttons to play the ESI. Check MIDI activity LED. Verify that proper MIDI connections have been made.

Problem: The digital audio output level is too low when a single channel is played.

Cause: Because of the nature of sampling instruments, each additional channel played adds +3 dB to the headroom requirement. A single channel on the ESI comes out about -6 dB down.

Solution: Make sure the Master Volume control is at maximum. Set the headroom adjustment (Master/Global, Special, 3) to 0 dB. All volume adjustments in the ESI affect the digital output level.

Problem: Certain sounds do not play polyphonically.

Cause: The zone may be in solo mode, or only assigned to one output channel.

Solution: Disable solo mode and check output channel assignment.

Problem: Certain sounds cut off prematurely.

Cause: More than 64 mono, or 32 stereo channels are playing. Or, if specific output channels are assigned, two sounds may be “ripping each other off”.

Solution: Check output channel assignment (Dynamic Processing, 9). Try turning Dynamic Allocation (Master/Global, 4) on. Set release times on VCA to a shorter setting.

Problem: Stereo samples are only heard out of one side.

Cause: Disable side function is turned on.

Solution: Turn disable side function (Dynamic Processing, 1) off in the zone.

Problem: Audible hum in system when ESI is connected.

Cause: There is a ground loop present in the audio system.

Solution: Find and eliminate the ground loop.

Functional Problems

Problem: Added RAM SIMMs don't fit with the Turbo Option Kit..

Cause: Using high-profile SIMMs.

Solution: Use only low-profile SIMMs when adding additional memory to your system.

Problem: Front panel buttons double trigger.

Cause: Buttons need cleaning.

Solution: Consult your dealer or authorized E-mu service center.

Problem: Looping only works while in the Digital Processing module.

Cause: Disable Loop function is turned on.

Solution: Turn disable loop function (Dynamic Processing,1. Setup) off in the zone.

Problem: Controllers (wheels, pedal, pressure) do not work at all.

Cause: Controllers are not assigned in the preset.

Solution: Assign the controllers to the desired destinations (Preset Definition, 0. Realtime Controls).

Problem: Controllers (wheels, pedal, pressure) do not work at all and are assigned correctly.

Cause: Controllers are disabled in Realtime Control Enable section.

Solution: Enable realtime controllers for the selected zone (Dynamic Processing, 8. Realtime Control Enable).

Problem: The footpedal or LFO has little or no effect when assigned to VCA.

Cause: The initial VCA level is set at 100%.

Solution: Lower the initial VCA setting as desired.

MIDI Problems

Since MIDI setups can be quite complex, make sure that you have all the MIDI parameters (on the ESI and external MIDI devices) set correctly before you become daunted. On the ESI, MIDI parameters are located in the Master/Global module, (9. MIDI, 2. MIDI Globals).

Problem: The ESI does not respond to the MIDI parameters as programmed.

Cause: MIDI Globals are turned off.

Solution: Turn on MIDI Globals (Master/Global, 9. MIDI, 2. MIDI Globals).

Problem: The ESI does not respond to the modulation wheels or pressure from an external MIDI controller.

Cause: MIDI controllers are not assigned in the MIDI Globals or Realtime Control submodules.

Solution: Assign proper controller channel numbers to Left Wheel, Right Wheel, Pedal, Pressure, MIDI A and B, then assign MIDI A and B to desired destinations (Master/Global, 9. MIDI, 2. MIDI Globals). Check Realtime Control routings (Preset Definition, 0. Realtime Controls).

Hard Disk Problems

Problem: The ESI does not recognize an external hard disk or other SCSI device.

Cause: The external hard disk or SCSI device was powered-up after the ESI.

Solution: Mount the drives using the Mount Drive function located under Disk Utilities, 1 in the Master/Global module.

Problem: The ESI display reads “Disk Not Formatted” and an external SCSI device is connected.

Cause: The hard disk may have crashed, the SCSI cable may be too long or two devices may have the same SCSI ID number.

Solution: Try using a shorter SCSI cable (maximum cable length is about 12 feet) and check that no two devices have the same ID number.

Problem: The ESI display reads “SCSI Error!”. There is an external device connected to SCSI.

Cause: Two SCSI devices may have the same ID number or an external SCSI device does not have power.

Solution: Make sure all external SCSI devices have power. Change one of the SCSI ID numbers. If this fails, try another SCSI cable or another SCSI device if possible.

Problem: Data from an external SCSI device is being scrambled or lost.

Cause: The SCSI cable may be too long, or the device may not be terminated correctly.

