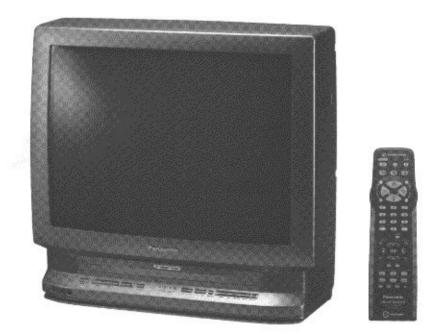


TV/Hard Disk Recorder Combination

Operating Instructions Model No. PV-SS2710





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Please read these instructions carefully before attempting to connect, operate or adjust this product. Please save this manual.



For assistance, Phone 1-888-843-9788

Web http://www.panasonic.com/video e-mail Consumerproducts@Panasonic.com

Important Safeguards and Precautions

READ AND RETAIN ALL SAFETY AND **OPERATING INSTRUCTIONS, HEED ALL** WARNINGS IN THE MANUAL AND ON UNIT

INSTALLATION

1 POWER SOURCE CAUTION Operate only from power source indicated on unit or in this manual. If uncertain, have your Electric Utility Service Company or Video Products Dealer verify your home power source.

2 POWER CORD PLUG

For safety, this unit has a polarized type plug (one wide blade), or a three-wire grounding type plug. Always hold the plug firmly and make sure your hands are dry when plugging in or unplugging the AC power cord. Regularly remove dust, dirt, etc. on the plug.

POLARIZED PLUG CAUTION:

The plug fits into outlet one way. If it cannot be fully inserted, try reversing it. If it still will not fit, have an electrician install the proper wall outlet. Do not tamper with the plug.

GROUNDING PLUG CAUTION:

The plug requires a three-hole grounding outlet. If necessary, have an electrician install the proper outlet. Do not tamper with the plug.

3 POWER CORD

To avoid unit malfunction, and to protect against electrical shock, fire or personal injury:

- Keep power cord away from heating appliances and walking traffic. Do not rest heavy objects on, or roll such objects over the power cord.
- Do not tamper with the cord in any way.
- An extension cord should have the same type plug (polarized or grounding) and must be securely connected. - Overloaded wall outlets or extension cords is
- a fire hazard.
- Frayed cords, damaged plugs, and damaged or cracked wire insulation are hazardous and should be replaced by a qualified electrician.
- **4 DO NOT BLOCK VENTILATION HOLES** Ventilation openings in the cabinet release heat generated during operation. If blocked, heat build-up may result in a fire hazard. For your protection:
 - a. Never cover ventilation slots while unit is ON, or operate unit while placed on a bed, sofa, rug, or other soft surface.
 - b. Avoid built-in installation, such as a book case or rack, unless properly ventilated.
- 5 AVOID EXTREMELY HOT LOCATIONS OR SUDDEN TEMPERATURE CHANGES Do not place unit over or near a heater or regulator, in direct sunlight, inside closed vehicles, in high temperature [over 95°F (35°C)], or in over 75% humidity. If unit is suddenly moved from a cold place to a warm place, moisture may condense in unit.

6 TO AVOID PERSONAL INJURY

 Never place unit on support or stand that is not firm, level, and adequately strong. The unit could fall causing serious injury to a child or adult and damage to the unit.



· Move any appliance and cart combination with care. Quick stops, excessive force, and uneven surfaces may cause objects to overturn.

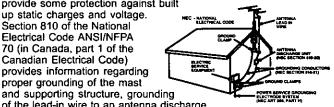
Carefully follow all operating instructions.

OUTDOOR ANTENNA INSTALLATION

SAFE ANTENNA AND CABLE CONNECTION 1

An outside antenna or cable system must be properly grounded to provide some protection against built

up static charges and voltage. Section 810 of the National Electrical Code ANSI/NFPA 70 (in Canada, part 1 of the Canadian Electrical Code) provides information regarding proper grounding of the mast



of the lead-in wire to an antenna discharge unit, size of grounding conductors, location of antenna discharge unit, connection to grounding electrodes, and requirements for the grounding electrode.

2 KEEP ANTENNA CLEAR OF HIGH VOLTAGE POWER LINES OR CIRCUITS

Locate an outside antenna system well away from power lines and electric light or power circuits so it will never touch these power sources should it ever fall. When installing antenna, absolutely never touch power lines, circuits or other power sources as this could be fatal.

USING THE UNIT

Before unit is brought out of storage or moved to a new location, refer again to the INSTALLATION section of these safeguards.

- 1 KEEP UNIT WELL AWAY FROM WATER OR MOISTURE, such as vases, sinks, tubs, etc.
- 2 IF EXPOSED TO RAIN, MOISTURE, OR STRONG IMPACT, unplug unit and have it inspected by a qualified service technician before use.
- **3 ELECTRICAL STORMS**

During a lightning storm, or before leaving unit unused for extended periods of time, disconnect all equipment from the power source as well as the antenna and cable system, and disconnect telephone line.

- **4 WHEN UNIT IS PLUGGED IN**
 - DO NOT OPERATE IF:
 - liquid has spilled into unit.
 - unit was dropped or otherwise damaged.
 - unit emits smoke, malodors, or noises.
 - Immediately unplug unit, and have it inspected by a service
 - Never drop or push any object through openings in unit.
 - Touching internal parts may cause electric shock or fire hazard. · Keep magnetic objects, such as speakers, away from unit to
 - avoid electrical interference.

5 USING ACCESSORIES

Use only accessories recommended by the manufacturer to avoid risk of fire, shock, or other hazards.

6 CLEANING UNIT

Unplug unit. Use a clean, dry, chemically untreated cloth to gently remove dust or debris. DO NOT USE cleaning fluids, aerosols, or forced air that could over-spray, or seep into unit and cause electrical shock. Any substance, such as wax, adhesive tape, etc. may mar the cabinet surface. Exposure to greasy, humid, or dusty areas may adversely affect internal parts.

SERVICE

DO NOT SERVICE PRODUCT YOURSELF 1

If, after carefully following detailed operating instructions, the unit does not operate properly, do not attempt to open or remove covers, or make any adjustments not described in the manual. Unplug unit and contact a qualified service technician.

2 REPLACEMENT OF PARTS

Make sure the service technician uses only parts specified by the manufacturer, or have equal safety characteristics as original parts. The use of unauthorized substitutes may result in fire, electric shock, or other hazards.

3 SAFETY CHECK AFTER SERVICING

After unit is serviced or repaired, request that a through safety check be done as described in the manufacturer's service literature to insure video product is in safe operating condition.

Safety Precautions



FER SERVICING TO QUALIFIED SERVICE PERSONNE

This symbol warns the user that uninsulated voltage within the unit may have sufficient magnitude to cause electric shock. Therefore, it is dangerous to make any kind of contact with any inside part of this unit.



This symbol alerts the user that important literature concerning the operation and maintenance of this unit has been included. Therefore, it should be read carefully in order to avoid any problems.

WARNING: To prevent fire or shock hazard, do not expose this equipment to rain or moisture. CAUTION: To prevent electric shock, match wide blade of plug to wide slot, fully insert.

FCC Information

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

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

If necessary, the user should consult the dealer or an experienced radio/television technician for additional suggestions. The user may find the following booklet prepared by the Federal Communications Commission helpful:

"How to Identify and Resolve Radio-TV Interference Problems."

This booklet is available from the US Government Printing Office, Washington, D.C., 20402, Stock No.004-000-00345-4.

FCC Warning: To assure continued FCC compliance, the user must use only shield interfacing cables when connecting to other devices. Also, any unauthorized changes or modifications to this equipment would void the users authority to operate.

Regulatory Notices for the U.S.

FCC Requirements

- 1. This equipment complies with Part 68 of the FCC rules. On the rear of this equipment is a label that contains, among other information, the FCC registration number and ringer equivalence number (REN) for this equipment. If requested, this information must be provided to the telephone company.
- 2. If the telephone company requests information on what equipment is connected to their lines, inform them of:
 - a. The telephone number to which this equipment is connected.

 - b. The ringer equivalence number c. The USOC jack required: RJ11C
 - d. The FCC Registration Number

Items (b.) and (d.) are indicated on the label of the back panel.

- A FCC compliant telephone cord and modular plug is provided with this equipment. This equipment is designed to be connected to the telephone network or premises wiring using a compatible modular jack that is Part 68 compliant. See Installation Instructions for details.
- 4. The REN is used to determine the quantity of devices that may be connected to the telephone line. Excessive RENs on the telephone line may result in the devices not ringing in response to an incoming call. Typically, the sum of RENs should not exceed five (5.0). To be certain of the number of devices that may be connected to a line (as determined by the total RENs) contact the local telephone company.
- 5. If this equipment causes harm to the telephone network, the telephone company will notify you in advance that temporary discontinuance of service may be required. But if advance notice isn't practical, the telephone company will notify the customer as soon as possible. Also, you will be advised of your right to file a complaint with the FCC if you believe it is necessary.
- 6. The telephone company may make changes to it's facilities, equipment, operations or procedures that could affect the operation of the equipment. If this happens the telephone company will provide advance notice so you can make the necessary modifications to maintain uninterrupted service.
- 7. If trouble is experienced with this equipment, for repair or warranty information, please contact the Panasonic Customer Call Center at 1-888-843-9788. If the equipment is causing harm to the telephone network, the telephone company may request that you disconnect the equipment until the problem is resolved.
- 8. Connection to party line service is subject to state tariffs. (Contact the state public utility commission, public service commission or corporation commission for information.)

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Privacy Policy

ReplayTV is committed to safeguarding your privacy. Please read the following so that you may understand more about ReplayTV's privacy policy.

Collection and Use of Personal Information and Operating Information

When you purchase and/or register your ReplayTV unit, ReplayTV receives certain information that personally identifies you ("Personal Information"). Personal Information may also be received when you interact in other ways with ReplayTV, its agents, or contractors. This Personal Information may include your name, home address, home telephone number, e-mail address, credit card number, unit serial number and model number, signal source, and information about other audio/visual equipment that you are using.

We will not make Personal Information available to third parties without your prior consent. However, in those circumstances where your Personal Information is needed to assure the ongoing functioning of your ReplayTV, is required to maintain or honor the warranty on your ReplayTV, or is needed by affiliated parties for their use to provide services to ReplayTV in the operation and delivery of the ReplayTV Service, your Personal Information may be used (without your prior consent) under our strict confidentiality protection agreements with the necessary third parties. Under no circumstances will we sell your Personal Information to anyone.

ReplayTV stores information consisting of electronic instructions and data communicated from your ReplayTV unit to the ReplayTV Service ("Operating Information"). Operating Information will not be linked to any of your Personal Information without your consent – it always remains anonymous. ReplayTV may report Operating Information to third parties in aggregate form that describes how our viewers use the ReplayTV Service and allows us to continue to develop and provide content, features and services that are of the most interest to our users. All third parties that receive Personal Information or Operating Information from us are required to maintain the confidentiality of such Personal Information and Operating Information and store it securely.

How to Access and Modify Personal Information and Operating Information

ReplayTV takes steps to safeguard Personal Information and Operating Information from unauthorized access. You have the right to know what Personal Information ReplayTV stores and to update that information at any time. You may access and make changes to your Personal Information by contacting ReplayTV at (800) 933-5899. At your request, ReplayTV will tailor its service to your individual preferences. With your consent, we can combine your Personal Information to create a personalized user profile. By allowing us to link together both sets of information, we can provide a service that will best match your personal interests and needs. You can elect to have this done by contacting ReplayTV at (800) 933-5899. If we do not hear from you, we assume that you wish to keep your Operating Information anonymous.

How We Safeguard Children's Privacy

ReplayTV does not knowingly collect or use Personal Information from children under 13 years of age without first obtaining verifiable consent from their parents. Should a child whom ReplayTV knows to be under the age of 13 send Personal Information to ReplayTV, ReplayTV will only use that information to respond directly to that child or seek parental consent.

Other Situations in which Personal and/or Operating Information May Be Disclosed

ReplayTV may disclose Personal Information and/or Operating Information if required to do so by law or in the good faith belief that such action is necessary or appropriate to conform to the law or comply with legal process served on ReplayTV, to protect and defend the rights or property of ReplayTV, the ReplayTV Service or our viewers, whether or not required to do so by law, or to protect the personal safety of our viewers or the public. ReplayTV reserves the right to contact appropriate authorities and disclose Personal Information to them at its discretion when it appears that activities which are illegal or violate the ReplayTV Service Terms of Service are taking place within the context of a viewer account.

Changes to the ReplayTV Privacy Policy

Replay TV may make changes to this Privacy Policy from time to time. We will post changes to our Privacy Policy to our website at www.replaytv.com. We may also notify you of significant changes by e-mail or in other ways.

Questions or Comments

If you have any questions or comments about our use of Personal or Operating Information or about this Privacy Policy, please contact us at (800) 933-5899 or via e-mail at customercare@replaytv.com. ReplayTV will use reasonable efforts to promptly investigate any complaint you may have regarding our use of Personal or Operating Information and to comply fully with the legal and regulatory supervisory authorities responsible for enforcing our adherence to the privacy principles stated above.

This product incorporates copyright protection technology that is protected by U.S. patents and other intellectual property rights. Use of this copyright protection technology must be authorized by Macrovision, and is intended for home and other limited consumer uses only unless otherwise authorized by Macrovision. Reverse engineering or disassembly is prohibited. **U.S. patent Nos. 4,907,093 licensed for limited viewing uses only.**

Before Using

Welcome to the Panasonic Showstopper TV/HDR Combo

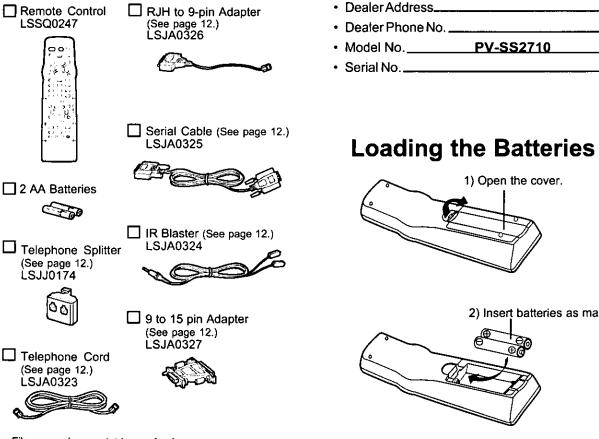
After you've experienced the exciting new world of personal television in your own home, you'll never want to watch plain old television again. Read on and see what the TV/HDR Combo can do. No videotape. No hassles. No compromises. If this sounds like the television experience you've always dreamed of it's because it is!

- The TV/HDR Combo gives you the ability to easily find and automatically record your favorite television shows, then watch ٠ them whenever you want. On your schedule, not somebody else's. You will never miss your favorite TV shows again!
- Create personal Replay Channels based on your favorite television shows ٠ or themes - like actors, directors, sports teams, or hobbies. These channels will automatically record each new episode of your favorite shows, or constantly search for and record shows that match your interests.
- · Check out the exciting television shows in ReplayZones™ --- all of your favorite shows have been pre-organized by topic, in one easy-to-find area.
- · You have the power to control live television. You can pause, rewind, play in slow motion, watch instant replays, and more, all without missing a single scene.
- Instantly jump over undesired recorded television scenes with QuickSkip™.
- . Unsure of what channel or time a show is on? Looking for a specific show title, actor, director, or topic? Use Find Shows - a real-time, keyword search function.
- Get advanced television features such as Closed Caption, Sleep Timer, Stereo System (SAP), and V-Chip Control.



Package Contents

As you unpack the TV/HDR Combo, make sure the following items were included. To order accessories, call toll free 1-800-332-5368.



- File your sales receipt in a safe place.
- Thoroughly review the safety information and strictly follow all setup and operating procedures contained throughout this guide.

Purchasing Information

- Date of Purchase ______
- Dealer Purchased From ______

Loading the Batteries

Insert batteries as marked.

Battery replacement caution

- · Do not mix old and new batteries.
- Do not mix alkaline with manganese batteries.

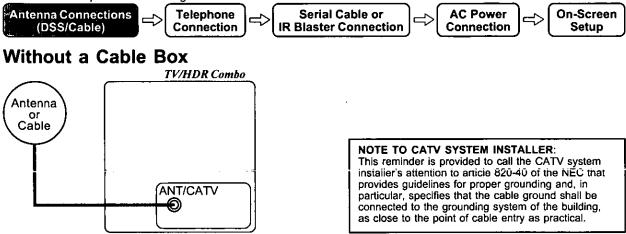
Connections

If you receive TV signals from multiple sources, such as cable and DSS, you should connect the TV/HDR Combo to all. That way you'll have easy access to all the channels from all your sources.

