



# Cinema 8

7.1 Channel Surround Sound Preamp

OWNER'S MANUAL

NOTE: Before installing your new component, please read this manual carefully as it will inform you of the product specifications, proper installation and correct operating procedures for your unit. Also included in this manual are guidelines on how to service and care for your new Cary Audio Design product.

## UNITED STATES LIMITED WARRANTY

Cary Audio Design, Inc. warrants to the original United States purchaser for use in the United States, that this product shall be free from defects in material (except tubes and AF output transistors) or workmanship for:

Amplifiers and Preamplifiers, Three (3) years from the date of the original purchase.

Digital Products, One (1) year from the date of original purchase

During the warranty period, Cary Audio Design, Inc. or an authorized Cary Audio Design, Inc. service facility will provide free of charge both parts (except tubes and AF output transistors) and labor necessary to correct defects in material or workmanship.

To obtain such warranty service, the original purchaser must:

- (1) Complete and send in the warranty Registration Card.
- (2) Notify Cary Audio Design, Inc. as soon as possible after the discovery of a possible defect:
  - (a) The model number and serial number;
  - (b) The identity of the seller and the approximate date of purchase;
  - (c) A detailed description of the problem, including details on the electrical connection in the associated equipment and the list of such equipment.
- (3) Deliver the product to Cary Audio Design, Inc. or the nearest authorized service facility, or ship the same in its original container or equivalent, fully insured and the shipping charges prepaid.

Correct maintenance, repair and use are important to obtain optimum performance from this product. Therefore, carefully read the Operating Manual. This warranty does not apply to any defect that Cary Audio Design, Inc. in its sole discretion determines is due to:

- (1) Improper maintenance or repair, including the installation of parts or accessories that do not conform to the quality and the specifications of the original parts.
- (2) Misuse, abuse, neglect or improper installation.
- (3) Accidental or incidental damage.

### WARRANTY DISCLAIMER

Except for the express warranties stated herein, Cary Audio Design, Inc. disclaims all other warranties including, without limitation, all implied warranties of merchantability and fitness for a particular purpose.

### EXCLUSIVE REMEDY

Notwithstanding the foregoing, the purchaser's exclusive remedy for any breach of warranty, express or implied, is limited to the repair or replacement of the defective unit or the refund of the purchase price, at the option of Cary Audio Design, Inc. Under no circumstances is Cary Audio Design, Inc. liable for incidental or consequential damages. Any implied warranties imposed by law terminate one (1) year from the date of purchase.

### FOREIGN PURCHASERS

Cary Audio Design, Inc. warrants its merchandise to purchasers in the United States for use in the United States. It provides no other warranties. If you are a foreign purchaser, consult with your dealer to determine whether your dealer provides any warranty.

The foregoing constitutes Cary Audio Design Inc.'s entire obligation with respect to this product, and the original purchaser and any user or owner shall have no other claim for incidental or consequential damages. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the above limitation and exclusion may not apply to you.

This warranty gives legal rights and you may have other rights which vary from state to state.

# Congratulations New Cary Owner!

You are the proud new owner of a Cary Cinema 8 surround sound preamplifier! This preamplifier is designed to be sonically transparent, to offer excellent control switching for audio, digital and video components and to be easy to set up and operate. Thank you very much for selecting our Cinema 8 preamplifier for your home cinema use!

## **Let's start by setting up the Cinema 8 in your system.**

Begin by unpacking the Cinema 8. Save the packing carton with all the packing materials inside it. If the Cinema 8 ever needs service, the original packing carton will be needed to ship it safely back to your dealer or to Cary Audio. Store it in the attic, keep it in the back of the broom closet or under a bunk bed somewhere! Don't throw it away; it is valuable! Now, unpack the remote control, insert the batteries correctly according to the labels on the batteries and check the remote is working properly. When you push a button on the remote control the buttons should light up momentarily.

Set the Cinema 8 in a component rack or the audio video furniture you intend to use for your system. Plug the AC power cord into a grounded AC socket to ensure correct operation. Look at the back panel and note the comprehensive audio/video switching provided by the INPUT and OUTPUT connections. There are 4 coaxial digital inputs, 2 TOSLINK digital inputs and an AES/EBU balanced digital input for a total of 7 digital inputs. In addition, there are 10 stereo analog sets of inputs, Zone 2 audio/video inputs and outputs, XLR analog stereo BYPASS, 7.1 analog BYPASS connections, 7.1 MAIN preamplifier outputs and 2-channel tape monitor connections.

Begin with the connections for your system, starting with the AC power. Turn the back panel main power switch ON. Press the front panel STANDBY button to 'wake up' the Cinema 8. *Do not turn on your power amplifier yet. We'll do that in SPEAKER SETUP.*

Connect the Cinema 8 to a television monitor using a back panel video output that has an on screen display 'OSD' label next to it. The S-Video OSD or Composite video OSD output will work. Then you will see the SET UP screen on your video monitor while completing the rest of the set up. Choose the OSD input on the TV. (NOTE: The 'on screen' display is for the composite or S-Video outputs.)

**When connecting components to the Cinema 8 it is important that *all the connections for a source component are connected to the same numbered input.*** For example, the audio, video and digital outputs from a source component to DVD should be connected to the #1 audio, video and digital Inputs. (The inputs may be renamed later if you wish.) LEFT channel inputs are WHITE and RIGHT channel inputs are RED, composite video inputs are YELLOW.

**The 3 Component Video Inputs and the Component Video Output will function after initial SET UP.** Set Up Component Video switching in **Source Setup**; choose a component video input for any Input 1-10. The *default setting* for Component Video is OFF. On the back panel of the Cinema 8, from *left to right, top to bottom* the Cinema 8 has composite video inputs 1- 6, composite video outputs 1 - 4 (1 w/OSD, 3 without,) 6 S-Video inputs, 3 S-Video outputs (1 w/OSD, 2 without,) 1 TOSLINK optical digital output, 4 coaxial digital inputs, 2 TOSLINK optical digital inputs, an AES/EBU balanced digital input, an RS-232 port, Infrared (IR) Zone 2 in, Infrared Main in, DC remote Trigger 1, DC remote Trigger 2 (Trigger 2 is paralleled with dual trigger connectors), The middle row has Left and Right balanced XLR analog inputs, balanced 7.1 outputs, 3 Component video inputs, and 1 Component video output,



The bottom row has 10 sets of analog stereo audio inputs, audio Tape recorder playback, audio Tape recorder outputs, VCR audio record outputs 1 and 2, 2nd zone audio outputs, 7.1 BYPASS analog audio inputs and analog audio preamplifier 7.1 MAIN OUTPUTS and the AC POWER SWITCH.

If the connections for a DVD player are connected to the DVD input, the video output from the DVD player is connected to either the S-Video 1 input or the composite video 1 input. Subsequently, the Digital output of the DVD player should be connected to either the coaxial digital input, TOSLINK digital input or the AES/EBU digital input. The two-channel L and R analog mix down outputs from the DVD player connect to the Left and Right analog inputs for DVD.

S-Video and component video inputs offer better video quality than the composite video input connection. Component video inputs and digital connections for inputs are readily assignable to any input. This is discussed further in 'renaming' an input. DVD-Audio BYPASS requires the 5.1 analog outputs of the DVD player to be connected to the 7.1 analog inputs on the lower row of connections. Select 7.1 Input to play back DVD-Audio disks. **Note:** As shipped, DVD is the initial name shown in the front panel display or on screen display of your TV. DVD is labeled 1 on the rear panel RCA input connections.

