

Color Television
27PT31B1

Instructions for use



Let's make things better.



PHILIPS

Return your Warranty Registration card today to ensure you receive all the benefits you're entitled to.

Once your PHILIPS purchase is registered, you're eligible to receive all the privileges of owning a PHILIPS product. So complete and return the Warranty Registration Card enclosed with your purchase at once. And take advantage of these important benefits.

Warranty Verification

Registering your product within 10 days confirms your right to maximum protection under the terms and conditions of your PHILIPS warranty.

Owner Confirmation

Your completed Warranty Registration Card serves as verification of ownership in the event of product theft or loss.

Model Registration

Returning your Warranty Registration Card right away guarantees you'll receive all the information and special offers which you qualify for as the owner of your model.



Congratulations on your purchase, and welcome to the "family!"

PHILIPS

Dear PHILIPS product owner:

Thank you for your confidence in PHILIPS. You've selected one of the best-built, best-backed products available today. And we'll do everything in our power to keep you happy with your purchase for many years to come.

As a member of the PHILIPS "family," you're entitled to protection by one of the most comprehensive warranties and outstanding service networks in the industry.

What's more, your purchase guarantees you'll receive all the information and special offers for which you qualify, plus easy access to accessories from our convenient home shopping network.

And most importantly you can count on our uncompromising commitment to your total satisfaction. All of this is our way of saying welcome—and thanks for investing in a PHILIPS product.

Sincerely,

Robert Minkhorst
President and Chief Executive Officer

P.S. Remember, to get the most from your PHILIPS product, you must return your Warranty Registration Card within 10 days. So please mail it to us right now!

Know these safety symbols



⚡ This "bolt of lightning" indicates uninsulated material within your unit may cause an electrical shock. For the safety of everyone in your household, please do not remove product covering.

⚠ The "exclamation point" calls attention to features for which you should read the enclosed literature closely to prevent operating and maintenance 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, and fully insert.

ATTENTION: Pour éviter les chocs électriques, introduire la lame la plus large de la fiche dans la borne correspondante de la prise et pousser jusqu'au fond.

PHILIPS Visit our World Wide Web Site at <http://www.philipsusa.com>

SAFETY INSTRUCTIONS - Read before operating equipment

This product was designed and manufactured to meet strict quality and safety standards. There are, however, some installation and operation precautions which you should be particularly aware of.

1. **Read Instructions** - All the safety and operating instructions should be read before the appliance is operated.
2. **Retain Instructions** - The safety and operating instructions should be retained for future reference.
3. **Heed Warnings** - All warnings on the appliance and in the operating instructions should be adhered to.
4. **Follow Instructions** - All operating and use instructions should be followed.
5. **Water and Moisture** - The appliance should not be used near water - for example, near a bathtub, washbowl, kitchen sink, laundry tub, in a wet basement or near a swimming pool, etc.
6. **Carts and Stands** - The appliance should be used only with a cart or stand that is recommended by the manufacturer.
- 6A.  An appliance and cart combination should be moved with care. Quick stops, excessive force, and uneven surfaces may cause the appliance and cart combination to overturn.
- 6B. **Tilt/Stability** - All televisions must comply with recommended international global safety standards for tilt and stability properties of its cabinet design.
 - Do not compromise these design standards by applying excessive pull force to the front, or top, of the cabinet which could ultimately overturn the product.
 - Also, do not endanger yourself, or children, by placing electronic equipment/toys on the top of the cabinet. Such items could unsuspectingly fall from the top of the set and cause product damage and/or personal injury.
7. **Wall or Ceiling Mounting** - The appliance should be mounted to a wall or ceiling only as recommended by the manufacturer.
8. **Ventilation** - The appliance should be situated so that its location or position does not interfere with its proper ventilation. For example, the appliance should not be situated on a bed, sofa, rug, or similar surface that may block the ventilation openings; or, placed in a built-in installation, such as a bookcase or cabinet that may impede the flow of air through the ventilation openings.
9. **Heat** - The appliance should be situated away from heat sources such as radiators, heat registers, stoves, or other appliances (including amplifiers) that produce heat.
10. **Power Sources** - The appliance should be connected to a power supply only of the type described in the operating instructions or as marked on the appliance.

11. **Power-Cord Protection** - Power supply cords should be routed so that they are not likely to be walked on or pinched by items placed upon or against them, paying particular attention to cords and plugs, convenience receptacles, and the point where they exit from the appliance.
12. **Cleaning** - The appliance should be cleaned only as recommended by the manufacturer.
13. **Power Lines** - An outdoor antenna should be located away from power lines.
14. **Outdoor Antenna Grounding** - If an outside antenna is connected to the receiver, be sure the antenna system is grounded so as to provide some protection against voltage surges and built up static charges.

Section 810 of the National Electric Code, ANSI/NFPA No. 70-1984, provides information with respect to proper grounding of the masts and supporting structure grounding of the lead-in wire to an antenna discharge unit, size of grounding connectors, location of antenna-discharge unit, connection to grounding electrodes and requirements for the grounding electrode. See Fig. below.
15. **Non-use Periods** - The power cord of the appliance should be unplugged from the outlet when left unused for a long period of time.
16. **Object and Liquid Entry** - Care should be taken so that objects do not fall and liquids are not spilled into the enclosure through openings.
17. **Damage Requiring Service** - The appliance should be serviced by qualified service personnel when:
 - A. The power supply cord or the plug has been damaged; or
 - B. Objects have fallen, or liquid has been spilled into the appliance; or
 - C. The appliance has been exposed to rain; or
 - D. The appliance does not appear to operate normally or exhibits a marked change in performance; or
 - E. The appliance has been dropped, or the enclosure damaged.
18. **Servicing** - The user should not attempt to service the appliance beyond that described in the operating instructions. All other servicing should be referred to qualified service personnel.

Note to the CATV system installer: This reminder is provided to call the CATV system installer's attention to Article 820-40 of the NEC that provides guidelines for proper grounding and, in particular, specifies that the cable ground shall be connected to the grounding system of the building, as close to the point of cable entry as practical.

Example of Antenna Grounding as per NEC - National Electric Code

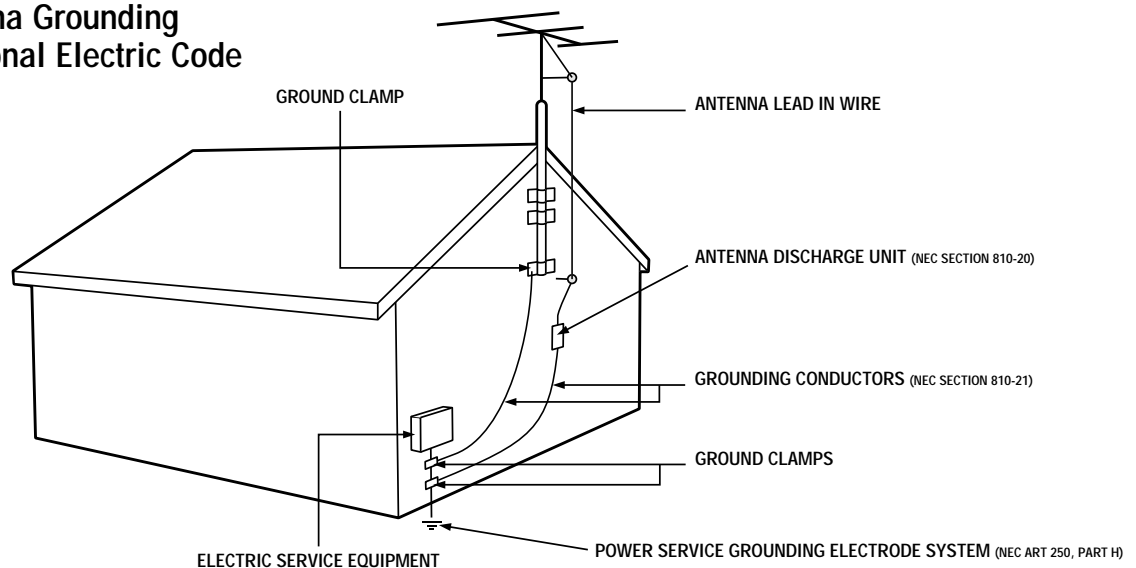


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NOTE: This owner's manual is used with several different television models. Not all features (and drawings) discussed in this manual will necessarily match those found with your television system. This is normal and does not require that you contact your dealer or request service.