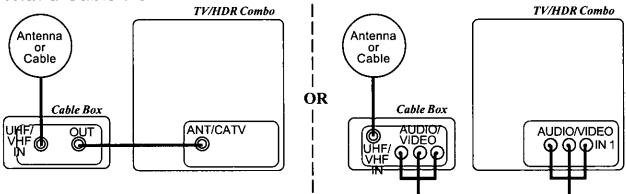
Before you connect any device to the TV/HDR Combo:

Be sure both the TV/HDR Combo and any connected devices are turned off and unplugged. Put the TV/HDR Combo in a place where there is a direct path to the user of the remote control.

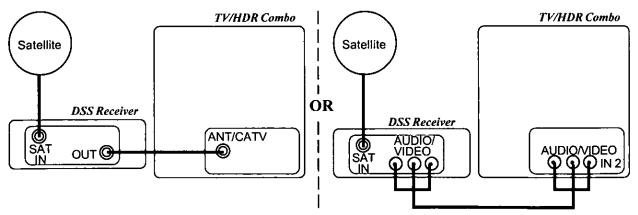
You should complete the following to use the TV/HDR Combo.



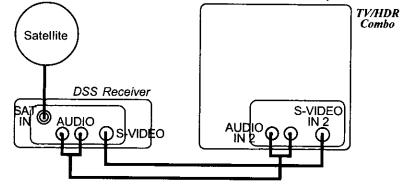
With a Cable Box



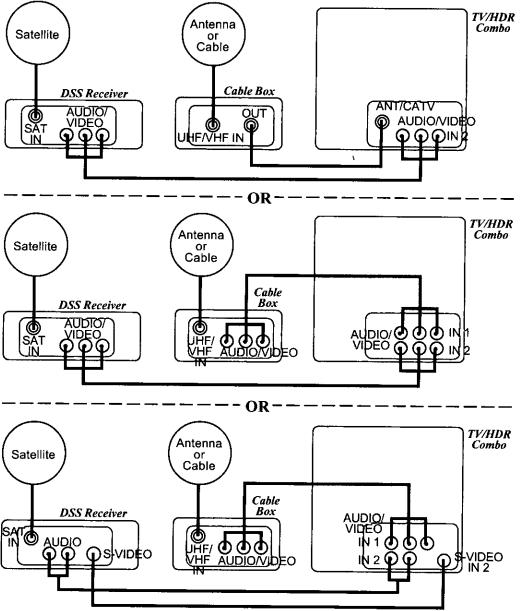
With a DSS Receiver



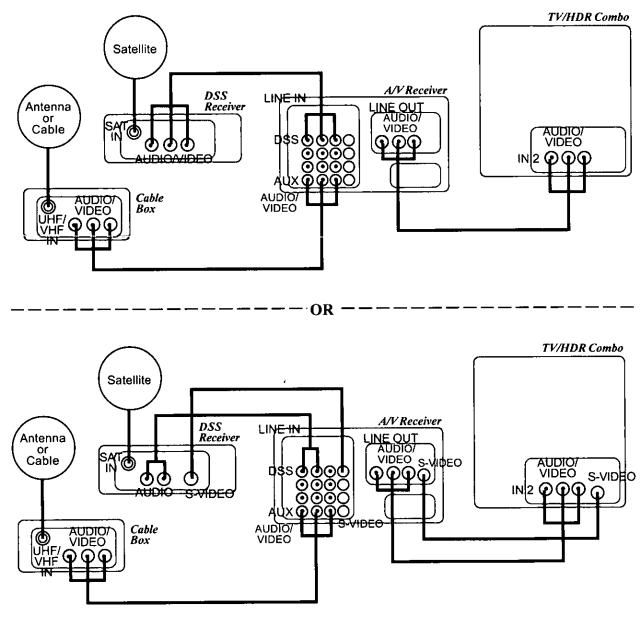
With a DSS Receiver (Using S-Video)



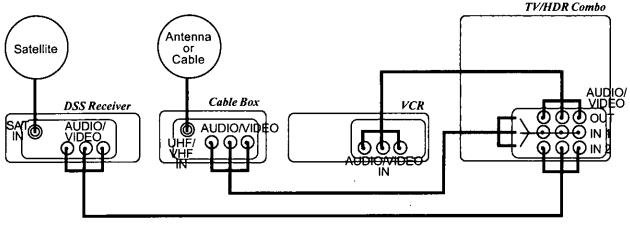
With a Cable Box and DSS Receiver



With a Cable Box, DSS Receiver and A/V Receiver



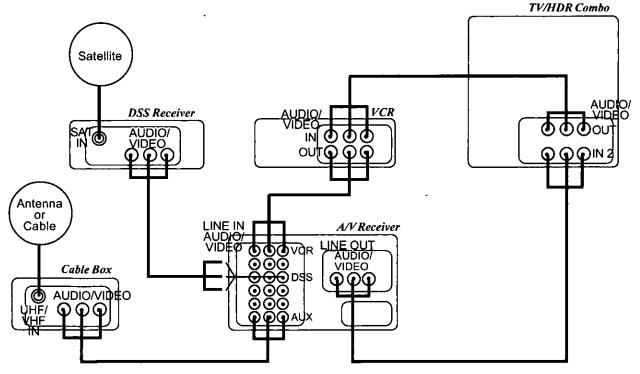
With a Cable Box, DSS Receiver, and VCR



NOTES

- If your DSS receiver has the S-VIDEO OUT jack, use an S-Video cable (not supplied) instead of using the Video cable. (See the S-Video connection on page 9.)
- If your cable box does not have A/V OUT jacks, connect an RF cable from the OUT jack to the ANT/CATV jack on the TV/HDR Combo.
- · The VCR connection is only for saving a recorded program to a videotape. See page 37 for details.

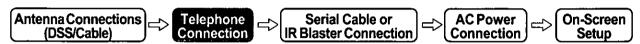
With a Cable Box, DSS Receiver, A/V Receiver, and VCR



NOTES

- If your cable box does not have A/V OUT jacks, connect an RF cable from the OUT jack to the ANT/CATV jack on the TV/HDR Combo.
- · If your DSS receiver has the S-VIDEO OUT jack, see the S-Video connection on page 10.

Connections (continued)

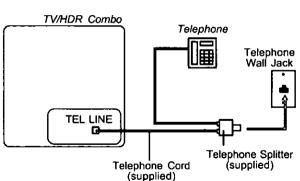


Connecting the telephone line

The TV/HDR Combo must be connected to a telephone jack to communicate with the ReplayTV Service [™]. The telephone connection is used nightly by the TV/HDR Combo to receive updates to the Channel Guide. The phone connection is also used to update the TV/HDR Combo with new features, as they become available.

NOTES

- Each night, a phone call is made to the ReplayTV Service to update Channel Guide listings for your area. To receive the latest information from the ReplayTV Service, make sure the telephone cable is always connected to the TV/HDR Combo.
- The TV/HDR Combo cannot be used on coin services provided by the telephone company, cannot be compatible with party lines or pulse telephones. Contact your local telephone company with regard to these matters. If you have an older, 4-prong telephone wall jack, you will need a modular 4-prong adapter.



- If there is no phone jack conveniently located near where you have placed the TV/HDR Combo, consider using a wireless phone jack that operates at the highest modern speed available (at least 33.6K BPS).
- There is no monthly fee for Channel Guide service. Local access numbers are available in most areas. Since the TV/HDR Combo maintains seven days worth of Channel Guide information, you can connect to ReplayTV Service once a week by disconnecting the telephone line, and connecting to the service once a week to update.



Attaching DSS Receiver and Cable Box Controllers

If you connect a DSS receiver or a cable box to the TV/HDR Combo, you will need to attach a controller cable so the TV/HDR Combo can change the channels on these devices. The controller, either a serial cable or an IR blaster cable, acts as a remote for these devices. When you press CHANNEL \blacktriangle/ ∇ on the remote control, the channel is changed on your other device.

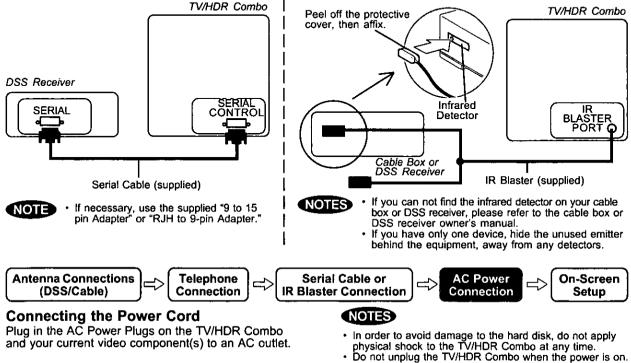
Connecting a Serial Cable

the supplied serial cable.

If your DSS receiver has a serial connector, use

Connecting and Affixing the IR Blaster

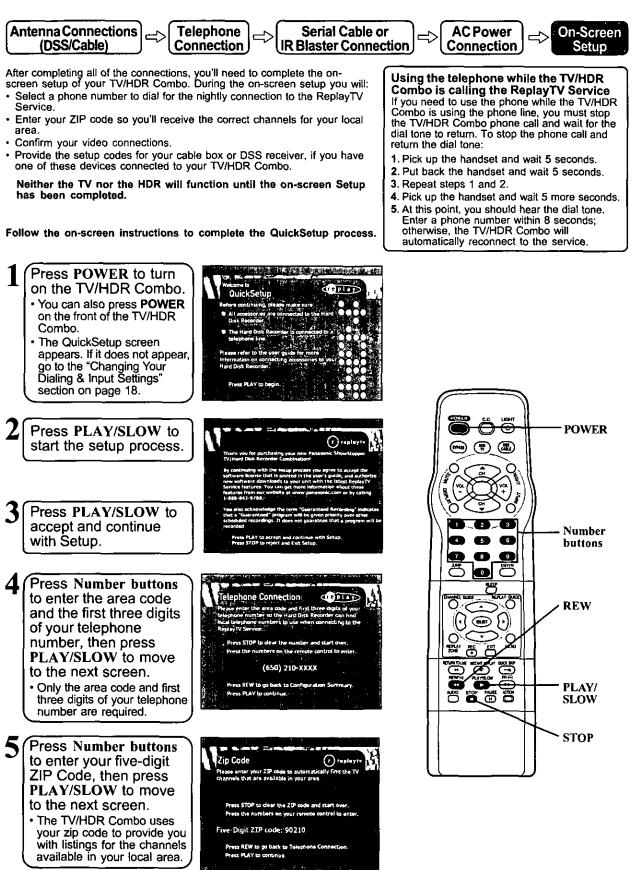
If your cable box or DSS receiver does **not** have a serial connector, use the supplied IR blaster.



After turning the TV/HDR Combo when the power is on.
 After turning the power off, please wait one minute before unplugging the TV/HDR Combo.

On-Screen Setup

Important If a remote control button does not work when pressed, press HDR/TV button on the remote and try the button again.



On-Screen Setup (continued)

Press Number buttons to enter the dialing prefix, then press PLAY/SLOW to move to the next screen. • Press DISPLAY for *; press ENTER for #; and press PAUSE for ...

 Some telephone systems must dial a special number prior to placing a phone call, to disable call waiting for example. If your phone system requires a special number, enter it on this screen.

The TV/HDR Combo calls the ReplayTV Service to retrieve local telephone numbers and TV channels.

- This connection to the ReplayTV Service lasts about five minutes and also provides the TV/HDR Combo with TV channel information for your local area.
- The internal clock and time zone are set during this connection.

If the connection failed,

Press PLAY/SLOW to try connecting again, Or, press REW repeatedly to return to the previous screen and confirm each setting item. Then, re-enter the correct information.



• You can change the number later by pressing MENU and selecting "Setup" and then "Change Dialing & Input Settings." (Refer to page 18.)

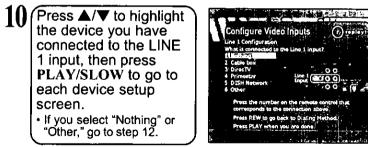
Press ▲/▼ to highlight the dialing method, then press PLAY/SLOW to move to the next screen.

 Choose the dialing method for your area. For example, a direct call, or if you need to dial a prefix and/or area code.

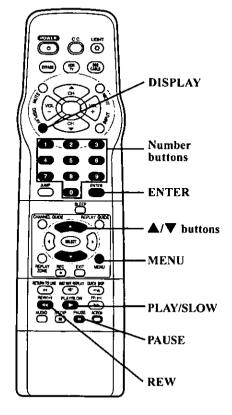


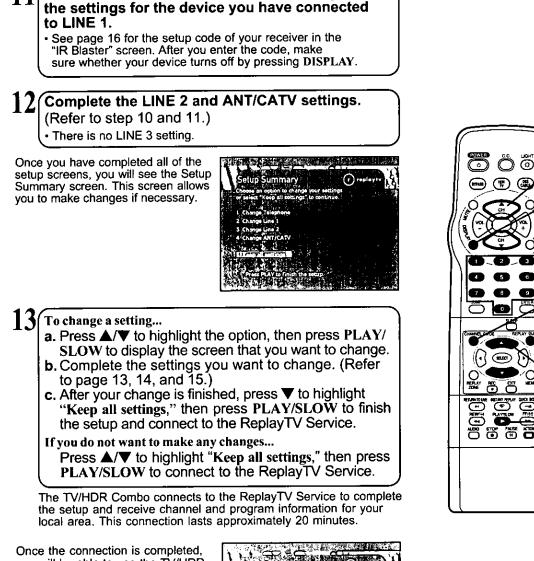
For the configuration settings,

Make sure your cable box or DSS receiver power is on. Find the setup code for your cable box or DSS receiver on page 16.



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Getting Local Phor Ploase wait while ReplayTV Service	e Numbers and T the TV/HDR Corol	the connects to the	



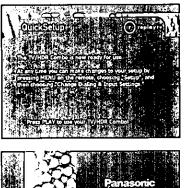


(Follow the on-screen instructions to complete

you will be able to use the TV/HDR Combo.

14 Press PLAY/SLOW to begin using the TV/ HDR Combo.

- To select shows to watch from an on-screen guide, press CHANNEL GUIDE.
- The Replay Guide is an onscreen collection of all the shows you record. Initially, the only recorded show that appears in the Replay Guide is the Welcome Video. Press **REPLAY GUIDE.**







The internal TV/HDR Combo clock is set during the initial connection to the ReplayTV Service to ensure that the shows you choose to record are recorded completely.

CHANNEL

DISPLAY

Number buttons

CHANNEL GUIDE

REPLAY

GUIDE

▲/▼

buttons

PLAY/

SLOW

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6

On-Screen Setup (continued)

Setup Codes for Cable Boxes

ABC 0003, 0008, 0014
Allegro 0153, 0315
Archer 0153, 0797
Bell & Howell 0014
Century 0153
Citizen 0153, 0315
Comtronics
Contec 0019
Eastern 0002
Emerson 0797
Everquest 0015, 0040
Focus
Garrard 0153
Gemini 0015
General Instrument
GoldStar 0144, 0040
Goodmind 0797
Hamlin, 0020, 0259, 0009, 0034
Hitachi 0011
Hytex 0007
-
Jasco 0015, 0153, 0315

Bombrondt 0011
Rembrandt 0011
Runco 0000
SL Marx 0040
Samsung 0144, 0040
Scientific Atlanta 0008
Signal 0015, 0040
Signature 0011
Sprucer 0021
Starcom 0003, 0015
Stargate 0015, 0040, 0797
Starquest 0015
TV86 0063
Teleview 0040
Tocom 0012, 0013
Toshiba 0000
Tusa 0015
Unika 0153
United Artists 0007
Universal
Viewstar 0063
Zenith 0008, 0000, 0015, 0525
Zentek 0400

Setup Codes for DSS Receivers

AlphaStar	0772
Echostar	0775
Expressvu	0775
General Instrument	0627
HTS	0775
Hitachi	
Hughes Network Systems	0749

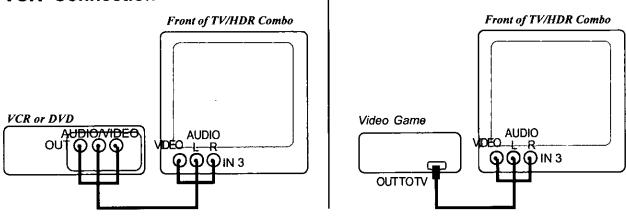
JVC	0775
Jerrold	0627, 0361
Magnavox	0724, 0722
Memorex	0724
Next Level	0869
Panasonic	0701
Philips	0724, 0722
Primestar	0627, 0361

Proscan	0566
RCA	0566, 0143, 0855
Radio Shack	0566, 0869
Sony	
Star Choice	
Toshiba	0790
Uniden	0724, 0722
Zenith	

Other Devices Connections

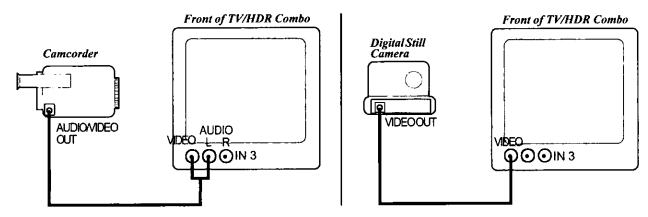
Connections for Watching Playback from Other Devices

VCR Connection



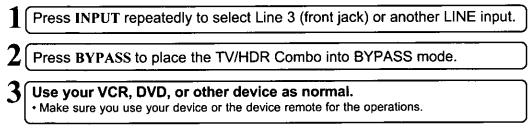
Video Game Connection

Camcorder/Digital Still Camera Connection



Entering BYPASS Mode

The TV/HDR Combo must be placed in BYPASS mode during operation of other devices. The front jacks (Line 3) are especially convenient for connecting VCRs, DVDs, Video Game Systems, Camcorders, Digital Video Cameras, or Digital Still Cameras.