If you use a CD-SACD player or DVD Audio player with multiple analog channel outputs, *in addition to the normal 2 channel mix down outputs*, connect all the analog outputs to the appropriately labeled **7.1 BYPASS** inputs in the lower center right area of the Cinema 8 back panel. Skip the use of the stereo analog inputs for this particular component installation. This will set the Cinema 8 to play all the analog output channels of your player and will pass the analog signal directly to the volume control and then to the main outputs of the 8. Choose 7.1 BYPASS to playback this multi-channel analog output signal. **Note:** Channel balance and overall speaker set up for this analog bypass setting must be done with the set up menu for your CD-SACD or DVD-AUDIO machine.

A cassette deck, a DAT tape deck, an MD recorder, a Hi-Fi VCR used as a tape recorder or a reel to reel tape deck may be connected to the 2 channel tape input jacks. Please check the connections on the recorder to be certain that the inputs on the Cinema 8 receive the output signal from the recorder. The outputs of the Cinema 8 connect to the inputs of the recorder, forming a loop from the 8 to the recorder and then back to the Cinema 8. Different recorder brands use different labels for their inputs and outputs. Please consult your recorders' users manual about which connections to connect to the 2 channel tape monitor loop inputs or outputs on the Cinema 8.

**The left and right audio output connections from an FM/AM tuner connect to any audio input pair.** No video connections are possible from a tuner so only the audio connections are needed.

### **How to change the name of an input source during SET UP.**

Our default ON SCREEN labels are only a beginning name for each input. We encourage you to change the name to match the name of the source components you connect to all inputs. When you press the MENU button you enter the SET UP mode. (Select the SOURCE SETUP section for this part) It is easy to use the remote control to re-label each input according to the name of the component you will connect to it, such as DVD 6, DBS-TV, CD-R 1, S-VHS 1, Cam 1, etc.



**Choose the Input Number you wish to rename. Highlight the name of the Input and press the central round SELECT button on the remote control.**

A small cursor will appear under the first letter of the name of the Input, for example, TUNER. Press the up/down volume control buttons next to the SELECT button on the remote control. This will scroll through all the UPPERCASE letters, all lowercase letters and then numbers and symbols. Move to the next desired letter and repeat with each letter until you have the name that you want for your Input source. When you have renamed the Input, press the SELECT button again. This will end the cursor and save the new name for the source component. Choose what video input is assigned to the component, which digital input (if any) is assigned to the component, set analog sensitivity (if needed) and then which balanced analog input (if any / 8B model only) is assigned with the component. When finished select EXIT. You have just assigned a new name and all the input connections associated with it to a source component on your Cinema 8.

The **7.1 BYPASS** mode and the 2-channel tape monitor connections have fixed settings and fixed names. These two input sets are not assignable for names or associated connections like the other audio or video inputs. Finally, recheck all patch cable connections to be certain they are fully inserted into the connection jacks on the back panel of all of the components connected to the Cinema 8.

### **Setting speaker size, levels and speaker distances in INITIAL SET UP**

Press the MENU button on the remote control. Check speaker size, level balance and speaker distance settings for all the channels in SET UP. In SPEAKER SET UP *choose the speaker size according to the owners manual with your speakers: choosing Large, Small or No for front, center, subwoofer, surround and 1 or 2 surround back speakers. (5.1, 6.1 or 7.1 speaker set up.)*

Turn on the power amplifier now. An analog Radio Shack \* sound level meter, set to C Weighting and to SLOW meter response, is expressly recommended for these adjustments! Hold the sound level meter so that it is facing upwards toward the ceiling, in the same location, for all the sound level readings. Choose **LEVEL SETUP**. Press the NOISE button on the remote control. Set all channels for equal sound intensity, using the 70-dB volume range setting on the meter. Individual speaker volume settings have a plus or minus ½ dB adjustment, per volume step, to make equal sound pressure from each speaker as precise as possible. Add or subtract volume for each speaker to make the meter read 75 dB for each channel at your favorite listening spot. Use the remote control Volume +/- to set equal loudness levels.

**Note:** The Cinema 8 will play the Test Tone in each speaker individually if you highlight one during sound level set up and press the volume + or - button. It will switch to each speaker automatically and show a musical note next to the channel playing after a short delay. Use either level setting method according to whichever is more comfortable for you. Both methods give accurate set up volume level readings.

A tape measure is essential for setting speakers for correct distances and angles of 'toe in' or the correct listener to speaker distance in DISTANCE. Measure the distance from the main listening spot to each speaker and enter the distance into the settings for FRONT LEFT, CENTER, FRONT RIGHT, SURROUND, SURROUND BACK LEFT and SURROUND BACK RIGHT. The main front speakers should be equidistant, or nearly so, from the main listening spot for the best 'focus' in your system.



Turn on the power for your DVD player, open the drawer and insert a DVD disk. Check for a medium volume setting on the Cinema 8 to ensure a not too loud initial setting, and get ready for fun! Select the DVD input, press PLAY on the DVD player and enjoy your new audio video surround sound system.

## **IMPORTANT NOTES ABOUT THE CARY CINEMA 8:**

1) The Cinema 8 rear panel L and R channel XLR balanced analog inputs may be sent through the DSP or may be set to BYPASS the DSP during playback. This option is selected in SET UP. The 7.1 analog preamplifier inputs on the rear panel are for multi channel DVD-AUDIO or SACD analog playback.

2) When any input is selected, the Cinema 8 will initially 'look' for a digital input signal. If no digital input signal is found it checks the analog audio inputs. If you change the digital audio output setting of your DVD player from Dolby Digital to DTS digital output, the Cinema 8 will automatically switch to DTS decoding mode while the disk is playing. Some DVD disks and some DVD players will not allow the digital audio output settings to change while they are playing a DVD disk.

3) Pressing the central round SELECT button on the remote control will make the Cinema 8 seek the next active input signal. If no inputs are active, it will briefly state this in the on screen display.

4) If you are playing back a Dolby 2.0 digital program the Cinema 8 can use Dolby Pro Logic II or DTS NEO 6 decoding to provide surround sound from the source material. (Dolby Pro Logic II decoding will not work with DTS encoded source material.) Select Pro Logic II Movie or NEO 6 CIN with the MODE button. (Dolby 1.0 = MONO) Music surround modes may be used with CD or tuner stereo inputs. Dolby Pro Logic II MUSIC mode has adjustments in it for apparent room size, room sound liveliness or apparent width. Adjust those to your sonic preference with careful listening.

5) The MODE sound settings for Party, Natural, Dolby PL II MUSIC, DTS NEO MUSIC are for use with stereo music or music video input signals. They will allow the Cinema 8 to offer surround sound modes for signals that normally would be 2-channel stereo only. MONO is for any monophonic input you might choose to playback through your system such as mono DVD movie disks, AM radio for baseball games, news broadcasts, talk radio or other radio events. (DIRECT is displayed instead of STEREO if a DVD disk is being played.) Stereo96 is for 2 channel stereo output from the Cinema 8.

6) The speaker sound level Set Up for speaker balance should be done when you are sitting in your favorite viewing location with the meter aimed up and forward at a 30-45 degree angle from vertical.