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FEATURES

Audio/Video Jack Panel allows direct connections with VCRs, DVDs, or other devices, providing quality TV picture and sound playback.

Audio Volume Leveler (AVL) Control keeps the TV sound at an even level. Peaks and valleys that occur during program changes or commercial breaks are reduced, making for a more consistent, comfortable sound.

AutoChron™ automatically sets the right time of day and maintains it with digital precision through brownouts, power failures, and even Daylight Savings Time adjustments.

AutoLock™ allows you to block the viewing of certain channels or programs with certain ratings if you do not want your children to view inappropriate materials.

Auto Programming scans (when activated) for all available channels from regular antenna or cable signals and stores only active broadcast stations in the TV's memory.

AutoPicture™ allows you to change the picture settings (color, tint, contrast, etc.) for various types of programming, such as sports, movies, multimedia (games), or weak signals with the push of one button.

AutoSound™ allows you to select from three factory-set controls and a personal control that you set according to your own preferences through the onscreen Sound menu. The three factory-set controls (Voice, Music, and Theatre) enable you to tailor the TV sound so as to enhance the particular programming you are watching.

Channel Edit allows you to add or delete channels from the list stored in the TV's memory. Channel Edit makes it easy to limit or expand the number of channels that are available to you when you press the Channel (+) or (-) buttons on your remote control.

Closed Captioning allows the viewer to read TV program dialogue or voice conversations as onscreen text.

ImageMax™ helps you sharpen the picture quality by making dark portions of the picture darker and light portions brighter.

Infrared Remote Control works your TV and other remote-controlled devices, such as VCRs, DVD players, cable converters, and satellite receivers.

Onscreen Menu shows helpful messages and instructions for setting TV feature controls (can be viewed in English, French, or Spanish).

Sleep Timer automatically turns the TV OFF after a set amount of time that you choose.

Standard Broadcast (VHF/UHF) or Cable TV (CATV) channel capability allows for viewing by antenna or cable.

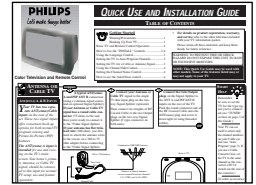
Stereo capability, including a built-in audio amplifier and twin-speaker system, allows for the reception of TV programs broadcast in stereo sound.

Surf Button allows you to easily switch among only the channels that are of interest to you (the ones that you have programmed into the TV's Surf control through the onscreen menu).

Timer allows you to set your TV to turn itself ON and OFF once or daily like an alarm clock.

QUICK USE AND INSTALLATION GUIDE

Use the simple *Quick Use and Installation Guide* (supplied with your TV information packet) for details on:



- Cable/Antenna Hookups
- Automatic Channel Programming
- Channel Editing
- Setting the TV's Clock Automatically (AutoChron™)
- Basic Operation of the TV and Remote Control
- Selection of the Onscreen Menu Language

END-OF-LIFE DISPOSAL

Your new television and its packing contain materials that can be recycled and reused. Specialized companies can recycle your product to increase the amount of reusable materials and minimize the amounts that need to be properly disposed.

Your product also uses batteries that should not be thrown away when depleted, but should be handed in and disposed of as small chemical waste.

When you replace your existing equipment, please find out about the local regulations regarding disposal of your old television, batteries, and packing materials.


ADJUSTING THE PICTURE

To adjust your TV picture controls, select a channel and follow these steps.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu. PICTURE will be highlighted.
- 2 Press the **CURSOR RIGHT** button and the menu will shift to the left. BRIGHTNESS will be highlighted and an adjustment bar will be shown to the right.
- 3 Use the **CURSOR LEFT** or **CURSOR RIGHT** button to adjust the BRIGHTNESS level of the picture.
- 4 After adjusting the BRIGHTNESS control, press the **CURSOR DOWN** button to select another picture adjustment: COLOR, PICTURE, SHARPNESS, TINT, OR COLOR TEMP. Press the **CURSOR LEFT** or **CURSOR RIGHT** button to adjust the selected control.
- 5 Press the **STATUS/EXIT** button to remove the menu from the screen.



Remember, when the bar scale is centered , the control settings are at normal, mid-range levels. Picture adjustments are described here.

BRIGHTNESS – adds or subtracts light from the darkest part of the picture.

COLOR – adds or eliminates color.

PICTURE – improves the detail of the lightest parts of the picture.

SHARPNESS – improves the detail in the picture.

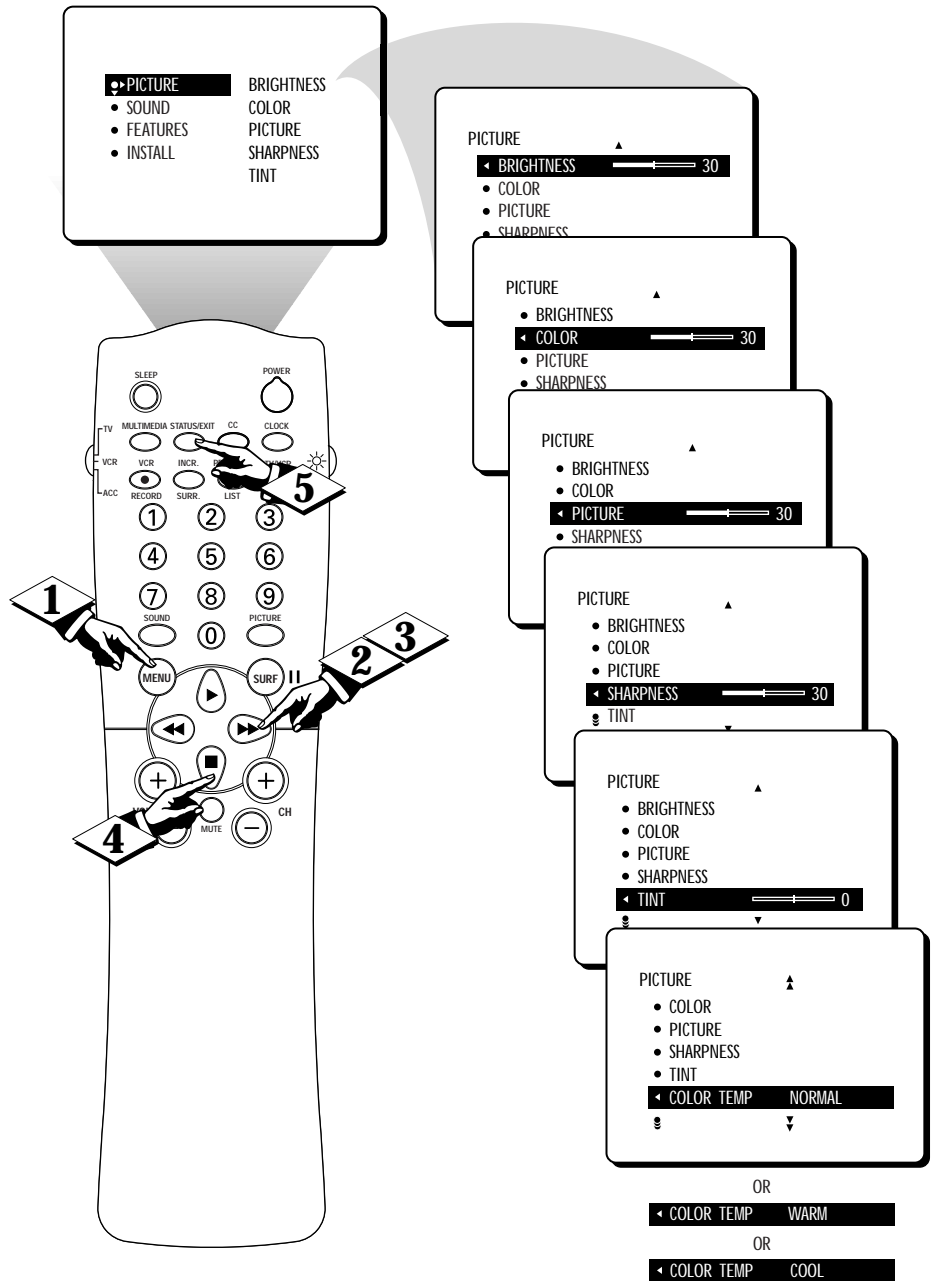
TINT – adjusts the picture to obtain natural skin tones.