Important

If a remote control button does not work when pressed, press HDR/TV button on the remote and try the button again.

NOTE

 If you try to watch in HDR mode, the video signal may not be displayed properly. The TV/HDR Combo must be placed in BYPASS mode while using LINE INPUTS.

Before Operating

Watching the Welcome Video

An instructional video is waiting for you to play directly from the Replay Guide. To watch the video:

- 1. Once you complete the on-screen setup, press **REPLAY GUIDE** on the remote.
- 2. Using the arrow buttons on the remote, highlight the video titled "Welcome to Panasonic SHOWSTOPPER."
- 3. Press PLAY/SLOW on the remote.

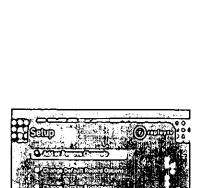
You may use all of the television control features, such as pause and rewind, while watching this video. All of the features covered in the instructional video are also referenced in this guide.

After you watch the video and are comfortable with the TV/HDR Combo's features, you may want to save the video onto a videotape and delete the video from the Replay Guide. This will make more room for recording shows. See "Saving Shows to Videotape" on page 37 for instructions on connecting the TV/HDR Combo to a VCR.

Changing Your Dialing & Input Settings

If you move, add another telephone service, change video equipment, or do something else that may require updating the information you provided during on-screen setup, you may change the information at any time.

- 1. Press MENU to display the Main Menu.
- 2. Press ▲/▼/◀/► to highlight "Setup," then press SELECT to display the Setup screen.
- 3. Press ▲/▼ to highlight "Change Dialing & Input Settings," then press SELECT to display the Setup Summary screen.
- 4. Press ▲/▼ to highlight the option, then press PLAY/SLOW to display the screen that you want to change.
- 5. Complete the settings you want to change. (Refer to page 13, 14, and 15.)
- 6. After your change is finished, press ▼ to highlight "Keep all settings," then press PLAY/SLOW to finish the setup and connect to the ReplayTV Service.
 - If you don't need to connect to the ReplayTV Service now, press STOP to cancel the connection. Then press EXIT twice to exit. The TV/HDR Combo will connect to the ReplayTV Service at night.
- 7. After the connection is completed, press PLAY/SLOW to begin using the TV/HDR Combo.



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	Weissen in Parame	E SHOWSTOPPER	
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Feature Updates

Occasionally, new features are added to the TV/HDR Combo. These features are updated directly over the telephone line connected to the TV/HDR Combo. As features change, you may encounter features that perform differently from those in this guide. In general, follow the on-screen instructions if a feature is not documented in this guide.

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Using the Main Menu

Use the Main Menu to use some of the TV/HDR Combo's main features and to change information you provided during the on-screen setup.

Press MENU on the remote or the TV/HDR Combo to display the Main Menu.



Replay Zones:

You can find the best of what's on TV, organized in easy-to-use categories, in ReplayTV's Replay Zones. Replay Zones are constantly being updated with fresh and exciting content, tracking the hottest shows and stars so you don't have to.

Replay Guide:

Think of the Replay Guide as your personal television station that only broadcasts the shows you want to watch. Every show that your TV/HDR Combo records can be found in the Replay Guide. From the Replay Guide, you can schedule, play, and delete recorded programs.

Channel Guide:

The Channel Guide is the interactive on-screen program guide. The Channel Guide lists seven days of up-to-date listings for all the TV channels you receive.

Messages:

The ReplayTV Service will send you messages about important news, and the latest features and enhancements as soon as they are made available. You'll receive a welcome message after you complete the on-screen setup of your TV/HDR Combo. The Replay Guide will notify you when you have received an important message.

Find Shows:

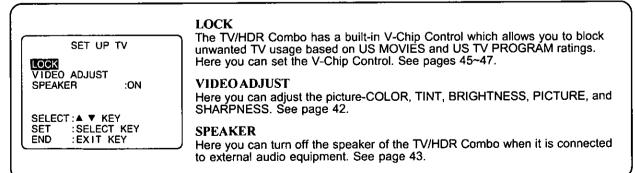
Use Find Shows to quickly locate shows that you'd like to record using keywords. After the TV/HDR Combo finishes searching for shows that match the keyword(s) you provided, you can schedule a show for recording or create a Themebased channel based on your search results.

Setup:

Access the Setup menu to customize the TV/HDR Combo in the following ways:

- Add or Remove Channels: Add or remove channels from the Channel Guide. This is handy for removing channels you don't subscribe to, or channels that are inappropriate for particular audiences.
- Change Default Record Options: Set the recording options that the TV/HDR Combo uses to record shows — including Record Quality, and number of saved episodes.
- Change Display Brightness: You can use this feature to adjust the brightness of the HDR graphic screens. This setting will only effect HDR graphic image.
- Change Dialing & Input Settings: See "Changing Your Dialing and Input Settings" section on page 18.

Press ACTION on the remote to display the TV Main Menu.



Controlling Live Television

Be sure all connections have been made and the on-screen setup has been completed.

Viewing Live Television

Press POWER to turn on the TV/HDR Combo. • If necessary, press HDR TV before pressing POWER.

Press CHANNEL GUIDE to display the Channel Guide.

• You can also select "Channel Guide" from the Main Menu.

Press ▲/▼/◀/▶ to highlight a current show (light blue listing) in the Channel Guide, then press SELECT.

Browse Preset Channels

Press CHANNEL \blacktriangle or CHANNEL \blacktriangledown .

(Note: If the TV/HDR Combo is currently recording a show, you'll need to stop the recording by pressing STOP on the remote before browsing channels.)

Select a Channel by Number Button(s)

Press Number Buttons to select a channel, then press ENTER. (If you don't press ENTER, it changes automatically after a few seconds.)

Switch Quickly between Two Channels

Press JUMP to switch to the last show you were watching, and JUMP again to switch back to the first show. You can also jump between two recorded shows, and between a live show and a recorded show.

Get Information on a Show You're Viewing

Press DISPLAY to get program information—a synopsis of the current program you're watching, and information about the length of the show. Press DISPLAY again or EXIT to dismiss the information. Display information will automatically fade away after 15 seconds.

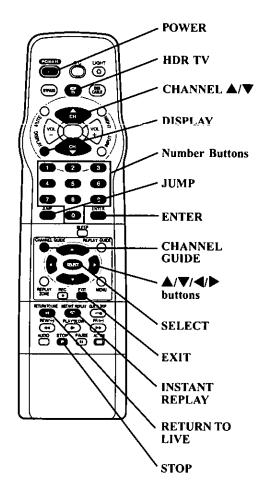
Using Instant Replay

The Instant Replay feature lets you skip back seven seconds during a live or recorded show. It's the perfect way to ensure you don't miss a single word of dialogue in your favorite movie, or any of the important action in a game.

Press INSTANT REPLAY while you're watching a live broadcast.

- You'll instantly skip back seven seconds and begin watching again from there.
- You can repeatedly press INSTANT REPLAY and move back in seven second increments.

Press RETURN TO LIVE when you want to go back to the live broadcast.





 Whenever you start watching a live show, the TV/HDR Combo automatically starts recording the show, and the recording is temporarily preserved in the TV/HDR Combo's recording space. Even if you delay viewing by using the pause and rewind features, recording continues. Recording stops if you change to a live or pre-recorded show.

Pausing Live Television and Recorded Shows

The pause feature lets you attend to interruptions without missing a moment of your favorite television shows. You can pause both recorded shows and live television.

1

Press PAUSE while you're watching live television or a recorded show.

- An on-screen message notifies you how much pause time remains.
- Pres EXIT to dismiss the Pause on-screen message.

When you return from your interruption, press PLAY/SLOW to resume watching from where you left off.

- You can also press RETURN TO LIVE if you want to catch up with the live broadcast.
- Press DISPLAY to see how far you are behind the live show.

Using Stop

Stop works very much like Pause. You can use stop while watching a live television broadcast or when watching a recorded show. Pressing STOP displays a STOP screen, rather than "freezing" the image of the show you're watching. Even though you press STOP, you can still return to where you left off in the live broadcast or recorded show by pressing PLAY/SLOW, or press RETURN TO LIVE to catch up with a live broadcast.

NOTE

 When you pause a live broadcast, it continues to record on the hard disk.

Using Rewind and Fast Forward

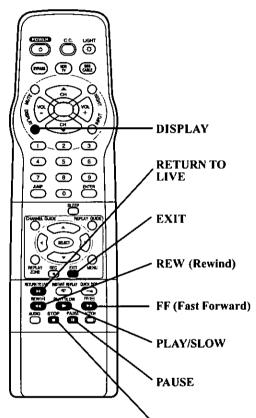
The TV/HDR Combo starts recording live television when you begin watching a show. If you're watching a live show, you can rewind to the point where you first started watching. Then, turn around and quickly move ahead using Fast Forward.

Press REW (Rewind) after you have watched a show for a while. • Press REW multiple times to select one of five rewind speeds (1x rewind displays the rewind symbol on the

- screen, followed by 2x, 4x, 16x, and 20x rewind).
- The show will begin playing when you reach the point where you started watching the show.
- Rewinding stops when you press PLAY, STOP, or FF.

Press FF (Fast Forward) to go forward in the show.

- Press FF multiple times to select one of five fast forward speeds (1x fast forward, displays the fast forward symbol on the screen, followed by 2x, 4x, 16x, and 20x fast forward.
- The Live symbol will display on your screen when you have caught up with live programming.



Controlling Live Television (continued)

Using Slow Motion

You can play recorded shows and live television in slow motion with a couple of remote control button presses.



Press PLAY/SLOW while a recorded show or live broadcast is playing.

 The slow motion symbol in the lower right of the screen indicates that the show is now playing in slow motion.

Press FF (Fast Forward) to increase the speed of slow motion.

- Press FF (Fast Forward) twice or three times to speed up slow motion.
- Press REW to decrease the slow motion speed while in 2x or 3x slow motion.

Press PLAY/SLOW to return to normal speed or press RETURN TO LIVE to catch up with a live broadcast.

Using Frame Advance

Frame advance lets you watch a recorded show or live broadcast a single frame at a time. This is a great feature to use with fast-moving scenes, when you want to slow things down so you can see every second of the action.

Press PAUSE while a recorded show or live broadcast is playing.

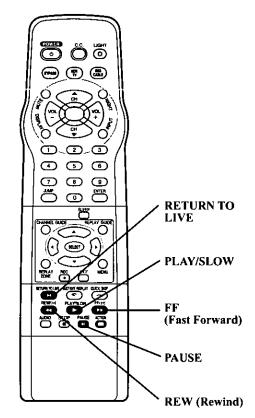
• The PAUSE symbol displays on the screen and the show remains on screen in a paused mode.

Press FF (Fast Forward) while a show is paused to advance a single frame.

- Each time you press FF the show moves forward by a single frame.
- The show then pauses until you press FF again, or another button to cancel the frame advance feature.

Repeatedly press FF (Fast Forward) to move ahead frame by frame.

Press PLAY/SLOW to watch the show at normal speed or press RETURN TO LIVE to catch up with a live broadcast.



Using QuickSkipTM (Skipping unwanted programming)

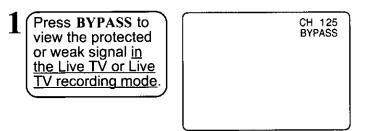
Use QUICKSKIP to skip past undesired scenes. QuickSkip can be used on live programming only if playback of the show has been delayed through the use of PAUSE, REWIND, or STOP.

Press QUICKSKIP while you're watching a delayed live show or a recorded show.

- · You will instantly skip ahead 30 seconds in the show.
- Press it repeatedly to skip in 30-second segments. Use the INSTANT REPLAY button to quickly correct for overshoot.

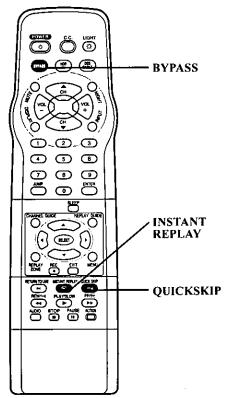
Viewing Copy Protected Programming or Weak Signal

Shows broadcast using Macrovision or CGMS-A (Copy Generation Management System-Analog) copy protected signals are not viewable in Live TV mode, nor can they be recorded. Copy protected shows can only be viewed in BYPASS mode.



NOTES

- In BYPASS mode, PLAY/SLOW, STOP, FF, REW, REC, PAUSE, INSTANT REPLAY, QUICK SKIP, and RETURN TO LIVE are not available.
- When in BYPASS mode, scheduled recordings will automatically record in HDR mode.
- Unauthorized copying of copy protected material constitutes copyright infringement.



Recording Shows

The Channel Guide is an interactive, on-screen program guide that lists seven days of television information for all of the channels you currently receive. The Channel Guide makes recording your favorite shows easy. You can record while you are watching your recorded show.

While the TV/HDR Combo does not need to be on for recording, cable boxes and DSS receivers must remain on.

Selecting a Show

You can also go back 24 hours within the Channel Guide to see what programs have already aired. If you missed a show, you can select it in the Channel Guide and use the TV/HDR Combo to search for episodes that have not yet aired. You can then set the TV/HDR Combo to record a future airing of the show. See "Finding All Episodes of a Show" on page 32.

- Press CHANNEL GUIDE to display the Channel Guide.
- · You can also select "Channel Guide" from the Main Menu.
- Press ▲/▼/◀/▶ to move around the guide.
 Press ◀ to move back in the Channel Guide to see programs that have already aired. Then, search for episodes of a show that are upcoming.
 - As you move around, notice that the program information changes to the show you have selected.

To jump ahead 12 hours, press FF.

To jump back 12 hours, press REW.

To move up and down one screen at a time, press CHANNEL $\blacktriangle/ \bigtriangledown$.

To watch a channel in the Channel Guide, select a show that's on now and press SELECT.

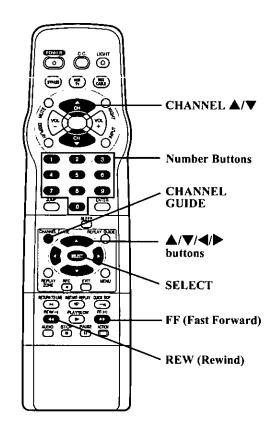
To go to a channel, press Number Buttons, then press SELECT. • For example, press 9 - 0, then press SELECT to go to channel 90.

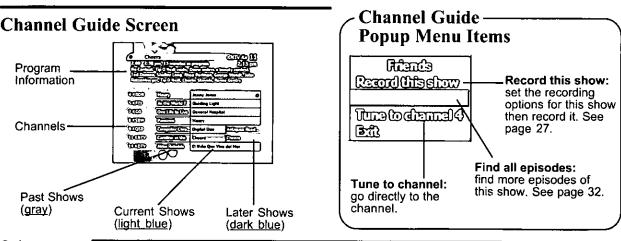
NOTE

 Channel Guide information is sent to the TV/HDR Combo from the ReplayTV Service each night. As long as you keep an active phone line plugged into the TV/HDR Combo, you'll always have seven days of the most up-to-date listings available.

From the Channel Guide you can:

- scroll through listings for shows you want to watch in the next seven days
- select shows to watch or record
- · tune to a specific channel





For assistance, call 1-888-843-9788 or send e-mail to Consumerproducts@Panasonic.com

Recording a Show That Is Currently Being Viewed

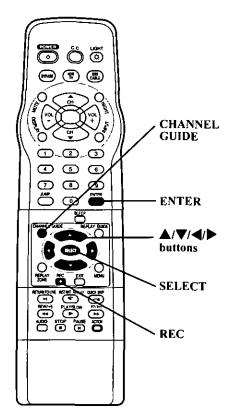
Light blue listings indicate shows that are on now.

- Press CHANNEL GUIDE to display the Channel Guide. • You can also select "Channel Guide" from the Main Menu.
- Press $A/V/\langle A \rangle$ to highlight a current show (light blue listing) in the Channel Guide, then press SELECT.
 - The TV/HDR Combo will tune directly to the channel you've selected unless a show is recording on another channel.
 After highlighting a show, press ENTER to display the
 - Channel Guide popup menu.
- Press REC to record the selected show. • The Record Options screen will display.