7) There are 30 different color combinations available for the on screen display in the Cinema 8. Choose the one that is visually most pleasing to see as the default setting while in DISPLAY SET UP.

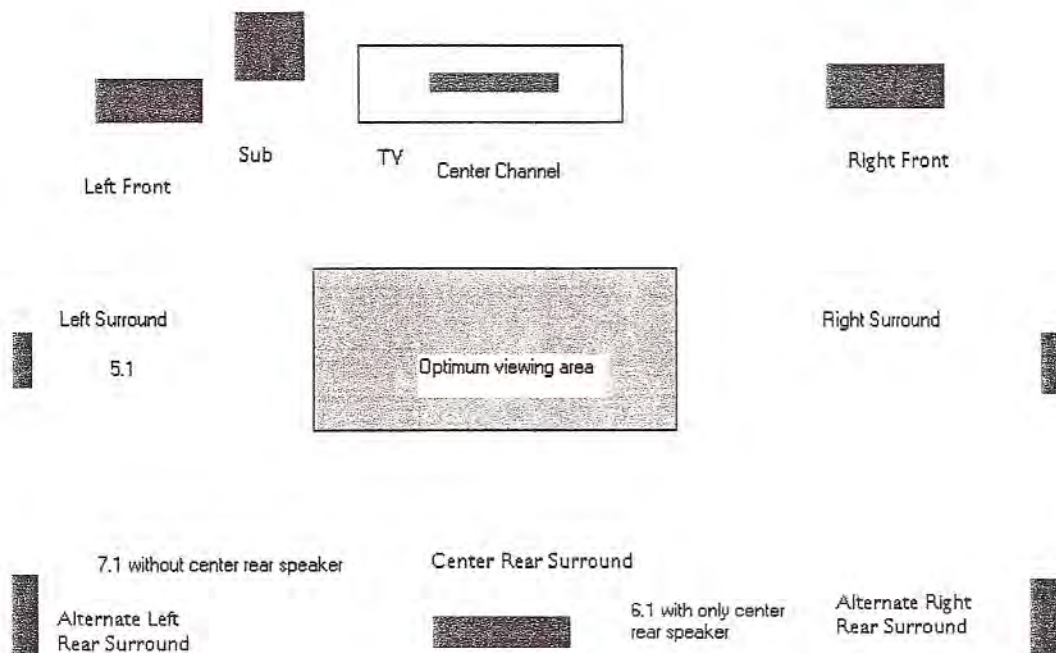
8) The majority of video source material is 5.1 encoded. Only DTS-ES, DOLBY EX or Surround 6.1 will use all the preamplifier outputs from the Cinema 8. Other material will be 5.1 output until you select Dolby EX, DTS-ES or Surround 6.1 as a mode, if it is applicable to the source material.

- Radio Shack is a trademark of the Radio Shack Corporation of Fort Worth, Texas.
- THX is a trademark of Lucasfilm Limited.
- Dolby EX, Dolby Surround, Dolby Digital, Dolby 2.0 and Dolby Pro Logic II are trademarks of Dolby Laboratories.
- DTS, DTS-ES and DTS NEO are trademarks of Digital Theater Systems, Inc.

All trademarks remain the property of their respective owners.

All of us at Cary Audio Design wish to thank you again for choosing our Cinema 8 to be your surround sound processor preamplifier! See the drawing for suggested speaker layouts. Other layouts are possible or desirable in some room layouts. Ask your dealer for advice if your room is unusual in shape, such as an 'L' shaped room.

The optimum listening and viewing experience is in the central area, shown in the diagram. Optimum viewing distance is a minimum of ~ 3.3 times the screen size. As an example, a 42" wide, 16 x 9 plasma TV would be best if viewed from a minimum of 11-12 feet from the screen. Small rooms would need a smaller TV. Viewing too close to a very large display will emphasize any artifacts in the video signal.



Above is a suggested speaker system layout for 5.1, 6.1 or 7.1 speaker installation. The suggested DVD-Audio 5.1 speaker layout may vary from this pattern somewhat, with the Left Surround and the Right Surround speakers moved a bit further back in the room and angled in toward the center listening area a bit, not aimed straight across as in this diagram. We suggest that you experiment a bit with this for your listening room to see which works best for you.



## Some useful advice about speakers, sub woofers and room placement.

- The Sub Woofer placement will vary greatly from room to room and should be chosen after careful listening to find the best location. Some areas of the room will diminish bass power (null spots) and some will enhance bass response. An easy way to find a good location is to put the woofer in the main listening spot, play strong bass material and walk around the room for possible locations. Strong, tight bass in a usable speaker location would make it a good place to locate the sub woofer.
- Corner placement will increase overall bass output but it may be 'loose' or bloated sounding, not as 'tight and fast' as a location along a wall or slightly out from the back or side wall. If your sub offers a control for driver 'Phase' it may be helpful to tune this *after* all other adjustments for sub woofer location have been made.
- All of the speakers should ideally be the same brand and similar models to enhance the focus and clarity of the surround sound system with music or movies as source material. Mixing and matching various brands and types of speakers will cause frequency response and imaging anomalies that will have a highly adverse affect on your surround sound system. We strongly suggest using matched speaker sets from a single speaker maker for your system. As the source material improves on DVD, CD, DVD-Audio and satellite TV this careful matching of speakers will become more important to overall listening satisfaction and sound quality with your surround sound system.
- We always use matched, single brand speaker sets in our live demonstrations at CEDIA or at CES trade shows so that the surround effects and musical details are naturally highlighted during playback. Mismatched speaker sets will make timbre, phase and imaging changes that may be detrimental to the overall surround or stereo sound effects desired by the original artists. Discuss this with your installer or dealer if you need advice.

## DIALOGUE NORMALIZATION

**Note:** Occasionally you will see a readout in the front panel display that will say 'dialogue normalization,' followed by a + or – symbol with a digit, such as +2. This is showing that the source movie has a recorded dialogue level such that you need to add 2 dB of extra volume to have the movie play back at Dolby standard level. If it said – 2 dB then reduce the playback volume level setting by 2 dB to play at 'standard level' for Dolby Digital playback. This is not a critical setting and may be ignored if you wish. We merely wish to explain what this display phrase means if you happen to notice it during the start segment of a Dolby Digital encoded movie. This will not appear if you are using DTS for playback or for analog signals.



# TABLE OF CONTENTS

	Page
<b>INITIAL SET UP OF THE CINEMA 8</b>	<b>2</b>
<b>I: INTRODUCTION</b>	<b>8</b>
<b>II: REAR PANEL CONNECTIONS</b>	<b>9</b>
<b>Power connections</b>	<b>9</b>
• AC Power	9
• Power Switch	9
<b>Audio connections</b>	<b>9</b>
• Analog inputs	9
• Tape input/output	9
• Record outputs	10
• Zone audio output	10
• 7.1 Channel inputs	10
• 5.1, (6.1, 7.1) Channel outputs	11
• Coaxial digital audio inputs	11
• Optical digital audio inputs	11
• AES/EBU balanced digital audio input	12
<b>Video connections</b>	<b>12</b>
• Composite Video inputs	12
• Composite Video Record and Monitor outputs	12
• S-Video Inputs	12
• S-Video Monitor outputs	12
• S-Video Rec. output	13
• Component Video inputs and output	13
• Optical Digital output	13
• RS 232 Control Interface	13
• IR inputs	14
• Remote Trigger outputs	14
<b>III: FRONT PANEL CONTROLS</b>	<b>14</b>
• Standby Switch	14
• Display	14
• Volume Control	15
• Source < and > Buttons	15
• Surround Mode ^ and v Buttons	15,16