COLOR TEMP offers NORMAL, COOL, or WARM picture preferences.

NORMAL – keeps whites, white.

COOL – makes whites, bluish.

WARM – makes whites, reddish.

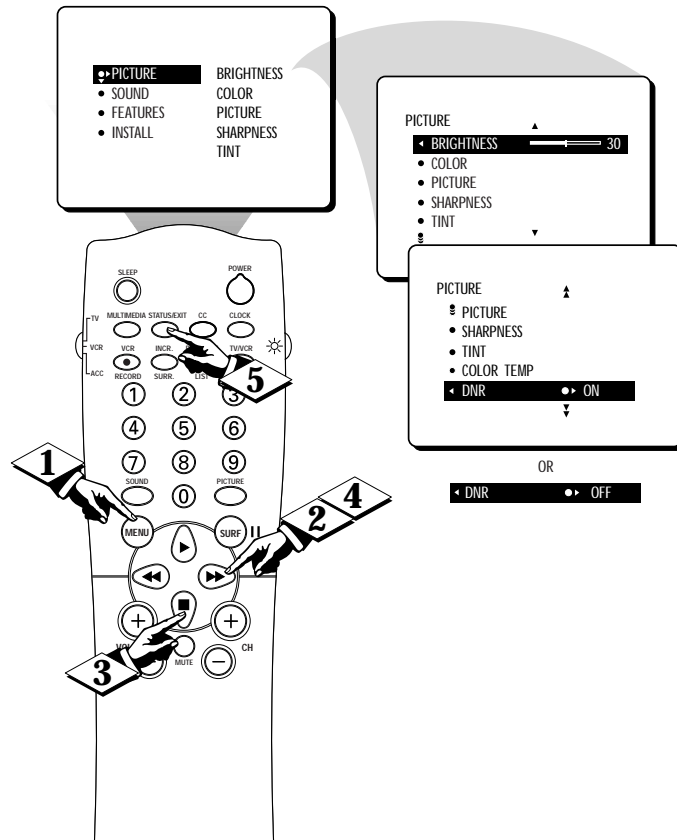


TURNING ON THE DYNAMIC NOISE REDUCTION CONTROL

Due to many reasons, such as poor cable reception, the picture can sometimes appear slightly "speckled" (an indication of signal noise in the picture). The DNR (Dynamic Noise Reduction) control can help eliminate this type of interference and improve the quality of the picture.

BEGIN

- 1 Press the **MENU** button on the remote to show the onscreen menu. PICTURE will be highlighted.
- 2 Press the **CURSOR RIGHT** button and the menu will shift to the left. BRIGHTNESS will be highlighted.
- 3 Press the **CURSOR DOWN** button repeatedly until the DNR control is highlighted.
- 4 Press the **CURSOR RIGHT** button to switch DNR ON or press the **CURSOR LEFT** button to switch DNR OFF.
- 5 Press the **STATUS/EXIT** button to remove the menu from the screen.

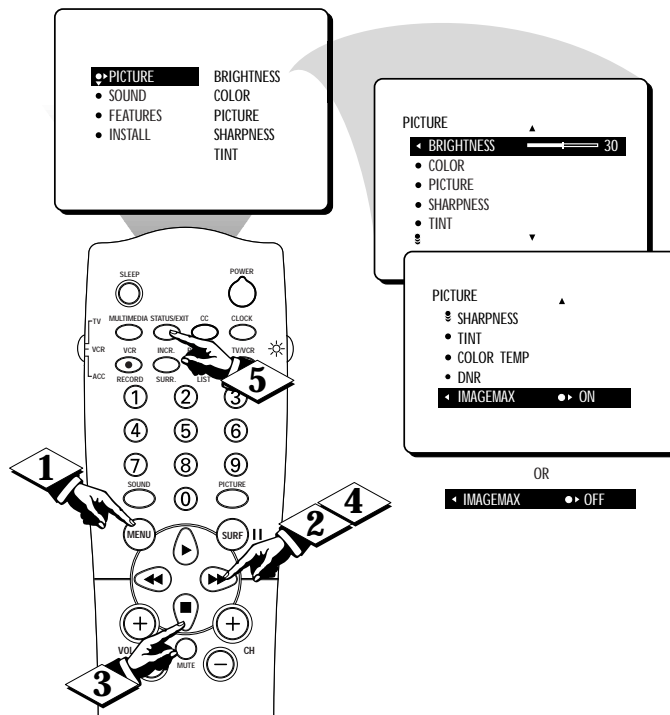


TURNING ON THE IMAGE MAX™ CONTROL

ImageMax™ helps you sharpen the picture quality by making dark portions of the picture darker and light portions of the picture brighter. Follow these steps to turn ImageMax™ ON.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu. PICTURE will be highlighted.
- 2 Press the **CURSOR RIGHT** button and the menu will shift to the left. BRIGHTNESS will be highlighted.
- 3 Press the **CURSOR DOWN** button repeatedly until the IMAGEMAX control is highlighted.
- 4 Press the **CURSOR RIGHT** button to switch between ON and OFF.
- 5 Press the **STATUS/EXIT** button to remove the menu from the screen.



SELECTING THE SCREEN FORMAT SIZE



You can change the screen format size to match the type of program you're watching. Select the normal 4:3 aspect ratio or expand the 4:3 aspect ratio to completely fill the screen. There also is a compressed 16:9 aspect ratio, which allows movies to be viewed in their full width (known as letter-box style).

BEGIN

- 1 Press the **MENU** button on the remote control to show the on-screen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left.
- 4 Press the **CURSOR DOWN** button repeatedly until the **FORMAT** control is highlighted.
- 5 Press the **CURSOR RIGHT** button repeatedly to toggle among the three screen format sizes – 4:3, **EXPAND 4:3**, or **COMPRESS 16:9**.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.



SMART HELP



Without the onscreen menu display showing, you also can press the **CURSOR UP** or **CURSOR DOWN** button on the remote control to toggle among the screen sizes 4:3, **Expand 4:3**, or **Compress 16:9**.

- PICTURE
- SOUND
- **FEATURES**
- INSTALL

- TIMER
- AutoLock
- CLOSED CAP
- FORMAT
- BLUE MUTE

FEATURES

- **TIMER**
- AutoLock
- CLOSED CAP
- FORMAT
- BLUE MUTE
-

- TIME
- START TIME
- STOP TIME
- CHANNEL
- ACTIVATE

FEATURES

- TIMER
- AutoLock
- CLOSED CAP
- **FORMAT**
- BLUE MUTE
-

OR

◀ FORMAT ▶ 4:3

OR

◀ FORMAT ▶ EXPAND 4:3

OR

◀ FORMAT ▶ COMPRESS 16:9

◀ FORMAT ▶ 4:3

◀ FORMAT ▶ EXPAND 4:3

◀ FORMAT ▶ COMPRESS 16:9

ACTIVATING THE BLUE MUTE CONTROL

The Blue Mute feature will eliminate annoying snow from the screen when no video signal is present by displaying a pleasant blue screen. This occurs in cases such as when a VCR tape is removed or an antenna signal is broken. To turn the Blue Mute feature ON or OFF, follow the steps below.

BEGIN

- 1 Press the **MENU** button on the remote control to show the on-screen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight FEATURES.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left.
- 4 Press the **CURSOR DOWN** button repeatedly until the BLUE MUTE control is highlighted.
- 5 Press the **CURSOR RIGHT** button repeatedly to toggle the Blue Mute option ON or OFF.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.

STOP

- PICTURE
- SOUND
- **FEATURES**
- INSTALL

- TIMER
- AutoLock
- CLOSED CAP
- FORMAT
- BLUE MUTE

FEATURES

- **TIMER**
- AutoLock
- CLOSED CAP
- FORMAT
- BLUE MUTE

- TIME
- START TIME
- STOP TIME
- CHANNEL
- ACTIVATE

FEATURES

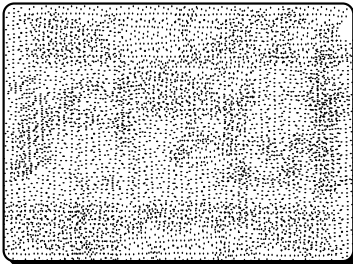
- TIMER
- AutoLock
- CLOSED CAP
- FORMAT
- **BLUE MUTE** **OFF**

OR


FEATURES

- TIMER
- AutoLock
- CLOSED CAP
- FORMAT
- **BLUE MUTE** **ON**

BLUE MUTE OFF
-with no video signal; screen is snowing looking.