Press REC a second time to accept the current recording settings.

Adjust the settings on the Record Options screen, then press REC to accept the settings. • See "Setting the Recording Options" on page 27 for more

information on the Record Options screen.



Recording a Single Upcoming Show

Follow these instructions if you want to record a single show using the current recording settings. To change the recording settings, see "Setting the Recording Options" on page 27.

Press CHANNEL GUIDE to display the Channel Guide.

You can also select "Channel Guide" from the Main Menu.

- Press ▲/▼/◀/▶ to highlight an upcoming show (dark blue listing) in the Channel Guide, then press REC.
 - A solid red dot is placed next to the show you selected. This means that just this one show, or episode, will be recorded. To view the show after it has been recorded, go to the Replay Guide. See "Watching a Show" on page 36.
 - If you want to change recording options of a show before it begins recording, select the show in the Channel Guide and select "Change record options" from the popup menu.

NOTE

• To cancel the recording, see "Cancelling a Scheduled Recording" on page 26.

– Extending Recording Time -

If you want to record a show that may extend beyond its scheduled length, record the show immediately following the event. This is handy when recording a sporting event, which may go into extra innings or overtime.

Indication of Red Dots —

In the Channel Guide, solid red dots indicate guaranteed recording. Hollow dots indicate non-guaranteed recording.



Guaranteed recording

Non-guaranteed recording

One dot appears on the Channel Guide listing if you're recording only one episode; two dots appear if you're recording all episodes.

 See "Managing Recording Space" on pages 38 and 39 for more information on guaranteed and non-guaranteed recordings.

Recording Shows (continued)

Recording Multiple Episodes of One Show

If you have a favorite show that airs once a week, or daily, you can set the TV/HDR Combo to record every episode. This is called a Show-based Replay channel. See "Show-based Replay Channels" and "Theme-based Replay Channels" on page 33.

Follow these instructions to record each episode of a show using the current recording settings. To change the recording settings, see "Setting the Recording Options" on page 27.

- Press CHANNEL GUIDE to display the Channel Guide.
 - · You can also select "Channel Guide" from the Main Menu.

Press ▲/▼/◀/▶ to highlight an upcoming show (dark blue) you wish to record in the Channel Guide, then press REC twice.

- Two solid red dots are placed next to the show you selected. This means that the TV/HDR Combo will continuously record the most current episode of this show.
- To view an episode of the show after it has been recorded, go to the Replay Guide. See "Watching a Show" on page 36.

Cancelling a Scheduled Recording

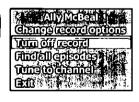
You can cancel a recording in the Channel Guide at any time before the show starts.

- Press CHANNEL GUIDE to display the Channel Guide.
 - · You can also select "Channel Guide" from the Main Menu.

Press A/V/A/P to highlight the show you want to cancel in the Channel Guide.

 You'll know it's set to record because it has at least one red dot next to the show.

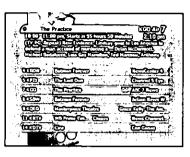
Press SELECT.
• The popup menu displays.

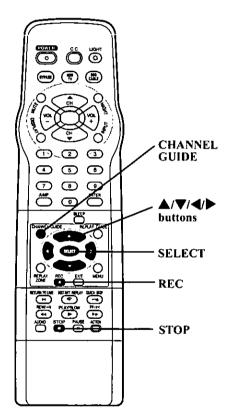


Press ▲/▼ to select "Turn off record," then press SELECT. • The red dot disappears.



While the show is recording, quickly press STOP twice.





To Cancel a Recording in Progress from the Channel Guide...

You can also cancel a recording in the Channel Guide by selecting the show and pressing **REC** once or twice.

· The red dots are removed.

Setting the Recording Options

There may be times when you want to adjust the record options for the show you want to record. For example, you might want to record movies or sporting events at higher quality than TV shows.

Follow these instructions to adjust the recording options of a show before you record it.

- Press CHANNEL GUIDE to display the Channel Guide. • You can also select "Channel Guide" from the Main Menu.
- Press $A/\nabla/\langle/\rangle$ to highlight an upcoming show (dark blue) that you would like to record, then press SELECT.
- 3 Press ▲/▼ to highlight "Record this show," then press SELECT.

 The Record Options screen displays.

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- Press ▲/▼ to highlight an option you want to change. (See "Record Options Settings" below.)
- Press SELECT or
 Press SE
 - See below for more information on the Record Options.
- **6** Press \blacktriangle/ \forall to highlight "Done," then press SELECT to apply your changes.
 - You can also press REC to apply your changes.
 - The show will be recorded based on the settings you selected.

Record Options Settings

Recording Level

"High" level offers the best picture but takes up more space. "Extended" offers the most recording time but sacrifices picture quality. "Medium" offers a balance of the two. Notice that the recording space (hours and minutes available) changes as you adjust the record level. The higher the recording level, the less space available for other shows. To conserve space, use the High setting sparingly—for recording fast-action shows where quality is vital.

Guaranteed

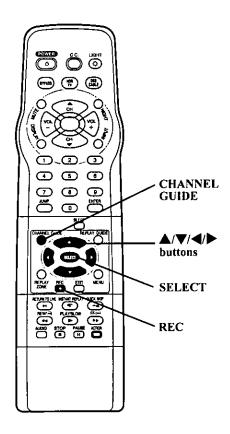
Guaranteed means space is reserved for this show. Non-guaranteed means the show will be recorded if there is space available (after space is reserved for Show-based Replay channels). See "Guaranteed and Non-guaranteed Recording" on page 38.

Record All Episodes

Choices are Yes and No. Selecting Yes will record all episodes of this show-daily or weekly. Selecting no will result in only a single episode being recorded.

Keep

If you select to record all episodes, here you can tell the TV/HDR Combo how many you want to keep (up to 7) before the most current episode replaces the oldest episode. If you are setting up a theme-based recording, you can select the recording time between 1/2 hour and 10 hours.

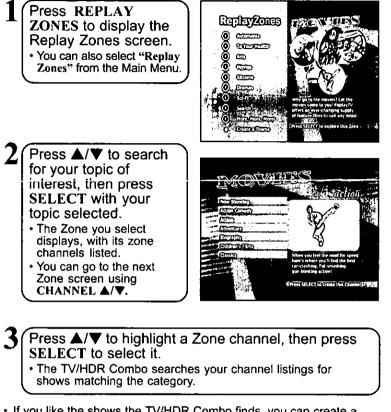




Recording Shows (continued)

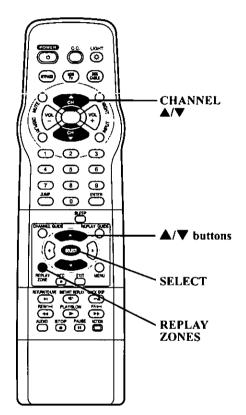
Recording From Show Categories

Visit Replay Zones to create channels based on topical television categories created by the ReplayTV Service. Zones are organized in topics such as romantic comedies, sitcoms, action-adventure, cartoons, and talk shows. Replay Zones change regularly and make it easy to record the best of what's on TV.



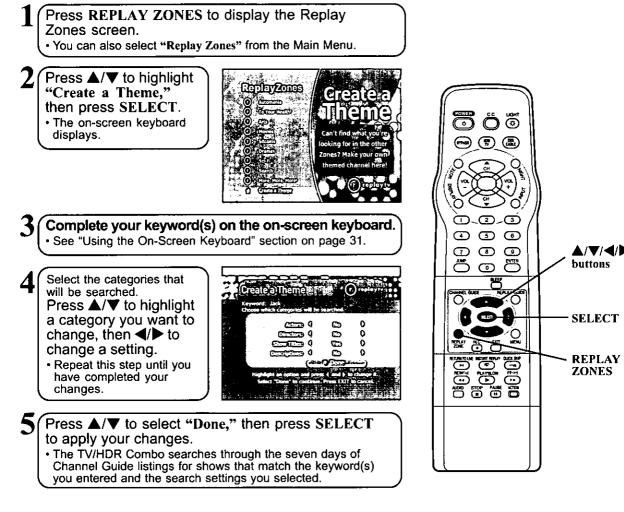
 If you like the shows the TV/HDR Combo finds, you can create a Zone channel which will be stored in the Replay Guide. This means that whenever a show in this Zone category airs, the TV/HDR Combo will record it for you. You can also select to record individual shows from the list.

To Record *One* of the Shows... To Create a Show-based Replay Channel... To Cancel Recording of a Show...



Recording Shows Based On a Theme You Choose

The TV/HDR Combo lets you record shows based on any theme you choose. Themes can be topics such as golf, news, pets, or even your favorite actor or director. For more information on themes, see "Show-based Replay Channels" and "Theme-based Replay Channels" on page 33.

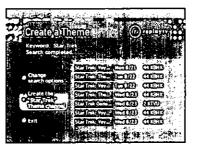


To re-enter your keyword and start over...

- a. Press ▲/▼/◀/▶ to highlight "Change search options," then press SELECT.
- **b**. Re-enter your keyword. See the "Using the On-Screen Keyboard" section on page 31 for more information.
- C. Complete step 4 and 5 above.

To create a Theme-based Replay channel for your keyword,

- a. Press ▲/▼/◀/▶ to highlight "Create the 'keyword' Theme channel," then press SELECT.
- **b**. See "Setting the Recording Options" steps 4, 5, and 6 on page 27 to adjust the recording settings.



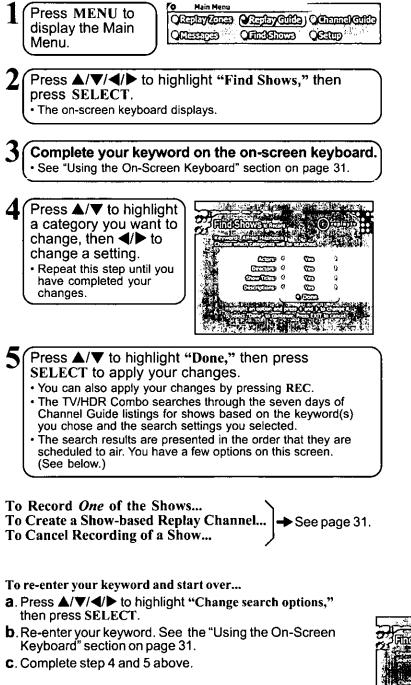
NOTES

- The TV/HDR Combo searches only for an entire phrase, not for the separate words in a phrase.
- Use multiple-word themes if they help avoid confusion. For example, use "Harrison Ford" rather than "Ford" if you want movies with the actor but not shows about cars.

Recording Shows (continued)

Finding Shows

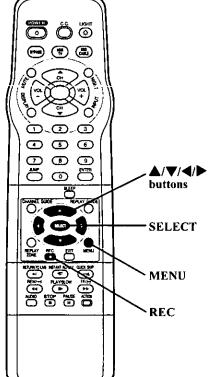
To quickly find the exact show you're looking for, use Find Shows. This is a great feature if there's a particular show you're looking for but don't know what time or channel it's on.



To create a Theme-based Replay channel for your keyword...

- a. Press ▲/▼/◀/▶ to highlight "Create the 'keyword' Theme channel," then press SELECT.
- **b**. See "Setting the Recording Options" steps 4, 5, and 6 on page 27 to adjust the recording settings.





<u>Important</u> If a remote control button does not work when pressed, press HDR/TV button on the remote and try the button again.

-To Record *One* of the Shows...

- **1**. Press \blacktriangle/ ∇ to select the show you want to record.
- 2. Press REC to record the show.
 One red dot is placed next to the episode you select.

If you want to adjust the record options ...

- a. Press SELECT to display the popup menu.
- **b**. Press $\blacktriangle/\blacksquare$ to select "Record this show."
- c. See "Setting the Recording Options" steps 4, 5, and 6 on page 27 to adjust the recording settings.
 - This single-record show will be stored in the Replay Guide.

-To Create a Show-based Replay Channel... –

- **1**. Press \blacktriangle/∇ to select the show you want to record.
- 2. Press REC twice to record the show.
 - Two red dots are placed next to the episode you select. Or

If you want to adjust the record options ...

Repeat steps a, b, and c above.

This Show-based channel will be stored in the Replay Guide.

-To Cancel the Recording of a Show...

- 1. Press ▲/▼ to select the show you want to cancel, then press SELECT.
- 2. Press ▲/▼ to select "Turn off record," then press SELECT.
 The red dot disappears.

NOTE

 If there's enough recording space, you can select to record more than one of the shows on this screen. Or, set one show as a guaranteed record and another as non-guaranteed. The non-guaranteed show will be recorded if space allows.

Using the On-Screen Keyboard-

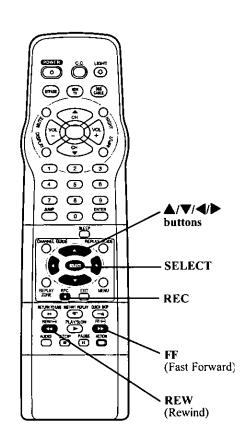
The keyboard appears on-screen when you select "Find Shows" from the Main Menu and when you select to "Create a Theme" in Replay Zones.

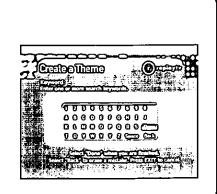
- 1. Press ▲/▼/◀/▶ to highlight the letter you would like to type, then press SELECT to enter.
- 2. Repeat step 1 until you have typed the complete keyword.

If you make a mistake, press REW or press $A/V/\langle i > to$ highlight "Back," then press SELECT.

If you want to add a space between words, press FF or press A/V/A to highlight "Space," then press SELECT.

3. Press ▲/▼/◀/▶ to highlight "Done," then press SELECT when you have finished entering your keyword.



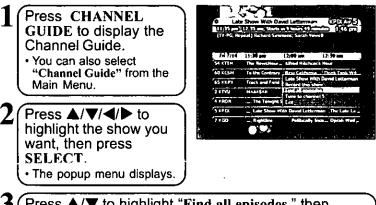


Recording Shows (continued)

Finding All Episodes of a Show

You can "Find all episodes" of a program for Show-based recordings in both the Replay Guide and Channel Guide. "Find all episodes" finds episodes that match the show's title exactly. It's a great feature for finding program information for individual episodes or selecting specific upcoming episodes to record.

All Programs Listed in the Channel Guide



S(Press \blacktriangle / ∇ to highlight "Find all episodes," then press SELECT.

Show-Based Programs in the Replay Guide

Press REPLAY GUIDE to display the Replay Guide. • You can also select "Replay Guide" from the Main Menu.

- Press ▲/▼/◀/▶ to highlight the show you want, then press SELECT.
 The popup menu displays.
- Press \blacktriangle/V to highlight "Find all episodes," then press SELECT.

Finding Matching Shows

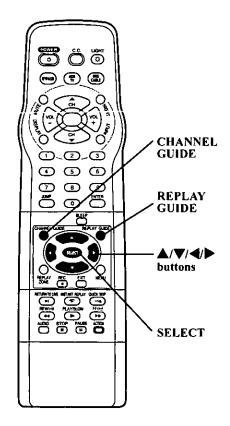
You can "Find matching shows" for Theme- and Zone-based channels in the Replay Guide. Find matching shows finds shows that match the keyword criteria you select on the categories screen. The keyword "basebali" could display an upcoming basebali game as well as the movie "The Bad News Bears."

Theme- and Zone-Based Programs in the Replay Guide

Press REPLAY GUIDE to display the Replay Guide. • You can also select "Replay Guide" from the Main Menu.

Press ▲/▼/◀/▶ to highlight the Theme- or Zonebased channel you want, then press SELECT. • The popup menu displays.

B (Press \blacktriangle / \triangledown to highlight "Find matching shows," then press SELECT.



Using Find All Episodes & Find Matching Shows

After you select "Find all episodes" or "Find matching shows," ReplayTV will search through seven days of Channel Guide listings for every episode of the program and list the results in the order that they are scheduled to air. You can then select from the following options:

To Create a Theme-based Replay Channel...

- **a**. Press $\blacktriangle/\bigtriangledown/\checkmark/\diamondsuit$ to select "Create the '*keyword*' Theme channel," then press SELECT.
- **b**.See "Setting the Recording Options" steps 4, 5, and 6 on page 27 to adjust the recording settings.

To Record *One* of the Shows... To Create a Show-based Replay Channel... To Cancel Recording of a Show...

NOT

 You can record multiple shows listed by "Find all episodes" or "Find matching shows."

Show-based Replay Channels -

You can set the TV/HDR Combo to record a recurring show (daily or weekly) in the same time slot on the same channel.

Show-based recordings should be used to create Replay Channels that contain episodes of your favorite shows. They can be created from first run network channels or from syndicated channels. If you don't know what channel a particular show is on or want to capture all episodes regardless of what channel it is aired on, you can create a Theme-based Replay channel using the name of the show as the theme. For example, a Show-based channel created from "The X-Files" on Sunday night at 9PM will only record episodes that broadcast at or around that time on that particular channel. A Theme-based channel with the theme of "The X-Files" will record any episode of The X-Files from any channel on at any time.