<b>IV: REMOTE CONTROL HANDSET OPERATIONS</b>	<b>17</b>
• Power	17
• Volume	17
• Mute	18
• Mem/Enter	18
• Up, Down, Right, Left Keys	18
• Direct Access Keys	18
• Cinema Equalization	18
• 7.1 CH Input	19
• Tape Monitor	19
• Bass Mix	19
• Compression (DYN) (for late night viewing)	19
• Source + and Source -	19
• Surround Mode ^ and Mode v	19
• Zone	20
<b>V: ON SCREEN DISPLAY AND FRONT PANEL DISPLAY SETUP MENUS</b>	<b>21</b>
• Main Menu	21
• Tone Controls and Preset	21
• Level Setup	22
• Delay Setup	22,23
• Speaker Setup	24
• Source Setup	24,25
• Display Setup	25
• Trigger Setup	26
<b>VI: TROUBLE SHOOTING GUIDE</b>	<b>28</b>
<b>VII: SPECIFICATIONS</b>	<b>29</b>
<b>VIII: REMOTE CONTROL BUTTON ARRANGEMENT</b>	<b>30</b>



# I: INTRODUCTION

Thank you for selecting the Cinema 8 Preamplifier for your audio and video signal processing needs. The Cinema 8 is the center of a High-End home cinema and audio system. It decodes Dolby Digital, DTS and Dolby Pro Logic source material from normal or High Definition TV, satellite broadcasts, DVD disks, VCR tapes or Laser Disks. Naturally, the Cinema 8 can function as a High-End stereo preamplifier.

The Cinema 8 accepts up to seven digital input sources, ten line level audio input sources, a tape monitor loop and two additional record outputs. It has six S-Video, six composite video inputs, S-Video and composite video monitor OSD (On Screen Display) outputs, S-Video and composite video record outputs, three Component video inputs and one Component video output.

The Cinema 8 has two main modes of operation: In the normal function mode it automatically senses the type of the incoming signal and selects the mode that gives optimal reproduction quality. The user can disable the automatic selection and select different post-processing modes for the incoming signals. These modes are stereo, Dolby Pro-Logic, mono down mixing and Music Modes: Natural Dolby Pro Logic II Music, DTS NEO Music and Party. If desired, the user can bypass the digital section of the Cinema 8 and connect a stereo source to the XLR Left and Right channels or the 7.1 channel input to achieve *stereo or multichannel analog bypass mode*.

System integration options are provided by the three 12 VDC trigger outputs to control external equipment and by communication with a PC or home automation system via the RS 232 interface.

**DANGER: Moisture is dangerous for any electric device and forms a fire hazard or risk of electric shock. If liquid is accidentally spilled on the 8 *immediately shut off its power at the wall outlet by unplugging the AC power cord*. Allow sufficient time for complete evaporation before using the preamplifier again. If any liquid other than water enters, do not use the device before examination by a qualified service technician.**

**DANGER: Do not open the cover, or try to modify or repair the preamplifier yourself in case of trouble. All servicing should be referred to a qualified service technician or your Authorized Cary Cinema dealer.**



## **II: REAR PANEL CONNECTIONS**

### **1: AC POWER connection**

Plug the male end of the power cord into a wall socket or a power stabilizing/filtering unit. NOTE: Connect the Cinema 8 to a *grounded* wall socket for proper operation. The Cinema 8 will automatically adjust to the AC power in your area, from 100-240 volts AC.

### **2: POWER SWITCH**

Press the bottom of this rocker switch to turn the preamplifier ON and the top to turn it OFF. In the OFF position all power is disconnected from the preamplifier. In the OFF position the Cinema 8 cannot be powered up from the front panel or the remote control. In the ON position the 8 will power up in standby mode (see FRONT PANEL CONTROLS, STANDBY). If you are not going to use the Cinema 8 for an extended period of time, you should turn the POWER switch OFF. NOTE: Always switch the Cinema 8 to STANDBY mode before switching the POWER OFF.

## **AUDIO CONNECTIONS:**

### **3: ANALOG INPUTS 1 thru10**

Connect the stereo analog output cables of source components to these sockets. Always connect these analog audio inputs, even when you are going to listen only via digital inputs (such sources as DVD or CD players). This ensures that there is always a signal at the record outputs. The signal from the ANALOG audio inputs goes through an analog to digital (A/D) converter that turns the analog signal into digital form. The signal is now ready for decoding or processing with Dolby Pro Logic, DTS NEO or Music Modes. The signal is fed to D/A converters and to the 7.1 Channel outputs, as the unit is configured (D/A = Digital to Analog). The analog audio signal you have selected is also fed to the three ANALOG outputs, for Zone 2 or for tape recording.

### **4: TAPE INPUT/OUTPUT**

These connectors suit all types of tape recorders, including three-head types which allow you to monitor the signal from the tape at the same time it is being recorded. Connect a stereo cable pair from the TAPE REC output sockets of the preamp to the LINE IN or RECORD IN sockets of your tape recorder. Connect a second pair of stereo patch cable from the TAPE PLAY input sockets to the LINE OUT or PLAY OUT sockets of your tape recorder.



Using the TAPE loop you can monitor the level and quality of the recording at the same time as the recording takes place. You can also use it for connecting external devices such as an equalizer to the signal path. Note: You must bypass it when listening to a Pro Logic source.

Any ANALOG stereo source you have selected on the Cinema 8 will be automatically fed to the TAPE REC output sockets for recording. You cannot make a recording from a source that is connected to the digital inputs or the 7.1 channel bypass inputs.

## **5: RECORD OUTPUTS 1...2**

The REC outputs carry the signal from the currently selected ANALOG stereo source device (except the source connected to the TAPE PLAY input or the 7.1 CHANNEL INPUT). You can connect these outputs to the inputs of any recording device. The signal can also be used in a multi-room set-up to feed power amplifiers in the other rooms.

## **6: ZONE AUDIO OUTPUT**

This is an additional stereo output. You can use it to give a signal from the Cinema 8 to a power amplifier and a pair of loudspeakers that are located in another room. This is a variable volume output, like a stereo preamplifier, for another room or multi-zone system. Choose the source component for Zone 2 in Source Set Up.

**7: The 7.1 CHANNEL BYPASS INPUTS** connect the audio outputs from any multi-channel analog source such as an SACD player or a DVD-Audio player to the inputs by using up to 5.1 interconnect cables. The 7.1 CHANNEL inputs may be used with mono, stereo, 5.1 channel, 6.1 channel or 7.1 channel sources. You can also use these inputs as an "Analog Direct" input if you want to bypass the digital section of the Cinema 8. Note: In this case you cannot use the record outputs.

**8: 7.1 CHANNEL OUTPUTS (LEFT FRONT, CENTER, RIGHT FRONT, LEFT SURROUND, LEFT REAR, REAR SURROUND, RIGHT REAR AND SUBWOOFER)** Connect these outputs to the line inputs of your power amplifiers. The SUB output is normally fed to the low-level Line Input of an active subwoofer. Alternatively it may feed a passive subwoofer through a separate power amplifier. These outputs carry the analog signal that is fed to the LEFT REAR and RIGHT REAR 7.1 CHANNEL INPUTS so that the 8 can be used with an external 7.1 channel analog source connected to the 7.1 channel inputs. Dolby EX or DTS-ES signals will use 6.1 or 7.1 speaker outputs when the 8 is set to these modes of operation with appropriate source material.