BLUE MUTE ON
-with no video signal; screen is a pleasant blue color.



USING THE SLEEP TIMER



Have you ever fallen asleep in front of the TV, only to have it wake you up at two in the morning with a test pattern sound screeching in your ears? Well, your TV can enable you to avoid that discomfort by automatically turning itself off. With the Sleep Timer feature, you can set a timer to automatically switch the TV OFF after a period of time you choose (15-minute increments up to 60 minutes, then 30-minute increments up to 90 minutes, then 60-minute increments up to 240 minutes).

BEGIN

- 1 Press the **SLEEP** button on the remote control. The **SLEEP** timer onscreen display will appear in the upper part of the screen.
- 2 Within five seconds, press the **SLEEP** button repeatedly to pick the amount of time (15-minute increments up to 60 minutes, then 30-minute increments up to 90 minutes, then 60-minute increments up to 240 minutes) before the TV will turn itself off.

An onscreen countdown will appear during the last minute before the TV shuts itself off.



SMART HELP



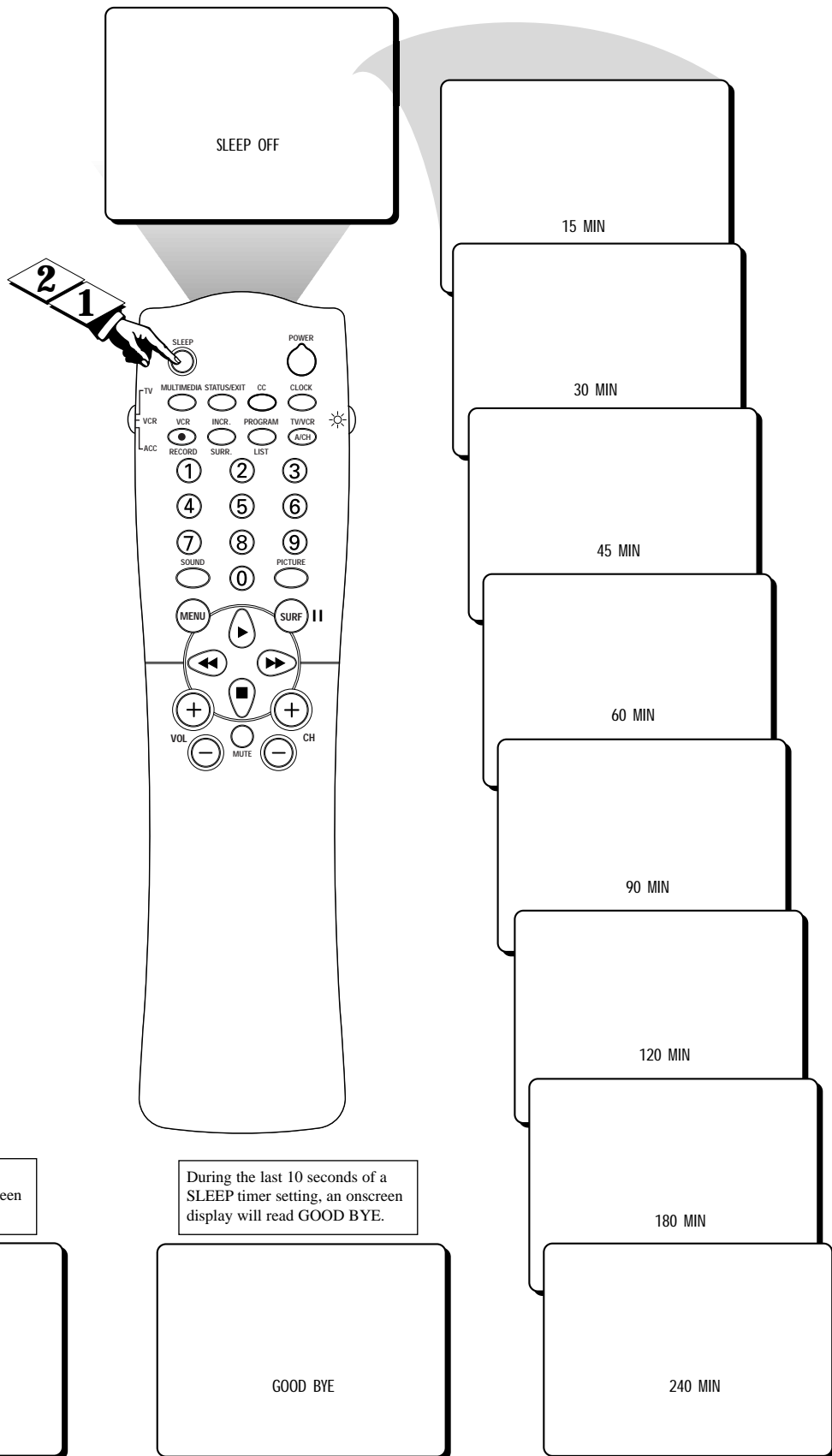
To see how many minutes remain before the TV shuts itself off, press the **STATUS/EXIT** button.

During the last minute of a SLEEP timer setting, an onscreen countdown will be displayed.

50 SEC

During the last 10 seconds of a SLEEP timer setting, an onscreen display will read GOOD BYE.

GOOD BYE



THE TIMER – SETTING THE CLOCK

Your television comes with an on-screen clock. During normal operation, the clock appears on the screen when the STATUS/EXIT button is pressed or if the TIMER DISPLAY control is turned ON.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 With **TIMER** selected, press the **CURSOR RIGHT** button again to shift the display left and highlight the **TIME** control.
- 5 Press the **CURSOR RIGHT** button again to highlight the time indicator area.
- 6 Press the **CURSOR LEFT** or **CURSOR RIGHT** button to select the position or digit you wish to enter.
- 7 Press the **CURSOR UP** or **CURSOR DOWN** button to select the digits for the time. Or press the **NUMBERED** buttons to enter the correct time.
- 8 Press the **CURSOR RIGHT** button to move to the AM or PM position.
- 9 Press the **CURSOR UP** or **DOWN** button to set AM or PM.
- 10 Press the **STATUS/EXIT** button to remove the menu from the screen.

STOP

SMART HELP



Remember, be sure to press **0** first and then the hour number for single-digit entries.

The Clock also can be set automatically using the AutoChron™ feature found on page 4 of the *Quick Use and Installation Guide* that came with your television.

The TV's clock settings may be lost when the TV is unplugged (or when AC power to the set is interrupted).

- PICTURE
- SOUND
- **FEATURES**
- INSTALL

TIMER
AutoLock
CLOSED CAP
FORMAT
BLUE MUTE

FEATURES
TIMER

- **TIMER**
- AutoLock
- CLOSED CAP
- FORMAT
- BLUE MUTE

TIME
START TIME
STOP TIME
CHANNEL
TUNER MODE

FEATURES
TIMER

← TIME → AM

- START TIME
- STOP TIME
- CHANNEL
- ACTIVATE

FEATURES
TIMER

← TIME → 10:30 AM

- START TIME
- STOP TIME
- CHANNEL
- ACTIVATE

NOTE: The TIME (Clock) feature can be accessed directly by pressing the **CLOCK** button on the remote control, and then by simply following steps 5 through 10 to complete the task.