Solution: Try using a shorter SCSI cable (maximum cable length is about 12 feet) or check that the last device in the SCSI chain has termination resistors installed. See “Using SCSI” in this manual.

Problem: Iomega Zip cartridges are not being correctly formatted.

Cause: Zip drives have a unique type of formatting.

Solution: Use the Install File System option #8 (see Master, Format) when formatting Iomega Zip drive cartridges. The normal ESI format procedure will not work and corrupts the disk's low level formatting.

Warranty

Please read this warranty, as it gives you specific legal rights.

Length of Warranty

Your ESI warranty covers all defects in materials and workmanship for a period of one year (90 days for disk drives) from the date of purchase by the original owner, provided that the Warranty Registration Card is filled out and returned to E-mu Systems within 14 days from the date of purchase. Cases may arise where E-mu's Service Department or one of E-mu's authorized service centers will ask for a copy of your sales receipt to facilitate warranty service. Please keep your purchase receipt in a safe place.

E-mu Systems does not cover:

Damages due to improper or inadequate maintenance, accident, abuse, misuse, alteration, unauthorized repairs, tampering, or failure to follow normal operating procedures as outlined in the owner's manual. Deterioration or damage of the cabinet. • Damages occurring during any shipment of the ESI for any reason. • An ESI that has in any way been modified by anyone other than E-mu Systems, Inc.

Limitation of Implied Warranties

No warranty is expressed or implied. E-mu Systems specifically disclaims the implied warranties of merchantibility and fitness for a particular purpose.

Exclusion of Certain Damages

E-mu Systems' liability for an ESI found defective is limited to repair or replacement of the unit at E-mu's option. In no event shall E-mu Systems Inc. be liable for damages based on inconvenience, whether incidental or consequential, loss of use of the unit, loss of time, interrupted operation or commercial loss, or any other consequential damages.

Some states do not allow limitation of the duration of implied warranties or the exclusion or limitation of incidental or consequential damages, so the above limitations and exclusions may not apply to you.

How To Obtain Warranty Service

All E-mu products are manufactured with the highest standards of quality. If you find that your instrument does require service, it may be done by any authorized E-mu service center. If you are unable to locate a service center in your area, please contact E-mu Systems Service Department at (408) 438-1921. They will either refer you to an authorized service center or ask that you return your ESI to the factory. When returning an ESI to the factory, you will be issued a Return Merchandise Authorization number (RMA). Please label all cartons , shipping documents and correspondence with this number. E-mu suggests you carefully and securely pack your ESI for return to the factory. (Do not send the power cord or operation manual.) Mark the outside of the shipping carton clearly with your RMA number. Send to E-mu Systems, Inc. 1600 Green Hills Road, Scotts Valley, California, 95066. You must pre-pay shipping charges to E-mu Systems. E-mu will pay return shipping fees. You will be responsible for any damage or loss sustained during shipment in any direction

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Use this Warranty Registration card if you live in North, Central or South America.

If you live in Europe, you will find a European Warranty card in your ESI box.

E-MU SYSTEMS INC. WARRANTY REGISTRATION

Please take the time to fill out this warranty card so that we can keep you informed of upgrades and updat for your new E-mu System's product. In addition, if you should require technical support or warranty serv in the future we will require that your product be registered in our system. You can also register on-line at www.emu.com, by phone at (408) 438-1921 or by fax at (408) 439-0389. We look forward to hearing fr you today!!

Product Name: _____

Model Number: _____ Serial Number: _____

DATE PURCHASED: _____ DEALER'S NAME: _____

YOUR NAME: _____ TELEPHONE: _____

ADDRESS: _____ CITY: _____

STATE/PROV: _____ COUNTRY: _____ ZIP/POST CODE: _____

YOU COULD ALSO HELP US IMPROVE OUR PRODUCTS AND SERVICE BY TAKING THE TIME TO ANS A FEW QUESTIONS!!!

1. Is this your first piece of E-mu gear? If no, what other E-mu gear do you own?

2. What influenced your decision to buy this particular E-mu product (i.e. recommendation, price, features, sounds, etc.)?

3. How did you first hear about this product? If through advertising, what magazine?

4. What are the most important features to you on this product? The least important?

5. Briefly describe your studio or setup. Do you own a computer that you will be using with this piece of gear, if so, what brand?

6. We value your input very highly. Do you have any suggestions on how we can make this product better? Is there anything else that you require from E-mu Systems?

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Please fold this card along the dotted line and return within 10 days of your purchase. Thank-you!

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