## 17: COAXIAL DIGITAL AUDIO INPUTS 1...4

Connect the coaxial digital output cables from your source devices to these inputs. You can freely associate the digital inputs to any analog audio source (see menu option for further reference), but the 8 is supplied with the following setup:

Digital audio input	Associated to input	Reassigned to input
COAX 1		
COAX 2		
COAX 3		
COAX 4		
OPTICAL 1		
OPTICAL 2		
AES/EBU		

Note: If you reassign any of the digital inputs to different inputs, record this in the blank column on the right.

## 8: OPTICAL DIGITAL AUDIO INPUTS 1...2

These connections require optical cables and connectors. You can freely associate the optical inputs to any analog source (see menu option for further reference), but the 8 is supplied set up as shown in the table above.

## 9: AES/EBU balanced digital input

This is connection uses an XLR jack to allow a balanced digital source to be played back through the Cinema 8. Some CD and DVD players offer this output.



# VIDEO CONNECTIONS:

## 10: COMPOSITE VIDEO INPUTS 1 thru 6

Connect the composite video output cables coming from your video sources to these inputs.

**Note:** Take care to use the SAME NUMBER inputs for the composite video, S-Video and analog audio cables from a single source. For example, cables from a DVD player attached to VID 1 should go to the VIDEO 1 S-VIDEO or VIDEO 1 COMPOSITE VIDEO and VIDEO 1 ANALOG audio inputs. The composite video signal or S-Video is selected from these signals, and the signal is fed out from the COMPOSITE VIDEO record (REC) and monitor (MON) outputs. On Screen Display information is added to the MON output. If the DVD is also multi channel analog out, for SACD or DVD Audio, connect the 6 channel analog outputs to the 7.1 BYPASS INPUTS on the rear panel.

## 11: COMPOSITE VIDEO OSD OUTPUTS

The On Screen Display (OSD) information is present at this output. You can also use the COMPOSITE VIDEO MON output even if there is an S-Video source connected. The S-Video signal you have selected is down-mixed to this output and you can use it for monitoring. You can switch OSD off by using the SETUP menu.

## 12: COMPOSITE VIDEO ZONE AND REC MONITOR OUTPUTS (MONITOR WITHOUT OSD)

This is an additional Composite Video and Monitor output. You can use it for an example to give a signal to a TV located in another room. On this Monitor output the On Screen Display (OSD) is *not* displayed.

## 13: S-VIDEO INPUTS 1...6

Connect the S-Video output cables from your video sources to these inputs. Note: Take care to use inputs with the same name/number for the Composite Video, S-Video and analog audio cables from a single source.

S-Video signals are of dramatically higher quality than Composite Video signals. If you have a source device with S-Video outputs, we recommend you to use them, together with the S-Video inputs on your display. S-Video inputs are automatically down-mixed to feed the Composite Video MON OSD output for displays that are without S-Video inputs.

#### **14: S-VIDEO MONITOR REC OUTPUT (WITHOUT OSD)**

On this S-Video Monitor output the On Screen display (OSD) is **not** displayed.

#### **15: S-VIDEO MONITOR OSD OUTPUT (with OSD)**

On this S-Video output the On Screen Display (OSD) is displayed.

#### **16: S-VIDEO VCR REC OUTPUT**

Connect the S-Video input of your VCR to the S-VIDEO VCR REC output. Connect the S-Video input of your display device (TV) to one of the two S-VIDEO MONITOR outputs (see items 13 and 14).

**17: COMPONENT VIDEO INPUTS 1-3 AND OUTPUTS:** The Component video connections are used with a high performance video source, such as a DVD player or a line doubling adapter, that offers the video signal as a component output signal. There is **no** OSD on screen display for this input/output set. If an on screen display is desired, connect the composite video or S-Video OSD output to a second input on the video monitor.

#### **18: OPTICAL DIGITAL OUTPUT**

Connect the DIGITAL output to the optical digital input of your digital recorder. The selected digital source is fed to this output digital format.

#### **19: BALANCED DIGITAL AUDIO INPUT**

This digital input requires an XLR cable connection from the source component.

#### **20: RS 232 CONTROL INTERFACE**

Via this interface you can connect the Cinema 8 to a home automation system. Contact your custom install dealer for details about RS-232 ports and their use in custom install systems. We offer custom control information to authorized dealers for this connection.

#### **21: IR INPUT/OUTPUT**

These connections are for Zone 2 Infrared remote controller connections.

#### **22: REMOTE TRIGGER OUTPUTS 1...3**

You can connect the DC trigger inputs of any audio of other device to the TRIGGER outputs. The TRIGGER output may be activated when the 8 is switched out of



STANDBY and immediately turned off again when the 8 switched into STANDBY again. You can also program the TRIGGER outputs to be activated under other conditions, SUCH AS WHEN A CERTAIN COMPONENT IS CHOSEN AS A SOURCE (see menu section). The TRIGGER outputs deliver 12 VDC at a maximum total current (for the three outputs) of 200 mA. Trigger 2 and 3 are in parallel and are therefor marked as 2/2 on the rear panel.

**CAUTION:** CONNECT OR DISCONNECT THE TRIGGERS ONLY WHEN THE POWER SWITCH IS OFF, OR THE UNIT IS DISCONNECTED FROM MAINS POWER!

### III: FRONT PANEL CONTROLS

#### STANDBY SWITCH

When you plug the 8 into a "live" mains power wall socket and turn the POWER switch ON, it will power up in "standby" mode. In this mode the internal circuit of the 8 is powered but inactive. When you press the STANDBY button the 8 is activated. The INPUT last used and the MODE last used is selected and the LED above the STANDBY button will glow blue. The LINE outputs will be muted for a few seconds. When you press the STANDBY button again the device will return to standby mode *with no lights showing*. Note: always switch the 8 to STANDBY before switching the POWER OFF at the rear panel to prevent an unwanted output pulse being sent to the power amplifier.

**DANGER:** In the STANDBY mode the internal circuitry is still "live". Please *follow all safety precautions to prevent electric shock or fire!*

#### DISPLAY WINDOW

Behind the display window there is a high quality blue Vacuum Fluorescent Display (VFD) that shows the volume setting, the input selected and operating condition of the Cinema 8. Behind the window there is also an infrared receiver which receives the commands sent from the remote handset to the Cinema 8.

#### VOLUME CONTROL

With the volume control you can adjust the sound level of the signals that are fed to the LINE inputs. You can adjust the listening volume at the same time as your are recording without affecting your recordings level settings. (Note: The volume control does not affect the signals that are fed to the TAPE REC sockets.)

The volume setting indication is situated in the bottom right of the display, for example "Vol: -15". The display shows the preamplifier gain in dB (decibels). If you set the volume below -20, the 8 Cinema will remember this level when you switch it into STANDBY mode and will reinstate the level when you switch it back on again.



Note: If you switch the Cinema 8 into STANDBY mode with a volume setting higher than -20 dB, (for example -10 dB,) it will automatically reset it to -20 dB when you switch it on again. This is to protect your ears and the loudspeakers from sudden, excessively loud sound levels.