FEATURES
TIMER

- **TIME**
- START TIME
- STOP TIME
- CHANNEL
- TUNER MODE

← TIME → AM

THE TIMER – SETTING THE START TIME

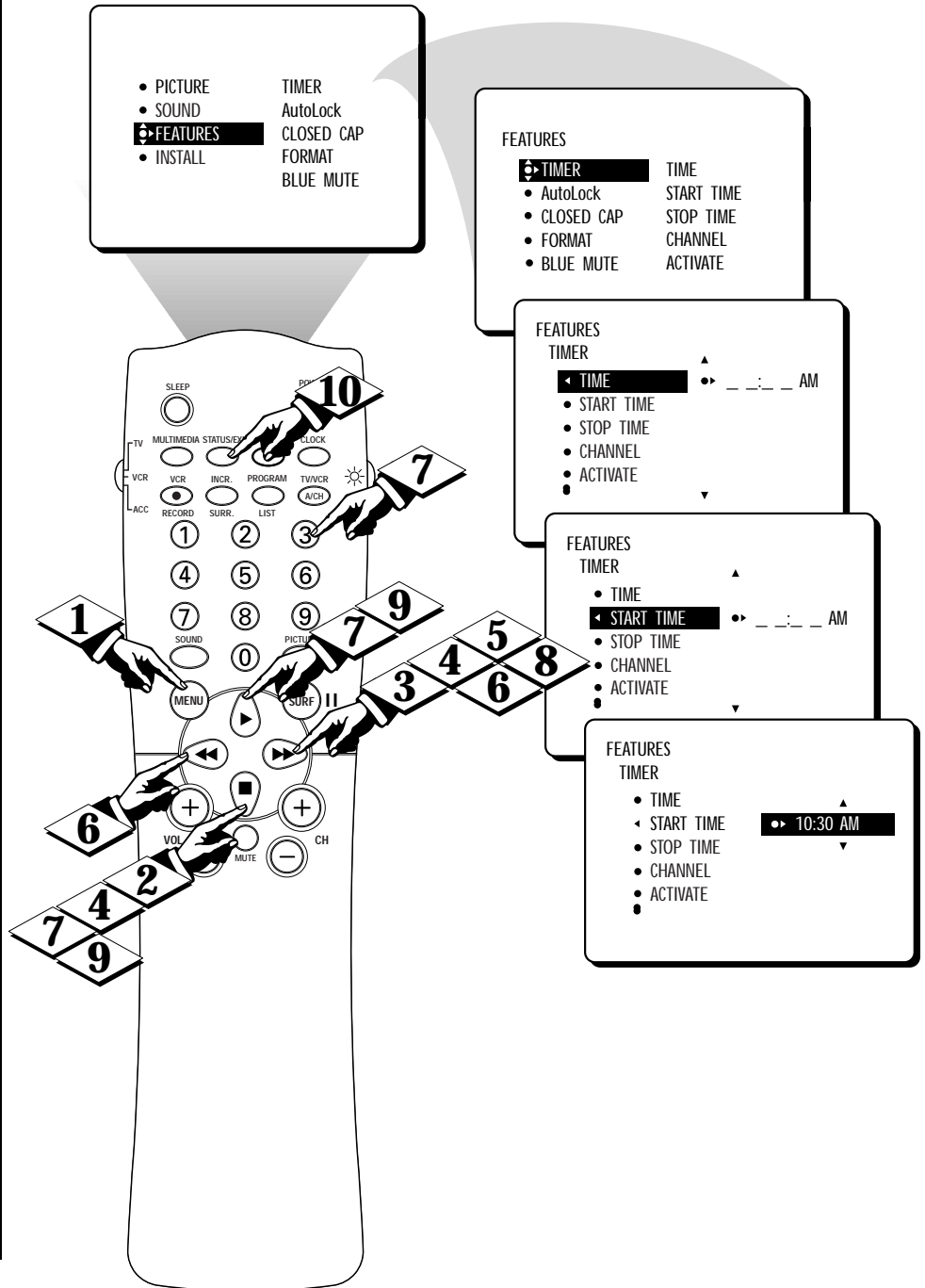


Just as you would an alarm clock, you can set the TV to turn itself ON once or at the same time every day. Follow these steps to set the Start Time.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight FEATURES.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 Press the **CURSOR RIGHT** button again to shift the display left. Then press the **CURSOR DOWN** button once to highlight the **START TIME** control.
- 5 Press the **CURSOR RIGHT** button again to highlight the time indicator area.
- 6 Press the **CURSOR RIGHT** or **CURSOR LEFT** button to move among the positions where the time is input.
- 7 Press the **CURSOR UP** or **CURSOR DOWN** button to select the digits for the time. Or press the **NUMBERED** buttons to enter the correct time.
- 8 Press the **CURSOR RIGHT** button to move to the AM or PM position.
- 9 Press the **CURSOR UP** or **CURSOR DOWN** button to set AM or PM.
- 10 Press the **STATUS/EXIT** button to remove the menu from the screen.

STOP



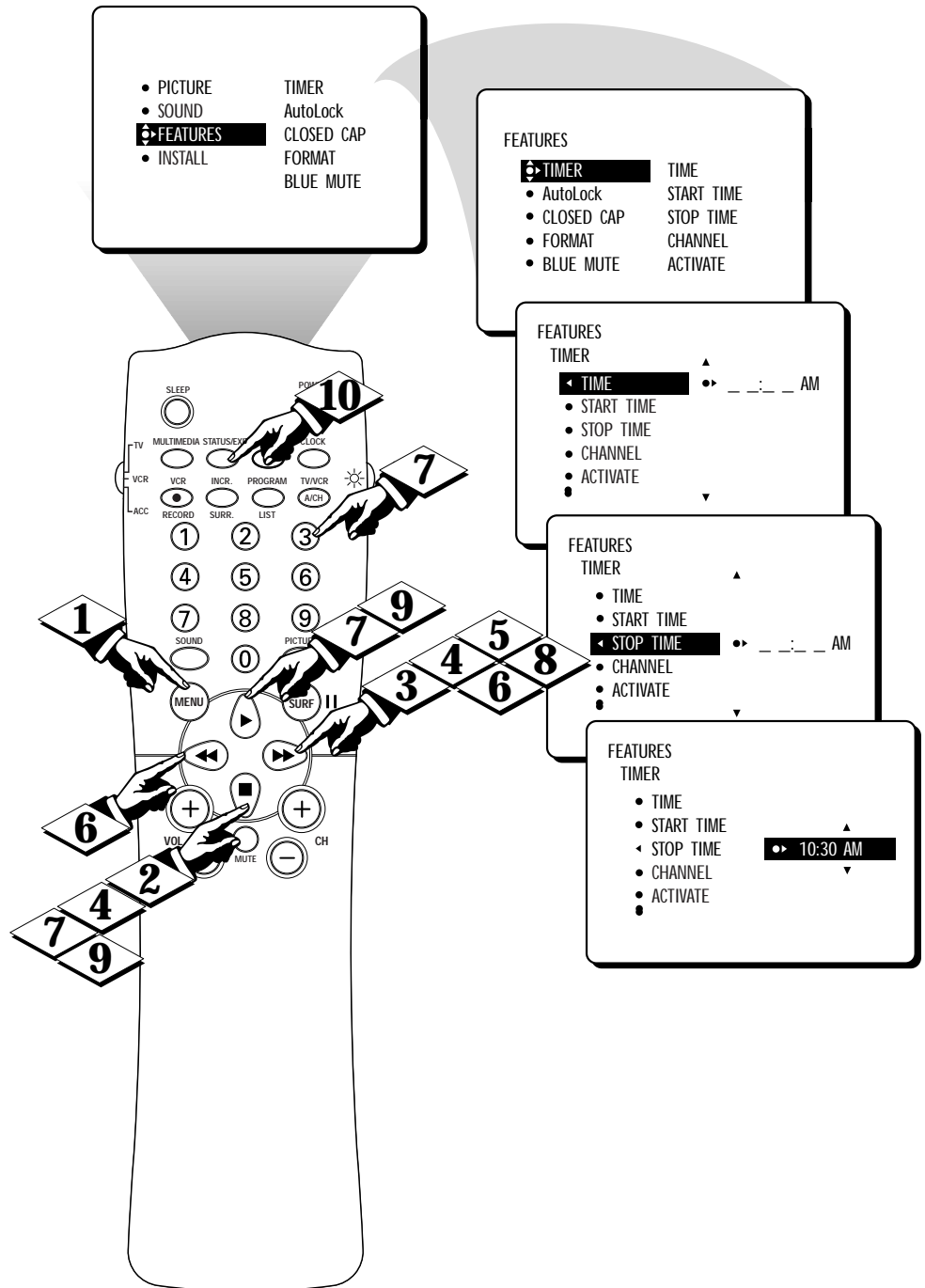
THE TIMER – SETTING THE STOP TIME

Use the **START TIME** control to set the TV to turn itself ON once or at the same time every day (see page 13 for details). The following steps will guide you in setting the TV to turn itself OFF once or at the same time every day.