Theme-based Replay Channels -

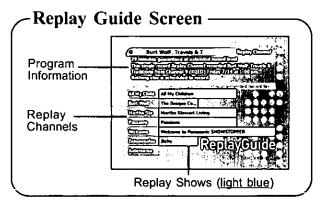
If you create a Theme-based channel using the keyword "Friends," the TV/HDR Combo will look for and record *all* programs with the word "Friends" on all channels, including new Friends episodes and reruns, even "Barney & Friends."

Theme-based channels can be created using any theme that you are interested in. For example, an actor, director or category name can be used. The theme you create will dictate the shows that are recorded. Theme-based channels are great for recording shows that change time slots frequently. By creating a Theme-based channel, all episodes are recorded, regardless of what time they air. (Of course, you have to have enough recording space allocated to your channel.) Show-based channels take priority over Theme-based channels if there is a time conflict. Theme-based channels are lots of fun—you never know what the TV/HDR Combo will find and record for you.

Watching Your Recorded Shows

Every show that the TV/HDR Combo records is stored in the Replay Guide. All scheduled recordings are also listed here. This is where you go to watch your shows.

You can watch your recorded shows even if the TV/HDR Combo is recording ashow.



Changing Replay Channel – Characteristics

You can change the characteristics of a scheduled recording at any time (changing the recording quality from Extended to High, for example). The available menu items for the Replay channels you set up depends on the type of Replay channel.

Single record channels and Show-based channels contain the following choice: ------> Change record options

Theme-based Replay channels contain the following choices:

-----> Change record options -----> Change search options -----> Find matching shows

Zone-based Replay channels contain the following choices:

-----> Change record options -----> Find matching shows

-Four Types of Replay Channels

The Replay Guide stores all your recorded shows and the shows set to record.

- Single record Replay channels: one episode or show.
- Show-based Replay channels: a series of episodes.
- Theme-based Replay channels: shows based on a Theme you select.
- Zone-based Replay channels: shows from Replay Zones.

From the Replay Guide you can:

- See a list of shows the TV/HDR Combo has recorded for you.
- Play recorded shows—from the beginning, or wherever you last left off.
- Delete shows you have previously recorded, or have scheduled to record.

To display the popup menu... Highlight a Replay channel or a Replay show using $\Delta/\nabla/\langle | \rangle$ buttons, then press SELECT.

-Replay Channel Popup Menu Items -

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(Changeszachopions Andarzehingelows Deleo Deleo Deleo Deleo

Change record options: change the channel's recording options. See page 27. You can't change the recording level of a Replay show after it has been recorded. Change search options: re-type your search keyword. See page 30. Eind matching shows: see the shows that fit the characteristics of the Replay.

Find matching shows: see the shows that fit the characteristics of the Replay channel you have set up. See page 35.

Delete: permanently remove the channel. See page 35.

- Replay Show Popup Menu Items -

AffredHitchcockPresents

Aptical action of the second s

Play: play the show from where you left off. See page 36.

Play from beginning: play the show from the start. See page 36.

Preserve this episode: save a show in the Replay Guide so it is not replaced by the next episode. See page 36.

Save to VCR: save shows to videotape for long-term archiving. See page 37. Delete: permanently remove the show. See page 39.

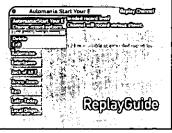
Seeing What a Replay Channel Will Record

To quickly see the types of shows that will be recorded for a Theme-based or a Zone-based channel, use the Find matching shows feature. This is a great way to verify that the shows the channel finds are what you want to watch.

(Press REPLAY GUIDE to display the Replay Guide. • You can also select "Replay Guide" from the Main Menu.

Press ▲/▼/◀/▶ to highlight a Theme-based or Zone-based channel, then press SELECT. • The popup menu displays.

- 3 Press ▲/▼ to highlight "Find matching shows," then press SELECT.
 - The TV/HDR Combo searches through the seven days of Channel Guide listings for shows that match the characteristics of the Replay channel.



 The shows listed that match the Replay Zones or Theme channel settings. These shows will be recorded if there's space available and no recording conflicts exist (a guaranteed show, for example).

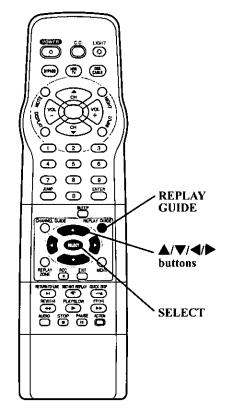
If you want to adjust the channel's characteristics...

- a. Press ▲/▼/◀/▶ to highlight "Exit," then press SELECT to go back to the Replay Guide.
- b. Press ▲/▼/◀/► to highlight the Replay channel, then press SELECT to display the popup menu options.
- **c**. Press \blacktriangle/ ∇ to choose one of the menus.
 - See "Replay Channel Popup Menu Item" on page 34.

If you want to delete a Replay channel or Replay show ...

- a. Press ▲/▼/◀/▶ to highlight the *channel* or *show* on the Replay Guide screen, then press SELECT.
- b. Press ▲/▼ to highlight "Delete," then press SELECT to delete the Replay channel.
 - Choose "Yes" on the confirmation screen.

To Record *One* of the Shows... To Create a Show-based Replay Channel... To Cancel Recording of a Show...





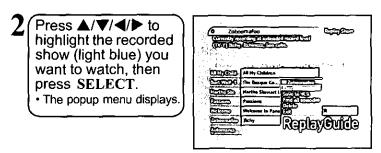
 If you select to record a single show or create a Show-based Replay channel, you may want to delete the Theme-based or Zone-based channel from the Replay Guide. This way, you will record the exact shows you want and eliminate the recording space taken by the Theme-based or Zone-based Replay channel.

Watching Your Recorded Shows (continued)

Watching a Show

Watching shows that the TV/HDR Combo has recorded for you is easy.

Press REPLAY GUIDE to display the Replay Guide. • You can also select "Replay Guide" from the Main Menu.



Press Δ/∇ to select "Play" or "Play from beginning," then press SELECT.

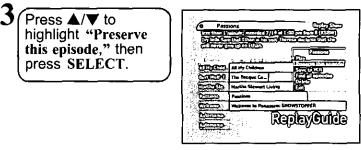
- Select "Play" to watch the show from where you last left off.
- Select "Play from beginning" to watch the show from the start.
- The show will begin playing. All of the TV/HDR Combo's television control features (Stop, Fast Forward, Rewind, Pause, Slow Motion, Frame Advance, QuickSkip, Instant Replay) are available when you play recorded shows. See "Controlling Live Television" on pages 20~23 for more on these features.

Preserving a Show

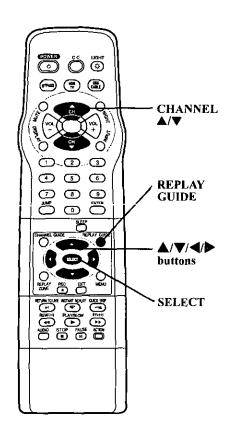
You can preserve an episode of a show recorded in a Replay channel. Older episodes of Show-based and Theme-based Replay channels are deleted to make room for new episodes. Use this feature if you don't want a particular episode to be replaced.

Press REPLAY GUIDE to display the Replay Guide. • You can also select "Replay Guide" from the Main Menu.

Press ▲/▼ to highlight the show you want to save in the Replay Guide, then press SELECT. • The popup menu displays.



 If there is enough guaranteed space to accommodate the length of the show, it is removed from its current Replay channel and moved into a new single-record guaranteed channel.



Programming blocked by V-Chip technology

The TV/HDR Combo has a built-in V-Chip Control. If you want to watch a show that is blocked you need to unlock the control. See "V-Chip Control" on pages 45~47 for more information.



 If you are watching a show that is blocked, you can go to another channel by pressing CHANNEL ▲/▼.

Watching shows with closed-captioning

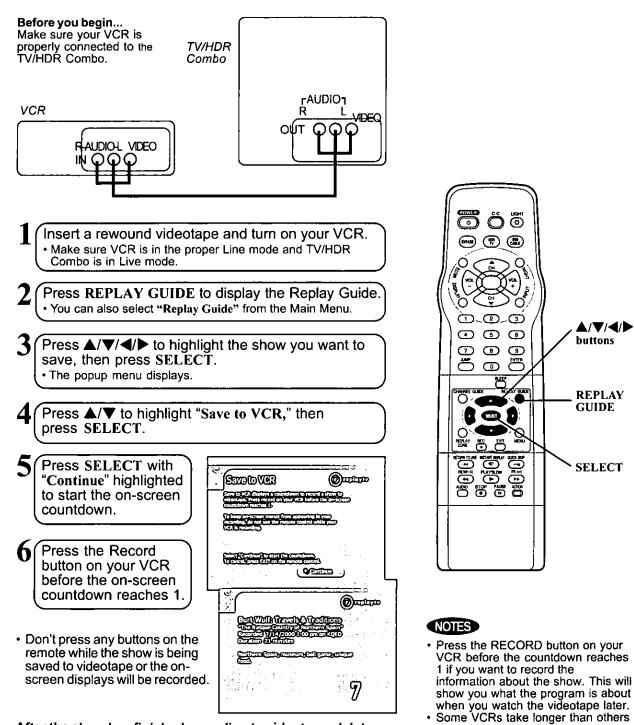
The TV/HDR Combo records closed caption information. To view the closed captioning for a live or recorded show, press C.C. See "Setting Closed Caption" on page 42.

Saving Shows to Videotape

If you want to save a show permanently, you can save shows recorded by the TV/HDR Combo to videotape. By transferring recorded shows to videotape more space will be available for the TV/HDR Combo to record other shows for the TV/HDR Combo to record other shows. The TV/HDR Combo is not intended to be used as a long-term storage device.



• Live broadcast can not be recorded from the TV/HDR Combo to a VCR unless the speakers have been tuned off. (See page 43.)



After the show has finished recording to videotape, delete the show from Replay Guide to make more recording space. • See "Deleting a Show From the Replay Guide" section on page 39.

37

to begin recording. You may want to

experiment to see when to begin

recording on your VCR.

Managing Recording Space

The TV/HDR Combo manages recording space based on priorities. The priorities are set when you select to record a single show, or create a Show-based, Theme-based or Zone-based Replay channel. The capacity of the TV/HDR Combo's recording space is also determined by the level of recording quality you select. "High" takes more space than "Extended."



 Your TV/HDR Combo provides 30 hours of extended-quality recording, 15 hours of medium-quality recording, and 10 hours of high-quality recording. About 10 minutes of recording space are always reserved for the show you are currently viewing live.

Recording Priorities

Guaranteed recordings take priority over non-guaranteed recordings; Show-based Replay channels take priority over Theme-based Replay channels. At the top of the priority list, guaranteed recording sets aside disk space to ensure that your show will be recorded. Think of it as a parking space: guaranteed shows have a reserved spot, always there for your show; non-guaranteed shows do not. If the guaranteed show is about to be recorded and space is needed, your non-guaranteed show may be removed, and the guaranteed show will take its reserved space.

NOTE

 Non-guaranteed shows that you choose to record appear in the Replay Guide even though they may not be recorded.

How to tell if a show is guaranteed

You'll know a show is guaranteed when one or two solid red dots appear next to the show in the Channel Guide. You can also tell by selecting the channel in the Replay Guide or in the Channel Guide (select the channel, then look in the show information at the top of the screen).

Show-based Replay channels

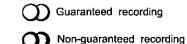
A Show-based Replay channel is created when you select to record episodes of a show on an on-going basis—a weekly sitcom, for example. Show-based Replay channels are represented by two red dots next to the show in the channel guide. Solid red dots indicate a guaranteed Show-based channel; hollow red dots indicate a non-guaranteed Show-based channel. You can also tell by choosing the channel in the Replay Guide.

Theme-based Replay channels

A Theme-based Replay channel is created when you enter a keyword for a favorite show topic. Theme-based Replay channels are stored in the Replay Guide. Theme-based recordings aren't visible in the Channel Guide (there are no red dots) because shows are only recorded if they fit the criteria you specified.

Indication of Guaranteed or Non-guaranteed recording

In the Channel Guide, solid dots indicate guaranteed recording. Hollow dots indicate non-guaranteed recording. One dot appears on the Channel Guide listing if you're recording only one episode; two dots appear if you're recording all episodes.



			19970-0 19970-0
111 10000 10000 10000			
6000 6000 6000			
00300	1	<u></u>	real D

Guaranteed and Non-guaranteed Recording

When setting up your own personal Replay channels, consider the following. Show-based and Theme-based channels can be created as guaranteed or non-guaranteed recordings. A guaranteed recording will allocate recording space for the duration of the show or multiple shows, depending on the number of episodes you selected to be recorded. A non-guaranteed recording will only record the show if there is sufficient storage space.

For example, if you create an "NYPD Blue" channel and used a guaranteed record setting, you have set aside one hour of recording space for NYPD Blue. When NYPD Blue airs it will be recorded in its allocated space. If you also have set up a Show-based "Seinfeld" channel as a non-guaranteed record, when a Seinfeld episode airs, it will be recorded only if storage space permits.

So, how do you know if sufficient space is available? Say NYPD Blue airs on Tuesday nights at 10:00PM. After you watch the episode, you delete it from the Replay Guide. Since NYPD Blue is a guaranteed record, the hour of time that is reserved for the next episode can be used for non-guaranteed shows until the next episode of NYPD Blue is broadcast. Non-guaranteed shows can borrow the space reserved for guaranteed channels if the guaranteed channels don't have episodes recorded in them.

Guaranteed Record and Space-available Record

When you guarantee recording of a future show, recording space is immediately set aside. For this reason, the size of your recording space limits the number of shows you can guarantee. A guaranteed record places solid red dots next to the show-based recording in the Channel Guide.

When you don't guarantee a future show for recording, the show uses whatever space is available at the time it is recorded. If there is no unused space available at the time, the show may not be recorded. A non-guaranteed (space-available) record places hollow red dots next to the show in the Channel Guide. There is no limit to the number of non-guaranteed recordings you can set.

To increase the likelihood of your non-guaranteed shows being recorded, delete viewed shows from the Replay Guide after you have watched them. The time that is reserved for the Show-based channel that you just deleted can be used for non-guaranteed shows. Although, if another episode of the guaranteed show is about to air, it will reclaim its reserved recording space that was borrowed by the non-guaranteed recording.

Recording Space Management Tips

Here are some space saving tips to make sure the TV/HDR Combo records what you want.

Use the Guaranteed record setting for your can't miss shows

Use the Guaranteed setting for the shows you can't afford to miss, and use the non-guaranteed setting for other shows. By using the guaranteed setting for every show, you may block the recording of other shows you'd like to watch. If you maintain your Replay Guide regularly, there should always be enough space to record guaranteed and non-guaranteed shows.

Use the High record level sparingly

The High level setting provides the best picture for the shows you record. This also takes up the most recording space of the three record level settings. You might want to use the High level setting for sporting events, fast-action movies, and other shows where quality is vital.

Keep space available for pausing

If you need to pause live TV for longer than 10 minutes, keep more recording space free for the added pause time.

Save shows you want to keep long-term to videotape

For shows you want to keep permanently, connect a VCR to the TV/HDR Combo and transfer recordings to videotape. See "Saving Shows to Videotape" on page 37.

Review your Replay Guide regularly to delete any unwanted shows

Every show you record remains in your Replay Guide—even after you watch it. As more shows are recorded, available space begins to run out. Rather than leave an old episode in your Replay Guide, delete the show after you watch it. That way, you make space available so that other shows can be recorded, rather than tie that space up from week to week. Check your Replay Guide on a regular basis and delete shows you have already watched.

— Deleting a Show From the Replay Guide...-

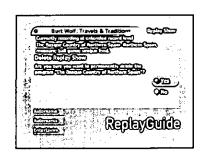
a. Press REPLAY GUIDE.

- **b**. Press $\blacktriangle/ \bigtriangledown / \checkmark / \blacklozenge$ to highlight the show, then press SELECT.
- **C**. Press \blacktriangle/∇ to highlight "Delete," then press SELECT.
- **d**. Press \blacktriangle/\forall to highlight "Yes," then press SELECT.

To Delete a Show After You Watch It ...

An on-screen message displays when the TV/HDR Combo has reached the end of a Replay show.

a. Press SELECT when the on-screen message appears.
b. Press ▲/▼ to highlight "Yes," then press SELECT.



The show is permanently removed from the Replay Guide, freeing up more recording space.

Cable/DSS Universal Remote Control

The remote control may be set up to control some basic DSS or Cable Box functions. Only one receiver can be controlled even if you have both of DSS and Cable Box.

Setting Up Your Remote Control

(Find your DSS or Cable Box Brand Code Number from one of the charts on page 41.

(Hold down DSS CABLE, then press Number buttons to enter code.