## SOURCE SELECT (< AND >)

With these buttons you can browse up or down through the inputs to select the source (audio or audio-video) that is fed to the main outputs. The signal you have selected will also be fed to the TAPE REC output sockets for the recording. The display shows the input you have selected. The SOURCE and buttons browse through all the sources except TAPE. You can select the 7.1 CHANNEL and TAPE inputs by the TAPE MONITOR and 7.1 CHANNEL input buttons (see below).

When you select any input, the 8 automatically switches to the operating MODE last used with that input, or to the correct digital decoding if an active digital source is assigned to the input.

## SURROUND MODE BUTTONS

You can use the MODE buttons to cycle through the Music Modes that are available when you select a 2-channel digital or analog source. The SURROUND Modes are: STEREO, MONO, PRO LOGIC and MUSIC and they are described in the table on the next page. If you select a multi-channel digital source, the 8 will automatically use the most appropriate multi-channel processing format.

MODE	SIGNAL TYPE	PROCESSING	OUTPUT FROM SPEAKERS
Stereo	Dolby Digital 5.1, Dolby Digital EX	Not applicable	Not applicable
	Dolby Digital 2/0	Stereo	L,R
	Dolby Digital 2/0 Pro Logic flag on in the bitstream	Stereo	L,R
	DTS 3/2, DTS ES	Not applicable	Not applicable
	PCM	Stereo	L,R
	Analog signal	Stereo	L,R
MODE	SIGNAL TYPE	PROCESSING	OUTPUT FROM



<b>Mono</b>	Dolby Digital 5.1	Not applicable	Not applicable
	Dolby digital 2/0	Not applicable	Not applicable
	Dolby digital 2/0, Pro Logic on in the bitstream	Not applicable	Not applicable
	DTS 3/2, DTS ES	Not applicable	Not applicable
	PCM	Mono	C
	Analog signal	Mono	C
<b>Pro Logic (PL II)</b>	Dolby Digital 5.1, Dolby EX	Not applicable	Not applicable
	Dolby Digital 2/0	Dolby Pro Logic	L,R,C,LS,RS
	Dolby digital 2/0, Pro Logic flag on in the bitstream	Dolby Pro Logic or Dolby Pro Logic II	L,R,C,LS,RS
	DTS 3/2, DTS ES	Not applicable	Not applicable
	PCM	DTS NEO Dolby Pro Logic	L,R,C,LS,RS
	Analog signal	Dolby Pro Logic	L,R,C,LS,RS
<b>Music Modes: Natural, Party, PL II Music, NEO Music</b>	Dolby digital 5.1	Not applicable	Not applicable
	Dolby digital 2/0	Not applicable	Not applicable
	Dolby digital 2/0, Pro Logic flag on in the bitstream	Not applicable	Not applicable
	DTS 3/2, DTS ES	Not applicable	Not applicable
	PCM	Music Mode	L,R,C,LS,RS
	Analog signal	Music Mode	L,R,C,LS,RS

The 7.1 CHANNEL INPUT is intended for analog multi-channel formats like SACD or DVD Audio. When you press this button, it will select the 7.1 CHANNEL INPUT. You may deselect it by choosing a different source using the SOURCE SELECTION buttons or by pressing the 7.1 CHANNEL INPUT button again. In the latter case the Cinema 8 will return to the input that was previously selected before the 7.1 button was pressed. In both cases the similarly named buttons on the remote control handset function in exactly the same way.

## **IV: REMOTE CONTROL HANDSET OPERATIONS**

EXAMPLES OF SOME OF THE MOST COMMON REMOTE COMMANDS:

### **POWER (ON-OFF button)**

This key operates the same way as the STANDBY button on the front panel. It sends the command to switch the 8 into or out of standby mode.

### **VOL ^ and v (also DIGITAL ^ and v buttons)**

When you press the ^ key you will increase volume setting, and when you press the v key you will decrease volume settings. These keys work the same way as the rotating volume control on the front panel. If the 8 is in the mute mode (after you have pressed the MUTE key on the handset), and you then press the VOLUME key, the 8 will automatically disengage the mute mode and reconnect the signal to the power amplifier and the loudspeakers.

### **MUTE**

When you press the MUTE key on the remote handset, it will engage mute mode and the 8's line outputs will be muted. MUTE is a toggle function, so when you press the key again it will disengage the mute mode. Mute mode is also disengaged when you increase the volume setting by using the VOL key on the remote handset.

### **MENU**

When you press this key the 8 goes to setup mode. Use the up/down/left/right keys to navigate the menus. The 8 escapes from setup mode when you either select EXIT from the OSD (or VFD) or press MENU key again.

### **EXIT**

This key exits the setup mode without saving the new settings. You can use it if you have adjusted the setup menu by accident.



## **SELECT/PLAY**

This is the “enter” key in setup mode. You can use it to access sub-menus or to activate special menu items.

## **UP, DOWN, LEFT, RIGHT KEYS ( ^ v < > )**

You can use keys to navigate in the menu. The up and down keys are for selecting the parameter to be adjusted. The left and right keys are for adjusting the parameter you have selected with the up and down keys. The selected parameter is shown in the OSD with different color and in the bottom row of the front panel display, or by an arrow in the beginning of the line.

## **DIRECT ACCESS KEYS**

There are direct access keys in the remote control handset. You can access all sources directly from those keys. For example when you press the AUDIO 2 key, the audio and video input signals are selected for analog AUDIO INPUT 2. They are processed and fed to the appropriate outputs for listening and viewing.

## **CINEMA Equalization**

When you press the Cinema button CINE equalization will be switched on and the text CineEQ ON will appear in the front panel display and On Screen Display. Press the button again when you want switch CINEMA EQ off.

This feature is offered because sometimes a movie soundtrack sounds overly ‘bright’ because it has been balanced to take account of the acoustics in typical movie theaters where the speakers are installed at a greater distance than in your home and they are playing *through* the movie screen. Cinema Equalization is designed to compensate for this excessive brightness without impairing treble sound quality. **Note:** If the Cinema 8 is set to a Music Mode, then CINEMA EQ does not function.

## **7.1 CHANNEL INPUT (BYPASS)**

The 7.1 button gives you instant access to select the 7.1 CHANNEL INPUT, which is deselected when the source is changed by using either the remote control handset or the front panel SOURCE SELECT buttons or by pressing the 7.1 CH button again.

## **TAPE MONITOR**

When you press the TAPE MONITOR button you can hear the output signal from a tape or digital recorder connected to the TAPE PLAY sockets on the rear panel. This is a toggle function button: press it once to engage and again to disengage.

The TAPE MONITOR input also disengages if you select a new source either from the remote control handset or from the front panel. When you press the TAPE button, it has no effect on the other source select buttons.

## **BASS MIX**

This key switches on and off the Bass Mix mode. In this mode the bass signals are sent to the "Large" loudspeakers *and to the subwoofer channel*. This allows more bass volume, provided full range main loudspeakers are employed.

## **COMP (Late Night COMPRESSION ON/OFF)**

This key activates the Dolby Late Night function that compresses a Dolby Digital soundtrack so that all details are audible even at low listening levels, but loud sounds are reduced in volume. **Note:** This function only works with Dolby Digital sources.

## **SW, CTR, SURR, BASS, TREBLE round buttons**

These buttons access the Subwoofer, Center, Surround, Bass and Treble functions directly, without going into SETUP mode. You may add or subtract by pressing the + or - buttons on with the labels SW +, SW -, etc..