(BEGIN)

- 1 Press the **MENU** button on the remote control to show the on-screen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 Press the **CURSOR RIGHT** button again to shift the display left. Then press the **CURSOR DOWN** button once twice to highlight the **STOP TIME** control.
- 5 Press the **CURSOR RIGHT** button again to highlight the time indicator area.
- 6 Press the **CURSOR RIGHT** or **CURSOR LEFT** button to move among the positions where the time is input.
- 7 Press the **CURSOR UP** or **CURSOR DOWN** button to select the digits for the time. Or press the **NUMBERED** buttons to enter the correct time.
- 8 Press the **CURSOR RIGHT** button to move to the AM or PM position.
- 9 Press the **CURSOR UP** or **CURSOR DOWN** button to set AM or PM.
- 10 Press the **STATUS/EXIT** button to remove the menu from the screen.

STOP

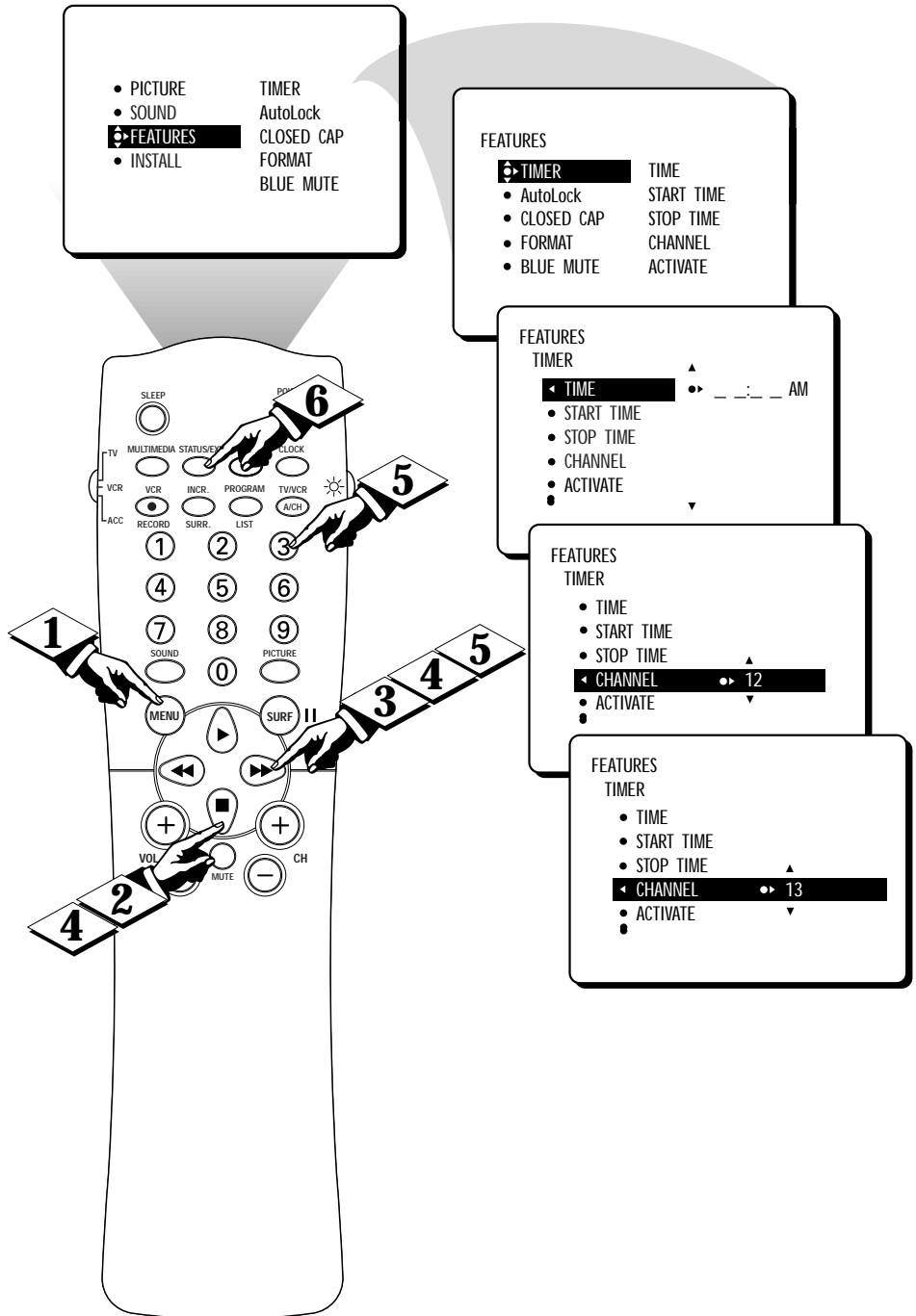


THE TIMER – SELECTING THE CHANNEL

You can select a specific channel that the television will tune to when the timer turns the set ON. Follow these steps to select the channel.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEA-TURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 Press the **CURSOR RIGHT** button again to shift the menu to the left. Then press the **CURSOR DOWN** button repeatedly until the **CHANNEL** control is highlighted.
- 5 Press the **NUMBERED** buttons to enter the desired start-up channel. Or, press the **CURSOR RIGHT** button repeatedly to enter the start-up channel you want.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.



THE TIMER – SETTING ACTIVATE TO ON OR OFF

After you have set the Time, Start Time, Stop Time, and Start Channel, the timer must be set to come on ONCE or DAILY, or turned OFF through the ACTIVATE control.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight FEATURES.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 Press the **CURSOR RIGHT** button again to shift the display to the left. Then press the **CURSOR DOWN** button repeatedly until the **ACTIVATE** control is highlighted.
- 5 Press the **CURSOR RIGHT** button again to set **ACTIVATE** to ONCE; press the **CURSOR RIGHT** button again for DAILY; and press the **CURSOR RIGHT** button again to toggle **ACTIVATE** to OFF.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.