 Press POWER to turn your receiver ON or OFF.
 If your receiver does not respond, repeat steps 1~3, trying each code listed for your brand until you find the one that operates your receiver.

NOTES

- Please repeat "Setting Up Your Receivers" after replacing remote control batteries.
- The remote control will not operate all DSS receivers or Cable Boxes made by manufactures listed. If you get no response, your particular brand cannot be controlled.

Using Universal Remote Control

Once the remote control has been properly set up, you can select DSS or CABLE mode depending on which functions you wish to control.

Press DSS CABLE to select your receiver.

Operate your receiver (e.g. POWER, ENTER, Number buttons, CH▲/▼.)

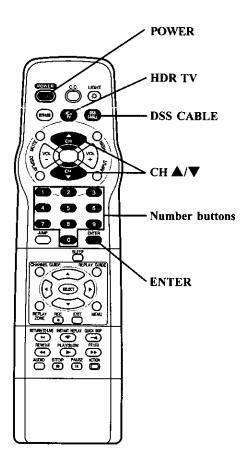
To Return to the TV/HDR Combo Mode,

Press HDR TV to operate the TV/HDR Combo.

· If invalid button is pressed, the warning screen appears.

NOTES

- In the universal mode, it may be necessary to press ENTER after pressing Number buttons for channel selection.
- Depending on your receiver brand, some of the functions may not be remote controllable and may require you to operate the device manually or with another remote control.
- Due to changes in infrared commands used by manufactures, some brands have several codes. If your receiver does not respond to the first code, please try the next one.



DSS Brand Code Numbers

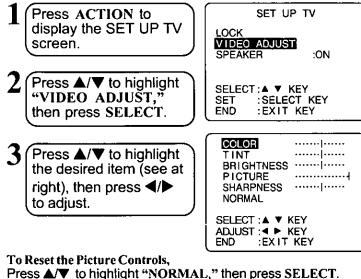
Toshiba	
Hitachi/Hughes	
Magnavox/Uniden 1	
Magnavox/Uniden 2	95
Panasonic	
RCA	97
Sony	105

Cable Box Brand Code Numbers

Cabletenna 01, 44, 63, 91, 126 Radio Shack 51, 44, 59, 75, 126 Cableview 63, 44, 42, 30, 52, 04, 124, 126 RCA 16, 17, 97, 109 Century 63, 44, 42, 30, 52, 04, 124, 126 Recoton 51, 44, 59, 75, 126 Curtis 08, 09, 61, 53, 87, Regal 14, 15, 28, 41, 102, 103, 104, 108, 130 Diamond 01, 44, 63, 91, 126 Recoton 51, 44, 59, 75, 126 Curtis 08, 09, 61, 53, 87, Regal 14, 15, 28, 41, 102, 103, 104, 108, 130 Drake 67 Rembrandt 01, 32, 39, 42, 44, 63, 126 Eagle 13, 22, 58, 62, 20, 40, 26, 107 Salora 68 Satern 28, 130 Samsung 05, 32, 40, 42, 06 Ge Brand 63, 44, 42, 30, 52, 04, 124, 126 Scientific Atlanta 08, 09, 61, 53, 87 General Ibstruments 01, 02, 03, 04, 34, 55, 83 SL Marx 32, 40, 42, 06, 43, 44, 52, 63, 126 Matachi 11, 102, 103, 104, 108, 130 Standard Components 32, 39, 42, 44, 126 Jasco 04, 124 Sylvania 74 Jerrold 01, 02, 03, 04, 34, 55, 83 Telexiew 32, 40, 63, 44, 42, 30, 52, 04, 06, 124, 126 Macom	Archer	126 Quest
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Basic TV Operation

Adjusting Picture



All controls return to their factory settings.

Press EXIT twice to exit.

NOTE

• If HDR Main Menu, Replay Zones, Replay Guide, Channel Guide, Messages, Find Shows, or Setup screen are displayed, ACTION will not work.

Setting Closed Caption

The multi-use system not only allows the hearing impaired to enjoy selected programs, but also makes useful information from TV stations available to everyone.

Press C.C. repeatedly to select caption mode. • The changes are available, but the display does not appear in all the modes.

The closed caption or text signal may be broadcast over C1, C2, or both.

CAPTION C1 or C2

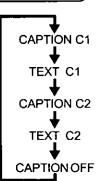
A narration of selected TV programs is displayed. Check TV program listings for C.C. (Closed Caption) broadcast.

TEXT C1 or C2

The lower half of the screen will be blocked out. When the TV station broadcasts information, such as program listings, it will appear in this space.

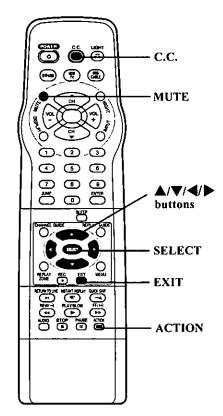
CAPTION OFF

Closed Caption/ Text narration will not be displayed.



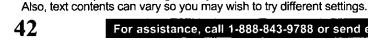
COLOR Adjust color intensity. TINT Adjust for natural flesh tones. BRIGHTNESS Adjust picture brightness. PICTURE Adjust picture intensity by adjusting both contrast and color level in the proper balance.

SHARPNESS Adjust picture sharpness.



Caption On Mute

Closed Caption narration, if available, is displayed when MUTE is pressed for silence. If C.C. is set to OFF, CAPTION C1 will be displayed.



NOTE

Adjusting Volume

Press VOL + or VOL - to control the volume.

To mute the sound, press MUTE.

- "CAPTION C1" will be displayed when C.C. is set to OFF. (See page 42.)
- · Press MUTE again to restore the previous sound level.

Setting NIGHT Mode

Color and picture intensity levels are adjusted so the screen is easier on your eyes during night time use.

Press NIGHT to dim the picture.

To cancel, press NIGHT again.

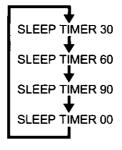
- "NIGHT OFF" appears.
- · Previous settings are restored.
- · NIGHT mode is cancelled when power is turned off or power failure occurs.

Setting Sleep Timer

This TV/HDR Combo can be set for auto power off.

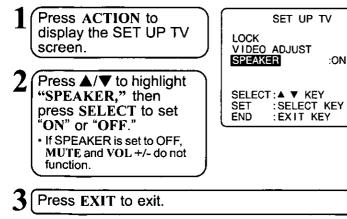
- Press SLEEP repeatedly to set the desired Sleep Timer.
 - You can press SLEEP on the TV/HDR Combo.
 - Press DISPLAY with BYPASS mode to display the remaining time.

To cancel, press SLEEP repeatedly until "SLEEP TIMER 00" appears.



Setting Speaker ON/OFF

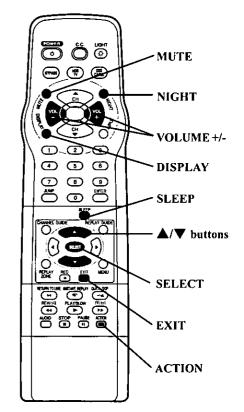
Allows you to turn off the speaker of the TV/HDR Combo when it is connected to external audio equipment.



— Using the Phone Jack

Connect an earphone (not supplied) or headphones (not supplied) to the PHONES jack on the front of the TV/HDR Combo.

• Lower volume in advance when you use an earphone.



NOTES

- If HDR Main Menu, Replay Zones, Replay Guide, Channel Guide, Messages, Find Shows, or Setup screen are displayed, ACTION will not work.
- If you connect Audio Cable from TV/ HDR Combo OUT jacks to the Stereo Amplifier, set "SPEAKER: OFF."

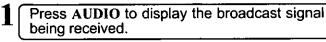
MTS Broadcast/ TV Stereo System

ØSTEREO ←

(\$SAP

Watching Receivable Broadcast Types

The following are possible broadcast types with their accompanying onscreen displays. The signal being received is indicated with a "(" mark while the selected audio mode is indicated with an arrow. To change the audio mode for these broadcasts, follow the "Selecting Audio Mode for Live TV Viewing" section below.



MTS Stereo and SAP broadcast

Multi-channel Television Sound Stereo (main language) and Secondary Audio Program (sub language) broadcasts are both being received simultaneously. Select the STEREO or SAP audio mode.

MTS Stereo broadcast Multi-channel Television Sound Stereo broadcast. Select

- STEREO audio mode.
- If stereo broadcast is weak and the display flickers, select MONO audio mode for possibly better results.

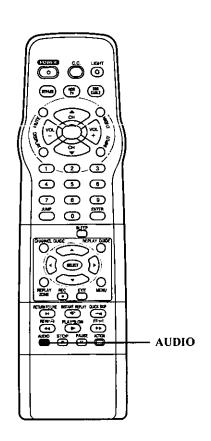
SAP broadcast

Secondary Audio Program (sub language.) Select SAP audio mode for the sub language.

MONO broadcast

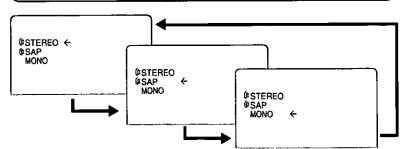
Normal monaural sound broadcast.

MONO (¢STEREO ← SAP MONO (¢SAP (¢SAP MONO STEREO SAP MONO ←



Selecting Audio Mode for Live TV Viewing

Press AUDIO to select the desired audio mode in Live TV or recording mode. (Arrow shows selection.) • Each press AUDIO will change the audio mode as shown below.



NOTE

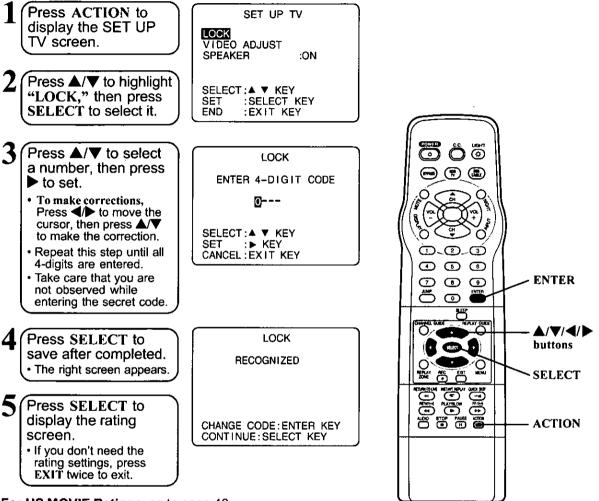
 Playback of Replay Shows and delayed live broadcasts occurs in the same audio mode that the live show was recorded in.

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The TV/HDR Combo has a built-in V-Chip Control which allows you to block unwanted TV usage on US MOVIE and US TV PROGRAM ratings.

Entering Secret Code

A 4-digit code must be entered to view a blocked program or change rating settings.



For US MOVIE Ratings, go to page 46. For US TV PROGRAM Ratings, go to page 47.

NOTES

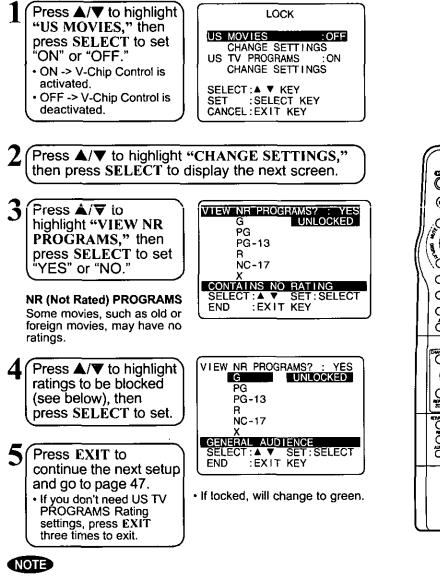
- DO NOT forget your secret code.
- Once ratings are set, restricted tapes or programs cannot be accessed unless the secret code is entered.
- If HDR Main Menu, Replay Zones, Replay Guide, Channel Guide, Messages, Find Shows, or Setup screen are displayed, ACTION will not work.

- To Change Your Secret Code... -

- You will need your current code.
- 1. Do steps 1~4.
- 2. In step 5, press ENTER to clear the current code.
- 3. Repeat steps 3~5 to enter new code.

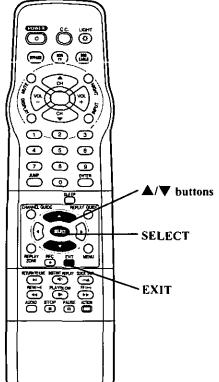
Setting U.S. MOVIE Ratings

Be sure you've completed "Entering Secret Code" steps on page 45.



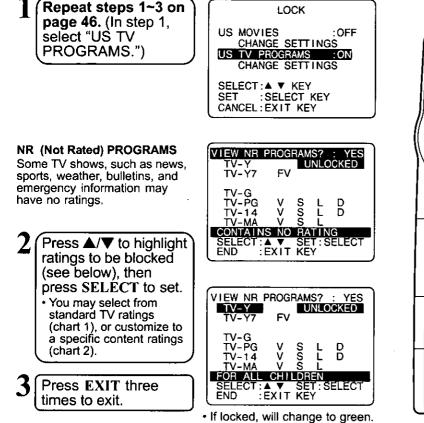
· Some rental movies do not include V-Chip data.

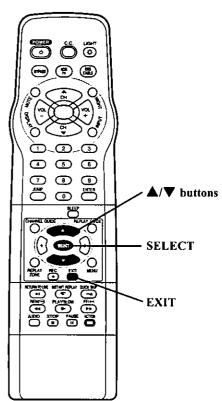
US M	OVIES RATINGS
G	GENERAL AUDIENCE: All ages admitted.
PG	PARENTAL GUIDANCE: Some material may not be suitable for children.
PG-13	PARENTS CAUTIONED: Some material may be inappropriate for children under 13.
R	RESTRICTED: Children under 17 must be accompanied by a parent or adult.
NC-17	OVER AGE 17 ONLY: No one 17 and under admitted.
x	ADULT ONLY:



Setting U.S. TV PROGRAM Ratings

Be sure you've completed "Entering Secret Code" steps on page 45.





US TV PROGRAMS RATINGS: Chart 1

- TV-Y FOR ALL CHILDREN: Content specifically geared to young viewers ages 2-6.
- TV-Y7 FOR AGE AND OLDER: May contain mild physical or comedic violence which may frighten children under 7.
- TV-G GENERAL AUDIENCE: Contains little or no violence, strong language, or sexual dialogue or situations.
- TV-PG PARENTAL GUIDANCE: May contain infrequent coarse language, limited violence, some suggestive sexual dialogue and situations.
- TV-14
 PARENTS CAUTIONED: May contain sophisticated themes, sexual situations, strong language, and more intense violence.

 TV-14
 MATURE AUDIENCE: May contain motion themes, surface
- TV-MA MATURE AUDIENCE: May contain mature themes, profane language, graphic violence, and sexual situations.

τ

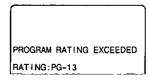
US TV PROGRAMS RATINGS: Chart 2

- FV Fantasy Violence
- V Violence
- S Sexual Situations
- L Adult Language
- D Sexually Suggestive Dialogue

Blocking Message

Be sure you've completed "Entering Secret Code" steps on page 45.

 If V-Chip Control is activated, and a program or movie exceeds the ratings you have set, a message will appear and sound is muted.



To Continue Viewing a Blocked Program

After entering your 4 digit secret code, go to step 1 on page 46 and select "OFF" to deactivate V-Chip Control.

• The US MOVIES and US TV PROGRAMS ratings you set will be retained.

Troubleshooting

Please note that the Panasonic Web site at www.panasonic.com is also a great place to ask operational and troubleshooting questions. If, after reading the troubleshooting information on our Web site and in this manual, you find you still have unanswered questions, please contact Technical Support by phone at 1-888-843-9788.