## **ZONE button**

This will show the input chosen for use by the second zone user in your system. Ask your custom installer about multi zone systems.

## **SOURCE < AND > (REW/FF on remote handset)**

These buttons scroll through the SOURCE inputs.

## **SURROUND MODE ^ AND v**

These buttons function in the same way as the SURROUND MODE button on the front panel, allowing selection of the available signal processing modes.

## **V: ON SCREEN DISPLAY (OSD) AND FRONT PANEL DISPLAY SET UP MENUS**

When you press the Mem/Enter button on the remote control handset, it will access the Setup Menus. The UP and DOWN arrow keys are for navigating in the menus.

Use the UP and DOWN keys to move the cursor in the menu to highlight a sub-menu or function to be adjusted. To select a sub-menu, press the Mem/Enter key in the middle



of the cursor keys. Adjust the functions by using the LEFT and RIGHT Auto Video/Tune KEYS.

The front panel display shows only one title line and one other line of the menu, commencing with the top line. You can use the UP and DOWN keys to select the other lines of the menu, to access a sub-menu or a function to be adjusted. Use the Mem/Enter, Up, Down, Left and Right keys as described above. You can do all the setups by using the front panel display, if you so desire. (OSD gives more information on your TV screen.)

## **MAIN MENU**

The main menu lists sub-menus that can be highlighted by using the UP and DOWN keys and accessed by pressing the SEL key.

- **AUDIO CONTROL** allows adjustment of the Bass and Treble levels and includes settings for the PRESET 1 through 5 memory settings. PRESET allows the front, center and rear volume levels, Bass and Treble to be set for different levels with five different memories or presets.
- **LEVEL SETUP** allows the speaker volume levels to be adjusted individually for all channels, in ½ dB steps.
- **DISTANCE SETUP** sets the individual distances for the Front Left, Center, Front Right, Left Surround, Left Back, Right Back and Right Surround speakers, in Feet or Meters, according to your choice in SET UP.
- **SPEAKER SETUP** defines the number and size (Large/Small/None) of the speakers in your system including sub woofer ON/OFF (5.1, 6.1, 7.1 speaker selection)
- **SOURCE SETUP** defines source related parameters, for all video or audio inputs
- **DISPLAY SETUP** changes video formats (NTSC/PAL) and defines how the On Screen Display works, with 30 color schemes for OSD included
- **TRIGGER** setup sets the parameters for the TRIGGER functions for 1 and 2/2 connections (Trigger 2 and 3 are in parallel)

## **TONE CONTROLS**

- You can adjust bass between 12 dB cut (-12 dB) and 12 dB of boost (+12 dB) in 1-dB steps. You can adjust treble between 12 dB cut and 12 dB of boost in 1 dB steps
- **PRESET** allows you to set the relative levels of the Tone controls, the Volume levels for Main, Center, Sub Woofer and Rear speakers and associate these with a



particular INPUT in SOURCE SETUP. There are 5 Preset settings possible. (As an example, it might be nice to change the frequency response settings of the bass and treble to adjust the sound for more natural tonal balance if your favorite radio station sounds like it has too much bass or treble in its broadcast signal. Reducing the bass or treble for the PRESET 1, and then associating PRESET 1 with the AM/FM Tuner input might make your favorite station sound more natural to you.)

## LEVEL SETUP

- Level allows all channels to be adjusted for volume, in  $\frac{1}{2}$  decibel steps, for maximum precision of the volume levels. We strongly suggest using a sound level meter for this adjustment. MAIN, CENTER, SURROUND, SURROUND BACK and SUB WOOFER levels are all adjusted in this section for equal output.
- The LFE (Low Frequency Effects) level refers to the level of the redirected bass from the LFE channel to the large speakers *in cases where there is no subwoofer in the system*. The LFE channel is the "0.1" of the 5.1, 6.1 or 7.1 channel digital surround signal. It is present only with the Dolby Digital and DTS 5.1 or 6.1 channel sources.
- The range of adjustment is from  $-10$  dB to  $+15$  dB, except for the LFE channel which you can adjust only from  $-10$  dB to  $0$  dB
- You can engage the NOISE signal by pressing either the NOISE button when in speaker set up. This will start the test signal cycling through the channels.

## DISTANCE SETUP

- You should measure the distance to all the speakers and enter the distance into the on screen set up so that surround delays are set correctly for your room. This will help the 8 create a highly focused sound field in the listening area. The distance can be in feet or meters, according to your preference and the setting you choose for this parameter.
- **Note: ( 1 foot  $\sim$  = 1 ms, 1 meter  $\sim$  = 3 ms)**
- You should normally position the Left and Right front speakers so that they are approximately equidistant to the center speaker from the listening position. This helps with imaging and overall focus for your system.



## **SPEAKER SETUP**

Speaker setup defines which speakers can handle full-scale low frequency signals as in the case of "Large" speakers. It also defines whether the bass from these channels must be redirected to those which have "Large" speakers or a subwoofer.

- Speakers that can handle full frequency signal (including full frequency range bass response) are set to Large.
- Speakers that cannot handle a full frequency range bass signal are set to Small. The lowest bass signals do not go to Small speakers but are redirected to the Large speakers and/or the subwoofer. The subwoofer crossover sets the crossover point from 40 to 140 Hz in 10 Hz 'steps.'
- If a speaker is not used (e.g. no Center channel speaker) set it to "NO" for none.
- You can set the subwoofer crossover frequency from 40 Hz to 140 Hz, in 10 Hz steps. The crossover frequency defines the frequency below which the low frequency signal does not go to Small speakers, but is redirected to the Large speakers and/or a subwoofer.
- Enhanced Bass duplicates the subwoofer information to both Large speakers and the subwoofer. You may desire this in some cases to get more bass from the system.

## **SOURCE SETUP**

- Source Setup specifies the parameters for each analog source 1-10. This includes which Digital or Component Video input is assigned to each source. It also indicates the analog input sensitivity. In addition you can change the name of a source as it appears in the on Screen and Front Panel displays. (CD-306 for your CD player, for example) PRESET 1-5 memories can be assigned to any input in the set up menu.
- When you select a source you may use the REW and FF keys to select which of the analog sources 1-10 are to be set up. When you select a Title you may edit the source Title. Press Mem/Enter and use the LEFT and RIGHT keys to choose the character you want to change and the UP and DOWN Volume keys to change the character. When the editing is complete, press Mem/Enter to store the new name. The table in the added pages, page 3, lists the default names for all the sources
- When you select Digital, you may use the LEFT and RIGHT Auto Video keys to select which of the seven digital sources is assigned to the analog source being set up. You may assign a digital source to more than one analog source.

## TABLE FOR RECORDING NEW SOURCE NAMES:

Source Number	Original Source Name	New Source Name	Remote Control Name Number
1	DVD		
2	CD		
3	LD		
4	VCR 1		
5	VCR 2		
6	VIDEO 1		
7	AUDIO 2		
8	AUDIO 3		
9	AUDIO 4		
10	SAT		

## DISPLAY SETUP

Display setup specifies the parameters for the On Screen Display. In each case you may use the LEFT and RIGHT Auto Video keys to alter parameters you have selected.