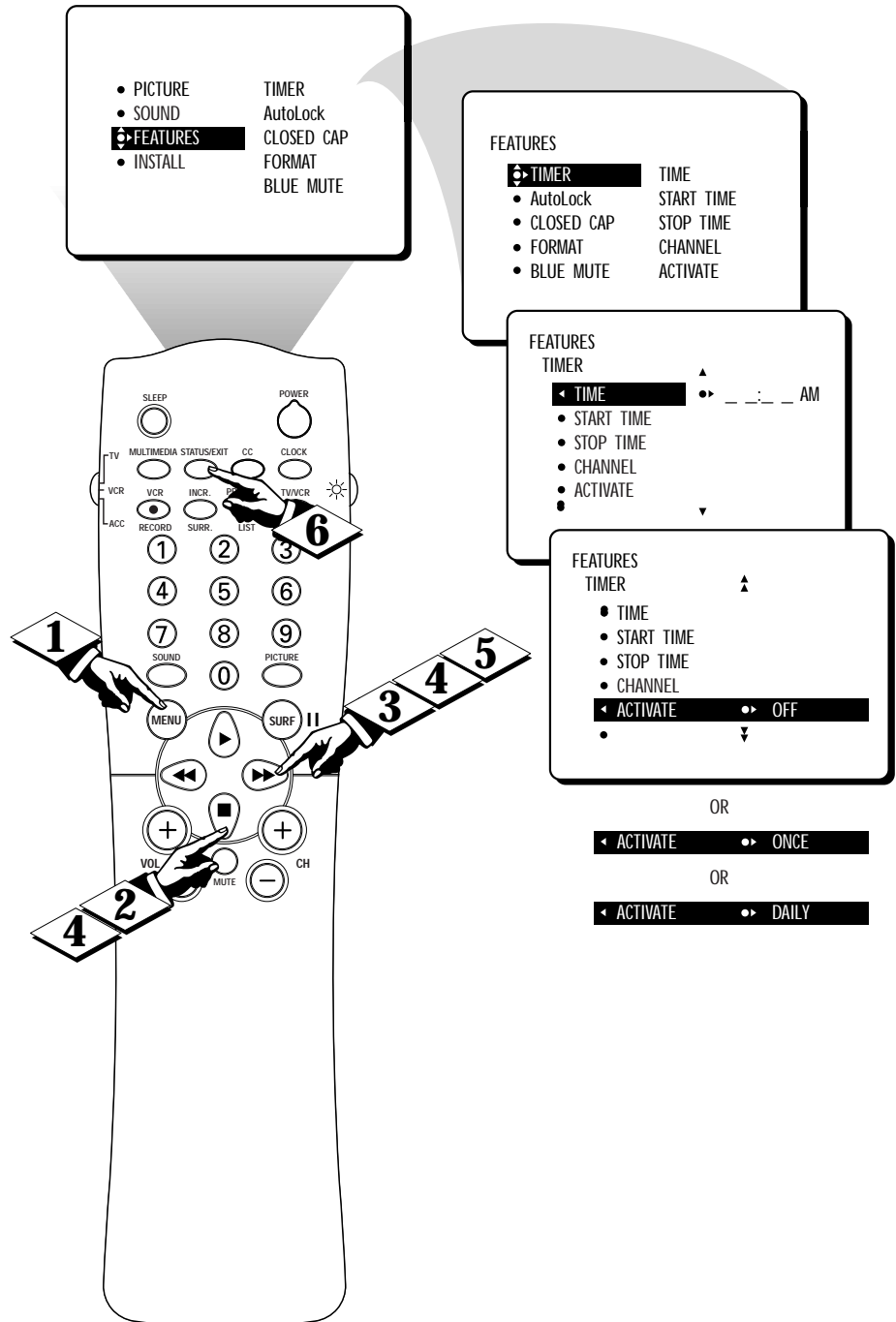


SMART HELP



Remember, before setting the **TIMER** controls, the TV's clock must be set to the correct time manually (see page 12) or by using the AutoChron™ feature described on page 4 of the *Quick Use and Installation Guide*.

Try it! After following the steps on pages 12-17, use your TV as an alarm clock.



THE TIMER – TURNING ON THE TIMER DISPLAY



After the TV's clock has been set, you can use your TV as a clock. The **TIMER DISPLAY** control allows you to permanently display the time in the upper right corner of the screen.

BEGIN

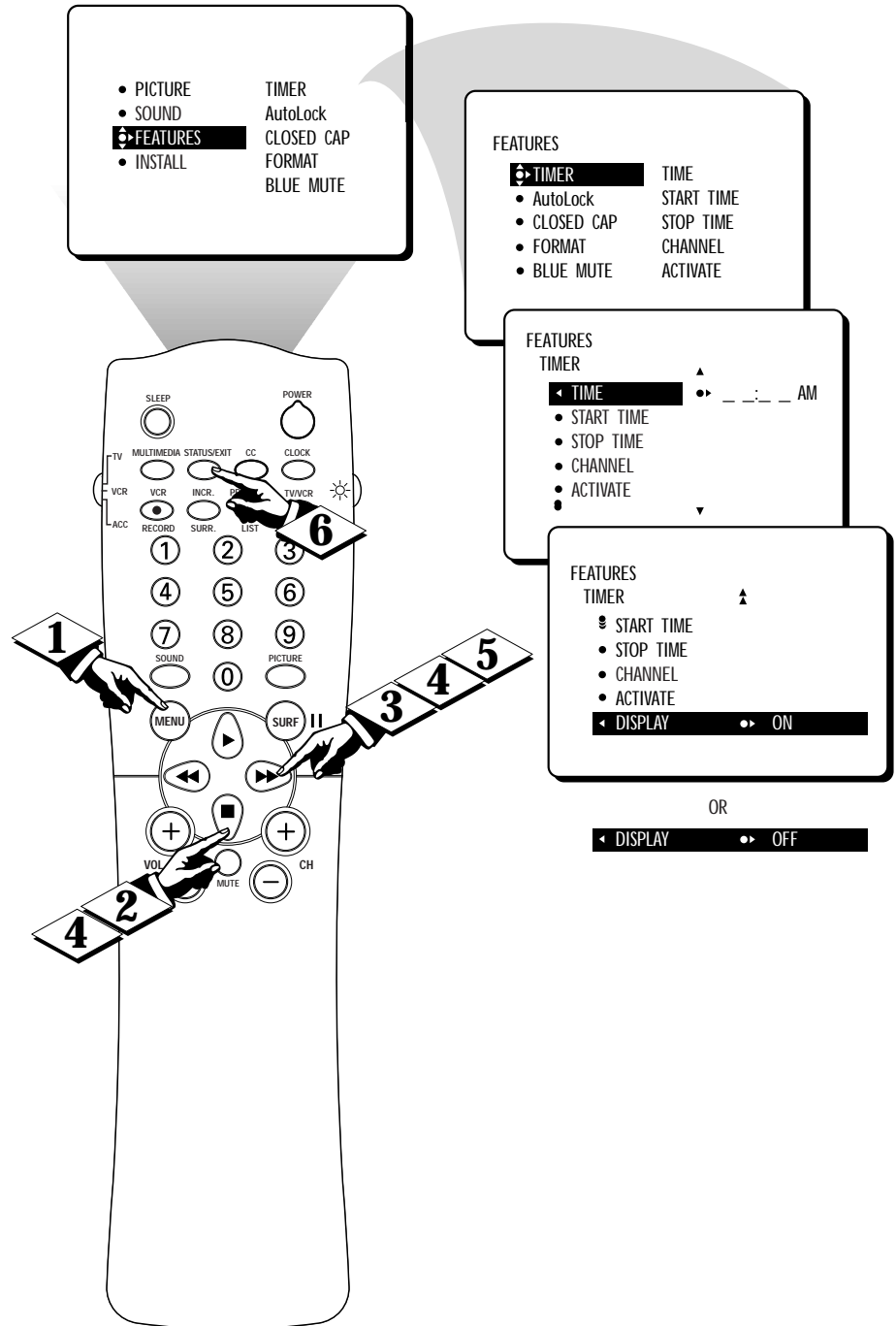
- 1 Press the **MENU** button on the remote to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TIMER** will be highlighted.
- 4 Press the **CURSOR RIGHT** button again to shift the menu left. Then press the **CURSOR DOWN** button repeatedly until the **DISPLAY** control is highlighted.
- 5 Press the **CURSOR RIGHT** or **CURSOR LEFT** button to turn the **TIMER DISPLAY** ON or OFF.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.



SMART HELP



Remember, be sure you have set the TV's clock with the correct current time. (Refer to page 12 to set the clock manually or page 4 of the *Quick Use and Installation Guide* to set the clock automatically using the **AutoChron™** feature.)





The AutoLock™ feature receives and processes data sent by broadcasters or other program providers that contain program content advisories. When programmed by the viewer, a TV with AutoLock™ can respond to the content advisories and block program content that may be found objectionable (such as offensive language, violence, sexual situations, etc.). This is a great feature to censor the type of programming children may watch.

In the AutoLock™ section, you'll learn how to block channels and programming that is not rated, is unrated, or has no rating. You will also find out how to turn these blocking features ON or OFF. Following are brief explanations of some terms and ratings related to the AutoLock™ feature.

AutoLock™ offers various Blocking Options from which to choose:

BLOCKING: The BLOCKING control is what can be thought of as the "master switch" for AutoLock™. This control affects the settings you have chosen for blocking programs according to movie ratings or TV ratings, or for blocking programs that have no rating or are unrated. When the BLOCKING control is OFF, the blocking or censoring of programs is disabled. When the BLOCKING control is ON, blocking will occur according to the settings you have chosen.

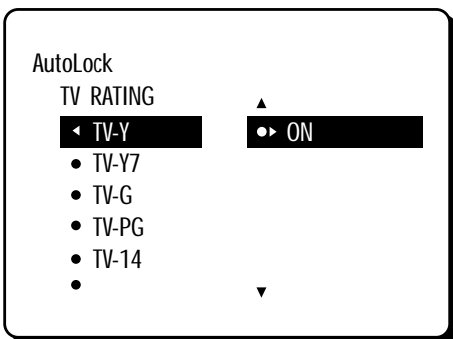
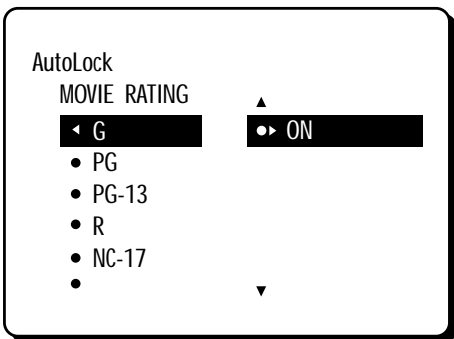
BLOCK UNRATED: ALL unrated programs will be blocked if this feature is set to ON.