Connections	Solution
When attempting to connect to the ReplayTV Service in Setup, I get one of the following error messages: "no dial tone," "modem timed out," "no response from modem," or "network connection error."	 Confirm that there is no dial tone on the line by hooking up a phone to it and listening for the dial tone. If you have call waiting, confirm that it has been disabled by entering the correct telephone prefix number in "Setup." Contact your phone company to obtain the correct dialing prefix information. The TV/HDR Combo cannot connect to the ReplayTV Service if your phone line has a stutter dial tone. If you have a message service that enables a stutter dial tone when you have messages, you will need to delete/save all of your messages in order to disable the stutter dial tone. Confirm that the line that you are dialing out on is an analog line. Unplug the AC Power Plug from AC outlet. Wait one minute, then reattach the AC Power Plug (the TV/HDR Combo will restart itself). Once the TV/HDR Combo has restarted, press POWER on the TV/HDR Combo remote to exit standby mode. Proceed as instructed by the on-screen instructions.
While setting up the TV/HDR Combo, I realized that the nearest phone outlet is too far away to connect to the TV/HDR Combo directly.	 If you do not have a phone jack near the TV/HDR Combo, you can use a wireless phone jack instead. In particular, the Phonex Wireless Modem Jack (Part #PX-421) has been qualified to work with the TV/HDR Combo. It operates at speeds up to 33.6K BPS. Wireless phone jacks can be found at most electronics stores. (Panasonic offers the Phonex Wireless Modem Jack.)
Currently, the only phone line near my TV/HDR Combo is being used by my DSS receiver/cable box.	 The TV/HDR Combo ships with a telephone splitter. This will allow you to plug the TV/HDR Combo and your cable box/DSS receiver into the same phone line.
Setup	Solution
When setting up my TV/HDR Combo, the correct cable company does not appear as a menu item in Setup.	 Contact the Panasonic Technical Support department by phone at 1-888-843-9788. Please provide the following information: 1) Complex name (if applicable), 2) Community, 3) State, 4) Cable Provider Name, 5) Cable Provider contact information, and 6) Problem description. In most cases, the correct information can be added to the ReplayTV Service database within 48 hours.
When entering my phone number in Setup, I am only able to enter the first 6 digits.	 This is correct! The TV/HDR Combo only needs the first 6 digits of your phone number. The last four (4) numbers will appear as follows: XXXX
Monitor	Solution
No picture and sound.	 Make sure your antenna system is correctly set. Completely insert Power Plug into an AC outlet and press POWER.
Poor reception.	 Check signal source, connections, and the TV/HDR Combo setup selections.
Poor picture.	Check COLOR setting. (See page 42.)
Channel cannot be selected.	 Only the channel being recorded can be viewed on this TV/HDR Combo.
Remote Control	Solution
The green light on the TV/HDR Combo remote does not blink when I press a button on the remote.	Replace the batteries in the remote control with 2 new AA batteries.
The TV/HDR Combo remote control does not operate my cable box or DSS receiver, or is not performing commands property.	 Make sure you're pointing the TV/HDR Combo remote directly at the device, and that there is nothing blocking the path of the infrared signal between the remote and the TV/HDR Combo. If that doesn't work, try all of the codes listed for your brand of device in the "Cable/DSS Universal Remote Control" section of this guide. Many setup codes may allow for partial functionality, however, only one code will operate your device correctly. Make sure that all of the devices you are setting up can be operated with an infrared remote.

Remote Control	Solution	
I'm using an IR blaster to		
ontrol my cable box or DSS receiver and I'm having trouble changing channels using the TV/ HDR Combo remote.	specific c prior to h 5 to tune during the adjust the 1. Press M 2. Choose 3. From th receive 4. Proceec your ca 5. Press tt A. If you code See page 6. Continu 7. Once you receive 8. If you a change • If you	re still having trouble changing channels, repeat step 5 above with the following s: used step 5A, replace the number 6 with the number 7.
		used step 5B, replace the number 8 with the number 9.
My cable box sometimes fails to change channels when using the TV/HDR Combo remote control.	 If you are using the IR blaster, your cable box receives IR commands from both the TV/HDR Combo remote and the IR blaster. Some cable boxes can be confused by this. You can prevent your cable box from receiving the commands from the TV/ HDR Combo remote control by affixing an opaque covering around the area where you have placed the IR emitter on your cable box. Don't cover the IR emitter. 	
The TV/HDR Combo does		d hold INPUT and CH ▼ on the front of the TV/HDR Combo for 10
not respond when I press buttons on the remote control. Or, the image on my TV screen is "frozen."	 seconds, then release. The TV/HDR Combo will restart in a few moment Unplug the AC Power Plug for one minute then plug it back in. The TV/HDR Combo will restart and power on in a few moments. 	
Miscellaneous		Solution
When selecting a show from the Channel Guide, I get a screen that fades to blue.		 Typically, this is caused by a weak video source. Contact Technical Support for further suggestions by phone at 1-888-843-9788. Phone support personnel answer calls between 6:00 AM and 6:00 PM (PST), Monday through Friday.
When viewing show content through the TV/HDR Combo, shows appear to be in black and white.		 This condition will exist if you have a composite input source going into the TV/HDR Combo on LINE 2, but the input source in Setup (on LINE 2) is set to S-Video. Go to "Changing Dialing & Input Settings" on page 18 to correct the information.
When I select a channel in the Channel Guide, the channel number does not change on my DSS receiver or cable box.		 If you're using an IR blaster connection to control channel changing, verify that you have affixed the IR blaster directly in front of the IR detector on your cable box or DSS receiver. Confirm that you have selected the correct IR code for your cable box or DSS receiver. (See page 16 for a list of codes.)
When I select a channel in the Channel Guide, I get a blue screen that states "no video source"		 Confirm that you subscribe to the channel in question. Verify that the A/V connections going from your cable box/DSS receiver to the TV/HDR Combo are correct. Verify that all your devices are turned on.
When selecting a show in the Channel Guide, I get a solid blue screen.		 Confirm that you have the correct input source specified in Setup. Go to "Changing Dialing & Input Settings" on page 18 to correct the information.
The "FAN LOCK DETECTED PLEASE REFER TO MANUAL" message appeared.		 The TV/HDR Combo is in need of repair. Contact Technical Support for further suggestions by phone at 1-888-843-9788. Phone support personnel answer calls (Monday-Friday 9am-9pm EST, Saturday-Sunday 9am-7pm EST including Holidays).
I can not record pictures fror video camera on my TV/HD	n my R Combo.	 The TV/HDR Combo is not designed to record the pictures from other devices.

Frequently Asked Questions

Questions	Answers
I can't find the IR Blaster code for my cable box or satellite receiver.	Call Panasonic customer support at 1-888-843-9788 to get the latest IR Blaster codes.
The IR Blaster code listed for my cable box/DSS receiver does not work.	Try substituting a 6, 7, 8, or 9 for 0 in the first digit of the code.
The remote changes are inconsistent when changing channels.	Affix an opaque covering around the IR Blaster, covering all IR receiver area not covered by the IR Blaster.
The audio and video are not in sync with each other.	Ensure that the audio from signal source is connected to the TV/HDR Combo, rather than being connected to a separate amp/receiver.
I can't find a local telephone number to dial for my nightly connection to the ReplayTV Service.	Servers and access numbers are constantly being updated; check messages on the TV/HDR Combo frequently for updated telephone numbers.
My TV/HDR Combo is unable to connect to the ReplayTV Service.	Make sure your TV/HDR Combo is connected to a telephone wall jack. If it is necessary to use a wireless jack, insure that it is 33.6K BPS capable.
I see unexplained error codes during QuickSetup.	Unplug the AC Power Plug for one minute to reset the TV/ HDR Combo, or call 1-888-843-9788 for assistance.
My channel guide listings are not correct.	Verify that you have selected the correct cable box/DSS service provider in Setup.
Can I watch live TV on one channel while recording live TV on another channel?	No, but you can record live TV while watching a previously record program.
The screen appears "frozen" in place.	Reset the TV/HDR Combo. (Refer to page 58.)
Can I save recorded programs to my VCR?	See page 37 for more information on saving recorded shows to your VCR.
How often does the TV/HDR Combo connect to ReplayTV Service.	Every night around at 3:00 am.
Can I change the nightly connection time?	No.
How can program recording time be extended to compensate for overruns, for example sporting events and award shows?	When recording this type of event we recommend that you also record the program immediately following.
The remote control does not work.	Verify if the HDR/TV button lights up when you press the button on the remote. If the remote does not light up, replace the batteries with fresh AA batteries. Reset the TV/ HDR Combo if you still have problems. (Refer to page 58 for resetting.)
No channel information is listed in channel guide.	Call 1-888-843-9788 to connect to ReplayTV Service forcibly.
I changed channels using the Channel Guide, but my DSS receiver did not change channels.	Use the setup menu to verify that you are using the correct connection settings and IR Blaster codes.
The TV/HDR Combo sometimes reverts to the previous channel displayed.	If using the IR Blaster, substitute 6, 7, 8, or 9 for 0 in first digit of code being used. If using serial cable, check connections.
"No video source" is displayed.	Press BYPASS to place the TV/HDR Combo into BYPASS mode. Or check that signal source is powered on, and check connections and settings.
I can not watch pictures from my other devise (for example, VCR or DVD) on my TV/HDR Combo clearly.	Try to place the TV/HDR Combo into BYPASS mode. (See page 17.)

Questions	Answers
How does the TV/HDR Combo get new features?	The TV/HDR Combo downloads the latest version of ReplayTV's software every night.
The TV/HDR Combo locks up on the "Please Wait" screen.	Reset the TV/HDR Combo. (Refer to page 58 for resetting.)
Is the TV/HDR Combo compatible with C-Band Satellite?	No.
When watching a recorded show, sometimes the picture breaks up.	Check the signal strength of your cable box or DSS receiver. Record fast action programs in High Quality.
The TV/HDR Combo is not dialing out.	Check telephone line connections. If using a wireless jack, insure that it is 33.6K BPS capable.
My PPV (Pay Per View) channels are not listed in the channel guide. How can I watch or record them?	You can record Pay Per View programming directly by selecting the desired INPUT and setting the signal source (cable box or DSS receiver) on the desired channel.
I want to use a wireless telephone jack. Which one should I use?	Any wireless telephone jack that supports a minimum of 33.6K BPS, should work. Wireless telephone jacks can be found electronic stores.
How do you reset the TV/HDR Combo?	Hold INPUT and CH ▼ button on the TV/HDR Combo together for ten seconds. If this does not work, remove AC Power Plug from the TV/HDR Combo for one minute.
How do you set up an "A" or "B" Cable box?	If an A/B cable switch is present in your setup, the TV/HDR Combo will not know if the switch is set to A or B. The TV/ HDR Combo will record shows assuming the switch is set correctly. Make sure the switch is set to the proper side, A or B, before recording.
My zip code is not listed on the setup screen. What should I do?	Select an alternate zip code close to your area.
"Out of memory" is displayed.	Reset the TV/HDR Combo. (Refer to page 58.)
My cable or DSS service provider is not listed in setup.	Call 1-888-843-9788 for assistance.
All my recording space has been filled. How can I record more shows?	Press REPLAY GUIDE and remove unnecessary recordings. You may also want to schedule some of your guaranteed shows as non-guaranteed shows.
Is the TV/HDR Combo compatible with PAL or SECAM signals?	No.
What should I do if I forget my Secret Code for the V-Chip Lock?	Hold STOP and EXIT on the TV/HDR Combo for an approximately ten seconds until the TV monitor turns off. After the TV monitor turns off, you will be able to reset a Secret Code for the V-Chip Lock again.

If you have a problem that has not been addressed here, please contact Technical Support at 1-888-843-9788. Phone support personnel answer calls (Monday-Friday 9am-9pm EST, Saturday-Sunday 9am-7pm EST including Holidays).

Software License Agreement

Software license agreement

IMPORTANT — READ CAREFULLY: By pressing "PLAY" and accepting to continue with the setup process to begin using the software in your ReplayTV Product ("Product"), you agree to be bound by the terms of this Software License Agreement (this "Agreement"). If you do not agree to the terms of this Agreement, you may promptly return the Product to the point of purchase for a refund of your purchase price, or you may contact ReplayTV for instructions on where to ship the Product, at ReplayTV's cost, for a full refund of the purchase price after inspection.

- 1. License Grant; Restrictions. Subject to the terms of this Agreement, ReplayTV, Inc. grants you a non-exclusive, non-transferable license, without the right to sublicense, to use all software included with the Product or subsequently provided to you, and related documentation (together, "Software") solely for your internal, noncommercial use and solely in connection with your use of the Product and access to the ReplayTV Service ("RTVS"). You acknowledge and agree that ReplayTV may periodically update, modify or enhance the Software remotely through the RTVS, and that any registration or other information provided by you may be used or disclosed by ReplayTV pursuant to the terms of ReplayTV's Privacy Policy, as that policy may be modified by ReplayTV from time to time. You further agree that: (a) use of the Software or the Product with any third party service competitive with the RTVS is a violation of this Agreement and is grounds for ReplayTV's termination thereof; (b) you will not to attempt to modify, enhance, disassemble, decompile, reverse engineer or otherwise attempt to gain access to the source code to the Software; and (c) you will not attempt to remove or unbundle the Software from the Product. Any resale or transfer of the Product by you will be subject to the terms and conditions of this Agreement.
- 2. Ownership. ReplayTV, Inc. and its licensors own and retain all proprietary rights, including all patent, copyright, trade secret, trademark and other intellectual property rights, in and to the Software and any corrections, bug fixes, enhancements, updates or other modifications to the Software. You acknowledge that the license granted under this Agreement does not provide you with title to or ownership of the Software, but only a right of limited use under the terms and conditions of this Agreement.
- 3. Confidential Information. You agree that the Software contains confidential information, including trade secrets, know-how and other information, that is the exclusive property of ReplayTV, Inc. You agree to keep this information confidential and to not use or disclose this information to any third party except as authorized by this Agreement.
- 4. No Warranties. TO THE MAXIMUM EXTENT PERMITTED BY LAW, ReplayTV, Inc. MAKES NO WARRANTIES, EXPRESS OR IMPLIED, WITH RESPECT TO THE SOFTWARE OR THE RTVS, INCLUDING WITHOUT LIMITATION ANY IMPLIED WARRANTY OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, NON-INFRINGEMENT OF THIRD PARTY RIGHTS AND THOSE ARISING FROM A COURSE OF DEALING OR USAGE OF TRADE. NO WARRANTY IS MADE THAT USE OF THE SOFTWARE OR THE RTVS WILL BE ERROR FREE OR UNINTERRUPTED, THAT ANY ERRORS OR DEFECTS WILL BE CORRECTED, OR THAT THE FUNCTIONALITY OF THE SOFTWARE OR THE RTVS WILL MEET YOUR REQUIREMENTS. BECAUSE SOME STATES/JURISDICTIONS DO NOT PERMIT ALL DISCLAIMERS OF WARRANTY, THESE LIMITATIONS MAY NOT APPLY TO YOU.
- 5. Limitation of Liability. THE ENTIRE RISK ARISING OUT OF THE USE OR PERFORMANCE OF THE SOFTWARE AND THE PRODUCT REMAINS WITH YOU. TO THE MAXIMUM EXTENT PERMITTED BY APPLICABLE LAW, ReplayTV, Inc. AND ITS SUPPLIERS OR LICENSORS WILL NOT BE LIABLE FOR ANY CONSEQUENTIAL, INCIDENTAL, INDIRECT, SPECIAL, PUNITIVE, OR OTHER DAMAGES WHATSOEVER (INCLUDING, WITHOUT LIMITATION, DAMAGES FOR LOSS OF PROFITS, BUSINESS INTERRUPTION, LOSS OF INFORMATION OR DATA, OR OTHER PECUNIARY LOSS) ARISING OUT OF THIS AGREEMENT OR THE USE OF OR INABILITY TO USE THE SOFTWARE OR THE RTVS, EVEN IF ReplayTV, Inc. OR ITS SUPPLIERS OR LICENSORS HAVE BEEN ADVISED OF THE POSSIBILITY OF SUCH DAMAGES. BECAUSE SOME STATES/ JURISDICTIONS DO NOT ALLOW THE EXCLUSION OR LIMITATION OF LIABILITY FOR CONSEQUENTIAL OR INCIDENTAL DAMAGES, THE ABOVE LIMITATION MAY NOT APPLY TO YOU.
- 6. Termination. This Agreement and the licenses granted hereunder shall terminate automatically if you fail to comply with the limitations described in this Agreement. No notice will be required from ReplayTV, Inc. to effectuate such termination. On termination of this Agreement, you must destroy all copies of the Software and accompanying documentation. Sections The obligations of ReplayTV, Inc. and You in Sections 2, 3, 4, 5, 6, 7 and 8 shall survive termination of this Agreement. Nothing in this Section 6 shall limit any other remedies that ReplayTV, Inc. may have for your breach of this Agreement.
- 7. Export Controls; Government Restricted Rights. You acknowledge and agree that none of the Software or underlying information or technology may be downloaded or otherwise exported or re-exported (i) into (or to a national or resident of) Angola, Cuba, Iran, Iraq, Libya, North Korea, Sudan, Syria, or any other country to which the U.S. has embargoed goods; or anyone on the U.S. Treasury Department's list of Specially Designated Nationals or the U.S. Commerce Department's Table of Denial Orders. By using the Software, you represent and warrant that you are not a national or resident of any such country or on any such list. The Software is a commercial product, developed at private expense, and provided with restricted rights. Use, reproduction, release, modification or disclosure of the Software, or any part thereof, including technical data, by the Government is restricted in accordance with Federal Acquisition Regulation ("FAR") 12.212 for civilian agencies and Defense Federal Acquisition Regulation Supplement ("DFARS") 227.7202 for military agencies.
- 8. Miscellaneous. This Agreement shall in all respects be governed by the laws of the State of California without reference to its principles of conflicts of laws. The United Nations Convention on Contracts for the International Sales of Goods shall not apply to this Agreement. You hereby agree that all disputes arising out of this Agreement shall be subject to the exclusive jurisdiction of and venue in the federal and state courts within Santa Clara County, California, and you hereby consent to the personal and exclusive jurisdiction and venue of these courts.