- Select TV System to switch between NTSC and PAL to suit your TV system
- Superimpose allows the OSD either to replace the TV picture (Off) or be superimposed over it (On)

During normal operation you can make a “temporary” OSD appear for a few seconds every time you do any adjustment. Set this by using the “Temp. Display” parameter that you can set to Full, Simple or Off, as you wish.

- You can set Video Format to S-Video, Composite or Auto; this will automatically select the best source present
- You can send the OSD (On Screen Display) either to the Composite or S-Video Monitor outputs or both. You can also switch it Off.



- OSD style changes the screen text color, with 30 different OSD color schemes to choose from in this section. Helpful warning notes are shown in a different color.

## TRIGGER SETUP

The Trigger Setup specifies the parameters for the DC Trigger outputs. You may set each of these parameters for TRIGGER 1, TRIGGER 2 and TRIGGER 3 OUTPUTS. (2/2, since 2 and 3 are in parallel)

Use the UP and DOWN Volume keys to select the parameter you wish to change. In each case use the LEFT and RIGHT Auto Video keys to alter the parameter you have selected.

- “Sense” sets which controls activate the trigger output. Set to Power On activate the trigger when switching out of STANDBY (and deactivate it when returning to STANDBY); Alternatively you may activate the trigger output when you select any of the inputs
- “Polarity” sets the polarity of the trigger output. “Posit.” gives a +12V DC output when trigger is active and +0V when inactive. “Negat.” gives +0V DC output when the trigger is active and +12 DC when the trigger is inactive.
- “Delay” sets a delay between the “sense” signal and the trigger output voltage change. You may set the delay to last from 1 second to 3 minutes or to “No” position that gives zero delay
- “Duration” Sets the period (duration) when the trigger output is active. You may set the trigger duration last from 10 ms (milliseconds) to 3 minutes, or to “Infin.” that keeps the trigger active while the “sense” condition prevails

## **VI: TROUBLE SHOOTING GUIDE**

**CAUTION:** If you detect a fault, switch the preamplifier OFF immediately before you check the device or change cables or connections.

### **No Sound**

- Power cord is disconnected or you have turned power OFF.
- You have selected an input with no source connected.
- You have selected an input that has no signal (e.g. tuner is not on, or there is no disc in the CD player or the tape recorder has no tape running)
- The fuse is blown.

### **Sound is missing in one or more channels**

- Check for a defective interconnect cable or loose cables
- The interconnect cable is making poor contact or not connected at all. Check the connection and if necessary, unplug and re-plug the cable or cables.

### **Buzz or hum**

- The interconnect cable is defective, poorly shielded or near a large power 'hum' source like a refrigerator or power amp transformer.
- The RCA interconnect cable is partially out of its socket, or slightly 'unplugged'.

### **Hum in tape playback**

- The tape deck is too close to the power amplifier's transformer
- Plugs are making poor contact with the input/output RCA sockets.

### **Some functions not working**

- Control processor is latched up. Switch the main POWER off or unplug the Cinema 8 and wait for about a minute. Switch the POWER on. The Cinema 8 should now operate normally. High static conditions may affect the operation of the Cinema 8. Please minimize static in the operating environment by increasing overall humidity levels in the air. Potted plants, for example, that are regularly watered will help with this problem. A humidifier will help with this as well.



## VII: SPECIFICATIONS

All specifications refer to 1 V rms. and 0 dBf digital or 2 V rms. Analog input, except when stated.

### Surround Sound Modes Available in the 8

Dolby Digital, Dolby Pro Logic, Dolby Pro Logic II, DTS, DTS ES, DTS NEO, Surround 6.1.  
Surround modes for stereo sources: Natural, Party, Dolby Pro Logic II Music, DTS NEO Music

### STEREO ANALOG INPUTS

Input level	2 V rms.
Input impedance/ capacitance	17 k/100 pF
Maximum input level (input sensitivity -6 dB)	4 V rms.

### STEREO ANALOG OUTPUTS (Tape REC and Record outputs)

Output level	2 V rms. (same as input)
Output impedance	60 ohms
Record outputs	500 ohms

### 7.1 CHANNEL ANALOG INPUTS

Input level	1 V rms.
Input impedance /capacitance	17 k/100 pF
Maximum input level	8 V rms.

### 7.1 CHANNEL LINE INPUTS

Input level	1 V rms.
Output impedance	60 ohms
Total Harmonic Distortion, Stereo source	0.01%
7.1 Channel source	0.003%
Signal to noise ratio (A-weighted, analog sources)	Stereo source > 90 dB
Maximum output level	8 V rms.

### Digital to Analog Converters

Bit Rate/Sample Rate	24 Bit/96 kHz
----------------------	---------------

Dimensions (width, height and depth)	18" X 5" X 15"
Weight	30 lb..
Voltage	115/240 V AC, 50/60 Hz

This product is manufactured under license from Dolby Laboratories Licensing Corporation. 'Dolby,' the Double-D symbol, 'Dolby Digital' 'Dolby EX' 'Pro Logic II' and 'Pro-Logic' are trademarks of Dolby Laboratory Licensing Corporation.

DTS, DTS ES and DTS NEO are trademarks of Digital Theatre Systems, Inc.

THX is a registered trademark of Lucasfilm Ltd.

## **VIII: CINEMA 8 REMOTE CONTROL HANDSET**

To use the supplied Universal SL 9000 remote control with the Cinema 8, **PRESS** the **AVC** button first. Now the function buttons will use remote commands that are set for the Cinema 8. Some of the buttons on the remote have features that apply more to other items, such as a VCR or a satellite dish. To make this possible the remote has more buttons on it than we need to control the operation of the Cinema 8.

We have 10 analog audio assignable inputs (capable of being renamed on the Cinema 8 front panel display) for audio or video source components. We have labeled them DVD, CD, LD, VCR 1, VCR 2, VIDEO 1, AUD 2, AUD 3, AUD 4, and SAT. ALL these inputs can be renamed or assigned to other inputs with the features in SOURCE SETUP in the MENU/SET UP mode of the Cinema 8. You can use the names we have included or change them to read any name that you prefer. As an example, a DVD input could be labeled as 'DVD 6' to match the model number of a Cary Cinema DVD player; different inputs could be labeled VCR, DB-Sat, Cable, etc.

**COMP** (Compression) only functions with Dolby Digital input signals, causing the late night dynamic compression function to turn on or off. This feature makes the quietest parts louder and the loudest parts quieter, in order to reduce the overall dynamic range of the movie. This makes it easier to understand spoken dialog and other aspects of the soundtrack while playing at a lower overall volume level. This is very considerate for late night viewing if others are trying to sleep while you enjoy a movie. For digital signal format inputs other than Dolby Digital, pushing the button will cause the display to read 'incompatible signal.'

Custom labeling of the inputs in the on screen display (OSD) is easy and will make it easier for other users to find the input source component they are wishing to use with the Cinema 8. Connect the Cinema 8 to a TV or while reading the front screen display press the Set Up button. Now you can work your way through the comprehensive functions to familiarize yourself with the complete feature set in your Cinema 8!

**Cary Audio Design  
1020 Goodworth Drive  
Apex, North Carolina 27539**

**Tel: 919-355-0010  
Fax: 919-355-0013**

**[www.caryaudio.com](http://www.caryaudio.com)**



**CARY AUDIO DESIGN**

1020 Goodworth Drive, Apex, NC 27539  
phone 919-355-0010  
fax 919-355-0013  
[www.caryaudio.com](http://www.caryaudio.com)