If any of the provisions of this Agreement are held to be invalid under any applicable statute or rule of law, they are, to that extent, deemed omitted. The waiver of any breach or default, or any delay in exercising any rights shall not constitute a waiver of any subsequent breach or default. This Agreement constitutes the complete and exclusive agreement between you and ReplayTV, Inc. with respect to the subject matter hereof, and supersedes all prior oral or written understandings, communications or agreements. This agreement may not be modified except in writing duly signed by an authorized representative of ReplayTV, Inc.

Panasonic Consumer Electronics Company, Division of Matsushita Electric Corporation of America, One Panasonic Way Secaucus, New Jersey 07094 Panasonic Sales Company, Division of Matsushita Electric of Puerto Rico, Inc. AVE. 65 de Infantería, Km. 9.5 San Gabriel Industrial Park Carolina, Puerto Rico 00985

PANASONIC Video Products Limited Warranty

Panasonic Consumer Electronics Company or Panasonic Sales Company (collectively referred to as "the Warrantor") will repair this product with new or refurbished parts, free of charge, in the USA or Puerto Rico, in the event of a defect in materials or workmanship as follows (all time periods commence from the date of the original purchase):

PRODUCT	PARTS	LABOR	SERVICE	CONTACT NUMBER
CAMCORDER	ONE (1) YEAR, EXCEPT CCD IMAGE SENSOR CCD IMAGE SENSOR - SIX (6) MONTHS	NINETY (90) DAYS NINETY (90) DAYS	Carry-In or Mail In	1-800-211-PANA(7262)
VCR	ONE (1) YEAR	NINETY (90) DAYS	Carry-In or Mail In	1-800-211-PANA(7262)
A/V MIXER	ONE (1) YEAR	NINETY (90) DAYS	Carry-In or Mail In	1-800-211-PANA(7262)
TV-VCR Combination	ONE (1) YEAR, EXCEPT CRT CRT-TWO (2) YEARS	NINETY (90) DAYS CRT-NINETY (90) DAYS	Carry-In: 21" CRT and Smaller In-home or carry-in: 22" CRT and Larger	1-800-211-PANA(7262)
TV-HDR Combination	ONE (1) YEAR, EXCEPT CRT CRT-TWO (2) YEARS	NINETY (90) DAYS CRT-NINETY (90) DAYS	Carry-In: 21" CRT and Smaller In-home or carry-in: 22" CRT and Larger	1-888-843-9788

<u>Batteries</u> (if included) - New rechargeable batteries in exchange for defective rechargeable batteries for ten (10) days. Non-rechargeable batteries are not warranted.

Tape (if included) - New video cassette tape in exchange for a defective video cassette tape for five (5) days.

In-home, carry-in or mail-in service, as applicable, in the USA can be obtained during the warranty period by contacting a Panasonic Services Company (PASC) Factory Servicenter listed in the Service Directory. Or call toll free contact number listed above, to locate an authorized PASC Servicenter. Carry-in or mail-in service in Puerto Rico can be obtained during the warranty period by calling the Panasonic Sales Company telephone number listed in the Servicenter Directory.

This warranty is extended only to the original purchaser. A purchase receipt or other proof of the date of the original purchase is requires before warranty service is rendered.

This warranty only covers failures due to defects in materials and workmanship which occur during normal use and does not cover normal maintenance, including, but not limited to, video and audio head cleaning. The warranty does not cover damage which occurs in shipment, or failures which are caused by products not supplied by the warrantor, or failures which result from accident, misuse, abuse, neglect, mishandling, misapplication, alteration, modification, faulty installation, set-up adjustments, improper antenna, inadequate signal pickup, maladjustment of consumer controls, improper operation, power line surge, improper voltage supply, lightning damage, commercial use such as hotel, office, restaurant, or other business or rental use of the product, or service by anyone other than a PASC Factory Servicenter or a PASC authorized Servicenter, or damage that is attributable to acts of God.

LIMITS AND EXCLUSIONS

There are no express warranties except as listed above.

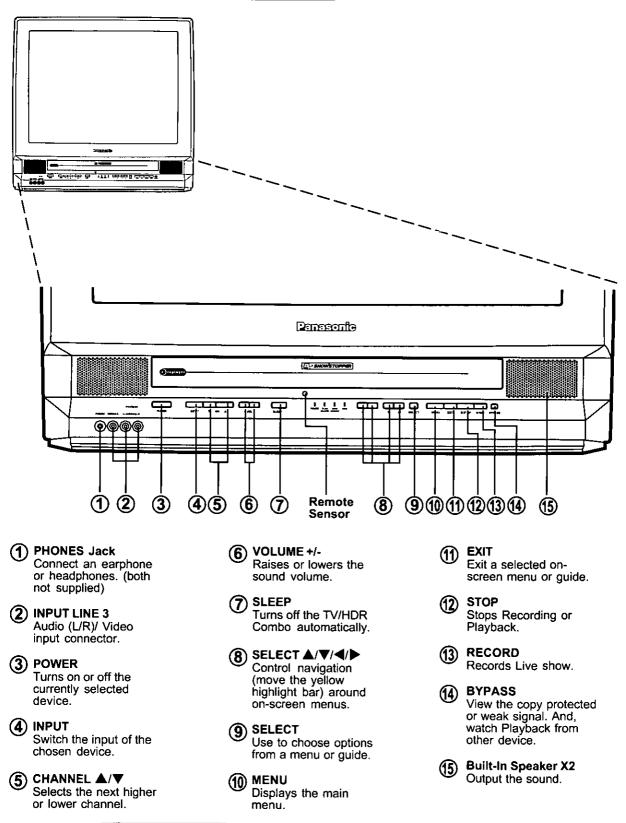
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This warranty gives you specific legal rights and you may also have other rights which vary from state to state. If a problem with this product develops during or after the warranty period, you may contact your dealer or Servicenter. If the problem is not handled to your satisfaction, then write to the Consumer Affairs Department at the Panasonic Consumer Electronics Company address above.

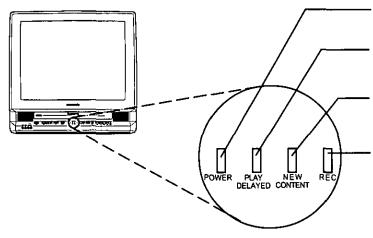
SERVICE CALLS WHICH DO NOT INVOLVE DEFECTIVE MATERIALS OR WORKMANSHIP AS DETERMINED BY THE WARRANTOR, IN ITS SOLE DISCRETION, ARE NOT COVERED. COSTS OF SUCH SERVICE CALLS ARE THE RESPONSIBILITY OF THE PURCHASER.

Location of Controls

Front View of the TV/HDR Combo



Indicators on the Front Panel



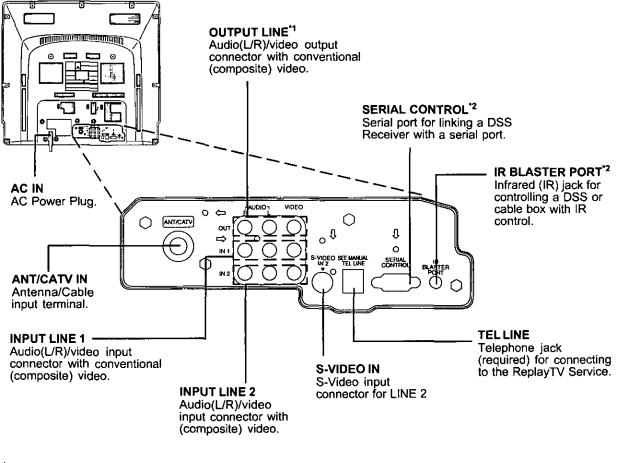
POWER LED Lights red when the power is on.

PLAY/DELAYED Lights green when playing a show or delayed show.

NEW CONTENT LED Lights green when TV/HDR Combo has completed recording.

RECORDING LED Lights red when recording.

Rear View of the TV/HDR Combo



- *1 This connector is only for saving a recorded program to a videotape. If you connect Audio cable from this connector to the Stereo Amplifier, change the "SPEAKER" setting to "OFF." (See page 43.)
- *2 Serial and IR controls are used only with DSS receiver equipment and cable boxes. Serial control can be used only with a DSS receiver that has a serial port.

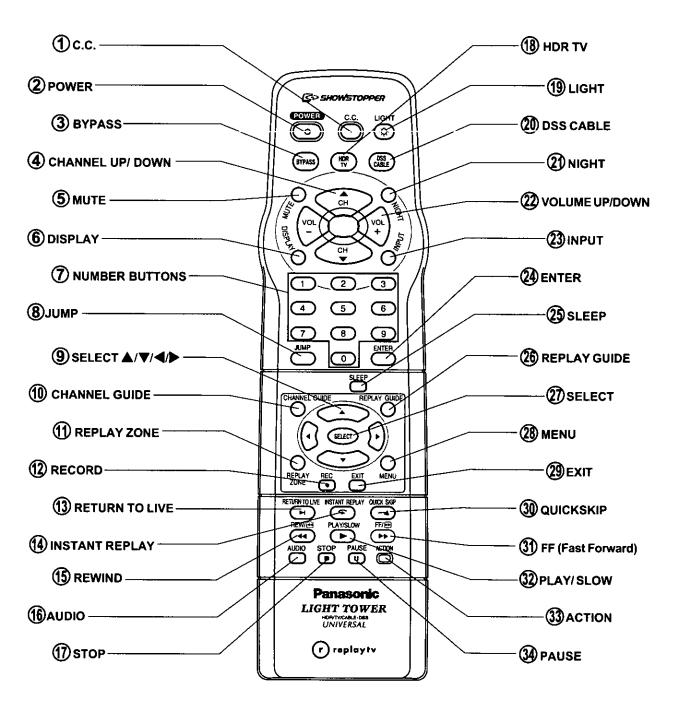
Location of Controls (continued)

Remote Control Buttons

Light Tower ™ Illuminated Remote Control

LIGHT button:

When the LIGHT button is pressed, the buttons which can be activated in the selected mode will light and the selected mode button (HDR TV or DSS CABLE) will flash for 5 seconds. If no buttons are pressed within 5 seconds, the light will turn off in order to conserve battery power. Also, while holding down the buttons, the selected mode button will flash so you will be able to see, in the dark, which mode has been selected.



C.C. (Close Caption)

Displays Closed Caption narration of the selected program.

2 POWER

Turns on or off the currently selected device (TV/ HDR Combo, cable box, or DSS receiver).

3 BYPASS

Enable you to watch the copy protected or weak signal. And, watch Playback from other device.

(4) CHANNEL Up/Down

Enable you to select the next higher (or lower) channel.

MUTE

Turns sound on or off.

DISPLAY

Activates the on-screen display function for each of your devices.

Number buttons

Use the keypad (0-9) to directly select channels.

(8) JUMP

Allowing you to quickly jump back to the channel you were watching previously.

Select Up/ Down/ Left/ Right Control navigation (move the yellow highlight) bar) around on-screen menus.

10 CHANNEL GUIDE

Displays the Channel Guide, an on-screen guide of all the channels you receive.

(11) REPLAY ZONE

Takes you to the screen where you can create a Theme-based Replay channel and channels from topical television categories collected by the ReplayTV Service.

(12) REC

Records live show.

(13) RETURN TO LIVE

Return to live television after delayed show.

14 INSTANT REPLAY

Skips back 7 seconds in a live or recorded show.

(15) REW

Rewinds live or recorded show.

Select the audio mode for the currently receiving show.

STOP

Stops recording or playback.

(18) HDR TV

Puts the remote control in the TV/HDR mode, giving you control of the TV/HDR features and functions.

LIGHT (19)

The buttons which can be activated in the selected mode will light and the selected mode button (HDR TV or DSS CABLE) will flash for 5 seconds.

(20) DSS/CABLE

Puts the remote control in a particular mode-to operate your DSS receiver or cable box. If a device does not respond when you press a remote control button (or responds incorrectly), press the HDR TV or DSS CABLE button first to choose which device to operate.

NIGHT (21)

Color and picture intensity levels are adjusted during night time.

2 VOLUME Up/Down

Raises or lowers the sound volume on your television.



Press INPUT to switch the input of the chosen device. If you have more than one device connected to your TV/HDR Combo, you may have to scroll through several inputs to find the one that corresponds to the device you want to see on the screen.

(24) ENTER

Use the ENTER button on the TV/HDR Combo remote control after entering the appropriate channel number. If you press the ENTER button after selecting a show from the Channel Guide, it displays the popup menu.

(25) SLEEP

Turns off the TV/HDR Combo automatically. You can set 30 min., 60 min., or 90 min.

(26) REPLAY GUIDE

Displays the Replay Guide, a menu of the shows that has recorded for you.

SELECT

Use to choose options from a selected menu or guide.

(28) MENU

Displays the main menu.

29 EXIT

Exit a selected device's on-screen menu or guide.

QUICKSKIP Skips forward 30 seconds in a recorded show, allowing you to jump ahead through unwanted parts of the show. Also works for a live broadcast if you have used the STOP, PAUSE, or REW buttons.

(31) FF

Fast-forwarding the recorded or delayed show.

(32) PLAY/SLOW

Begins Playback after using PAUSE, REW, FF, or STOP. And, begins Slow playback in Playback mode.

(33) ACTION

Displays the SET UP TV menu.

PAUSE

Becomes Pause mode after using REW, FF, or PLAY.

Specifications and Resetting

Specifications

Display Picture Tube

<u>General</u>

Operating voltage Power Consumption

Television System Speaker Operating Temperature Operating Humidity

<u>Tune</u>r

Broadcast Channels CABLE Channels 27 inch measured diagonally 100° deflection Picture Tube

120VAC 60Hz 153 W (Power On) 16 W (Power Off) EIA Standard NTSC color 2 pieces 5°C ~ 35°C (41°F ~ 95°F) 10% ~ 75%

VHF 2~13, UHF 14~69 Midband A through I (14~22) Superband J through W (23~36) Hyperband AA~EEE (37~64) Lowband A-5~A-1 (95~99) Special CABLE channel 5A (01) Ultraband 65~94, 100~125

Input Connectors

Tuner Audio/Video S-Video Type F Rear 2, Front 1 Rear 1

Output Connectors

Audio/VideoRear 1TelephoneRJ-11, 2wireSerial ControlDB-9IR BlasterRear 1PhonesFront 1

Dimensions/Weight

Height	653 mm
Width	688 mm
Depth	550 mm
Weight (net)	40.5 kg

Record

HDD Capacity 30.4GB Video compression format MPEG2 Audio compression format MPEG1 layer2 Recording level Extended/Medium/High Recording time 30H/15H/10H*

<u>MODEM</u>

Speed

56kbps

* Actual available recording time is not maximum because the "Welcome Video" is already recorded in the Replay Guide. To make the most of the available recording time, delete the welcome video from the Replay Guide or save it to a videotape. (For saving, see page 31.)

Resetting TV/HDR Combo

If the TV/HDR Combo does not respond when you press the buttons on the remote, press and hold INPUT and CH▼ on the front of the TV/HDR Combo for 10 seconds, then release. The TV/HDR Combo will restart in a few moments.

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PRODUCT INFORMATION OPERATION ASSISTANCED LITERATURE REQUEST DEALER LOCATIONS

For all Customer Service Inquires please call: **1-888-843-9788** Monday – Friday 9am-9pm EST, Saturday-Sunday 9am-7pm EST (including Holidays).

PANASONIC WEB SITE

http://www.panasonic.com/video

You can purchase parts and accessories by visiting our Web Site

PRODUCT SUPPORT – PRODUCT REPAIR

Should you require assistance with installation, operating information, or service for your TV-HDR Combo, Please contact the Panasonic Customer Call Center at:

1-888-843-9788

Monday - Friday 9am-9pm EST, Saturday-Sunday 9am-7pm EST (including Holidays).

PRODUCT-SUPPORT - ACCESSORIES

For Accessory Purchases (Customer Orders Only) Please Call:

1-800-332-5368

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3878 Ruffin Road Suite A San Diego, CA 92123

COLORADO 1640 South Abilene Street Suite D Aurora, CO 80012 FLORIDA 3700 North 29th Avenue Suite 102 Hollywood, FL 33020

GEORGIA 8655 Roswell Road Suite 100 Atlanta, GA 30350

ILLINOIS 9060 Golf Road Niles, IL 60714

1703 North Randall Road Elgin, IL 60123 (Pick-up / Drop-off only)

MARYLAND 62 Mountain Road Glen Burnie, MD 21061 MASSACHUSETTS 60 Glacier Drive Suite G Westwood, MA 02090

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As of May 2000

Panasonic Consumer Electronics Company, Division of Matsushita Electric Corporation of America One Panasonic Way Secaucus, New Jersey 07094

Printed in U.S.A. LSQT0288A