UNRATED programming is encoded with information from the MPAA (Motion Picture Association of America) or TV broadcasters, but it does not have a specific rating. In other words, the MPAA or the TV broadcasters have chosen not to assign a rating to the programming.

NO RATING: ALL programming with no content advisory data can be blocked if NO RATING is set to ON.

Programming that has No Rating is not encoded with any rating information from the MPAA or the Parental Guidelines. Any programming could fall into this category.

You also can block individual channels or block programming based on ratings of the MPAA and TV broadcasters. (See a description of the ratings on this page.)



MOVIE RATINGS
(MOTION PICTURE ASSOCIATION OF AMERICA)

G: General Audience - All ages admitted. Most parents would find this programming suitable for all ages. This type of programming contains little or no violence, no strong language, and little or no sexual dialogue or sexual situations.

PG: Parental Guidance Suggested - This programming contains material that parents may find unsuitable for younger children. It may contain one or more of the following: Moderate violence, some sexual situations, infrequent coarse language, or some suggestive dialogue.

PG-13: Parents Strongly Cautioned - This programming contains material that parents may find unsuitable for children under the age of 13. It contains one or more of the following: violence, sexual situations, coarse language, or suggestive dialogue.

R: Restricted - This programming is specifically designed for adults. Anyone under the age of 17 should view this programming only with an accompanying parent or adult guardian. It contains one or more of the following: intense violence; intense sexual situations; strong, coarse language; or intensely suggestive dialogue.

NC-17: No one under the age of 17 will be admitted. - This type of programming should be viewed by adults only. It contains graphic violence; explicit sex; or crude, indecent language.

X: Adults Only - This type of programming contains one or more of the following: very graphic violence, very graphic and explicit or indecent sexual acts, very coarse and intensely suggestive language.

TV PARENTAL GUIDELINES
(TV BROADCASTERS)

TV-Y: (All children -- This program is designed to be appropriate for all children.) Designed for a very young audience, including children ages 2-6. This type of programming is not expected to frighten younger children.

TV-Y7: (Directed to Older Children -- This program is designed for children ages 7 and above.) It may be more appropriate for children who have acquired the development skills needed to distinguish between make-believe and reality. This programming may include mild fantasy and comic violence (FV).

TV-G: (General Audience -- Most parents would find this program suitable for all ages.) This type of programming contains little or no violence, no strong language, and little or no sexual dialogue or sexual situations.

TV-PG: (Parental Guidance Suggested -- This program contains material that parents may find unsuitable for younger children.) This type of programming contains one or more of the following: Moderate violence (V), some sexual situations (S), infrequent coarse language (L), or some suggestive dialogue (D).

TV-14: (Parents Strongly Cautioned -- This program contains some material that many parents would find unsuitable for children under 14 years of age.) This type of programming contains one or more of the following: intense violence (V); intense sexual situations (S); strong, coarse language (L); or intensely suggestive dialogue (D).

TV-MA: (Mature Audience Only -- This program is specifically designed to be viewed by adults and therefore may be unsuitable for children under 17.) This type of programming contains one or more of the following: graphic violence (V); explicit sexual situations (S); or crude, indecent language (L).

AUTOLOCK™ – SETTING UP THE ACCESS CODE



AutoLock™ allows parents to block out or “censor” any channels they think children should not watch. A channel blocked by the AutoLock™ control cannot be viewed until a correct access code is used to unlock the channel for viewing. First, let’s set your AutoLock access code.

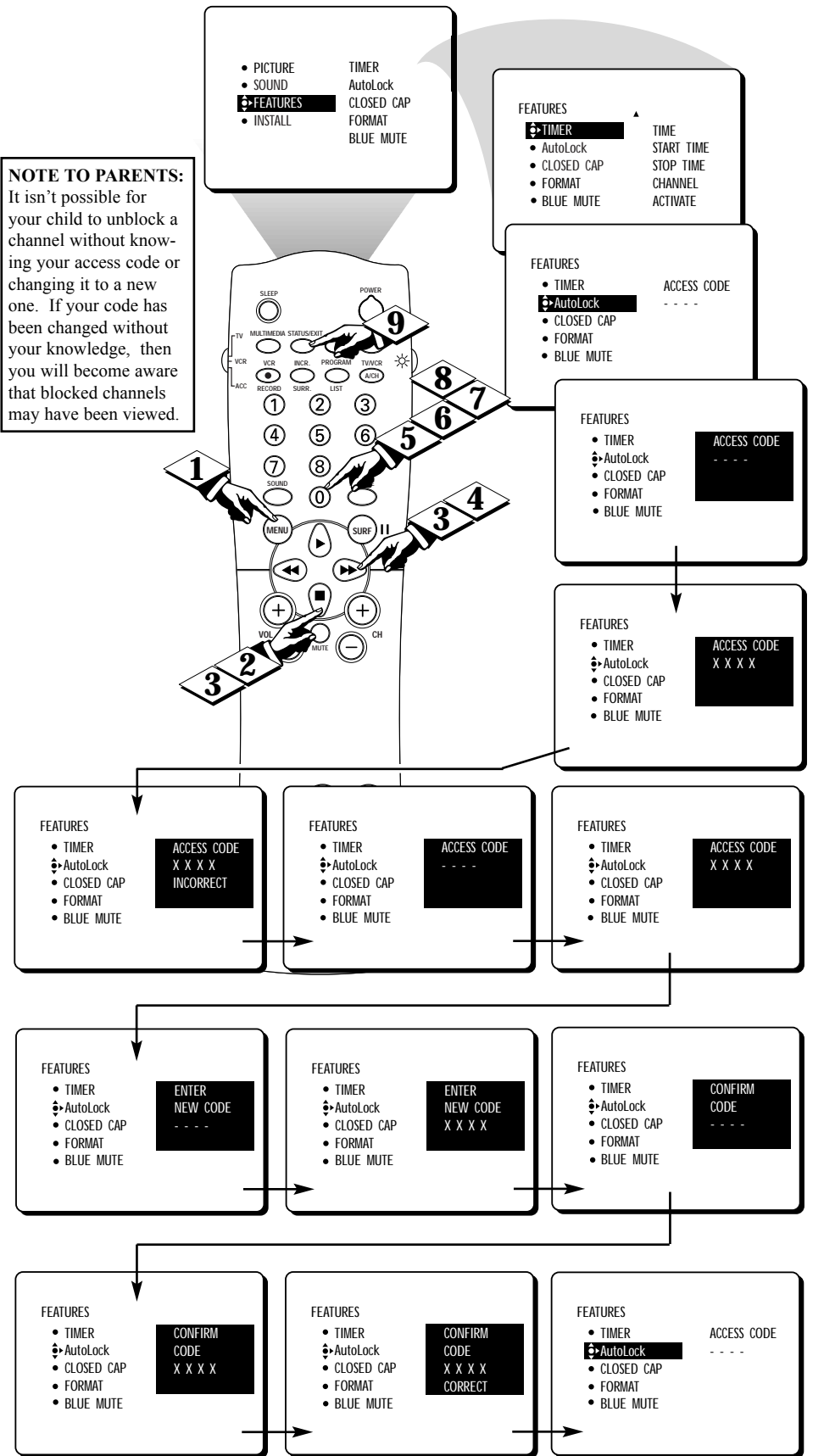
BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button to highlight **ACCESS CODE**.
- 5 Press **0,7,1,1** on the remote control. **INCORRECT** will appear on the screen.
- 6 Press **0,7,1,1** on the remote control again. **ENTER NEW CODE** will appear on the screen.
- 7 Enter a new four-digit code using the number buttons. **CONFIRM CODE** will appear on the screen.
- 8 Enter your new four-digit code again. **CORRECT** will flash on the screen briefly and the highlight bar goes back to AutoLock.
- 9 Press the **STATUS/EXIT** button to remove the menu from the screen.



Remember that 0711 is the default AutoLock™ code. If your access code has been changed by someone other than you (a child, for example) or you have forgotten the code, you can always get in by inputting the default code.

NOTE TO PARENTS:
It isn't possible for your child to unblock a channel without knowing your access code or changing it to a new one. If your code has been changed without your knowledge, then you will become aware that blocked channels may have been viewed.



AUTOLOCK™ – BLOCKING CHANNELS

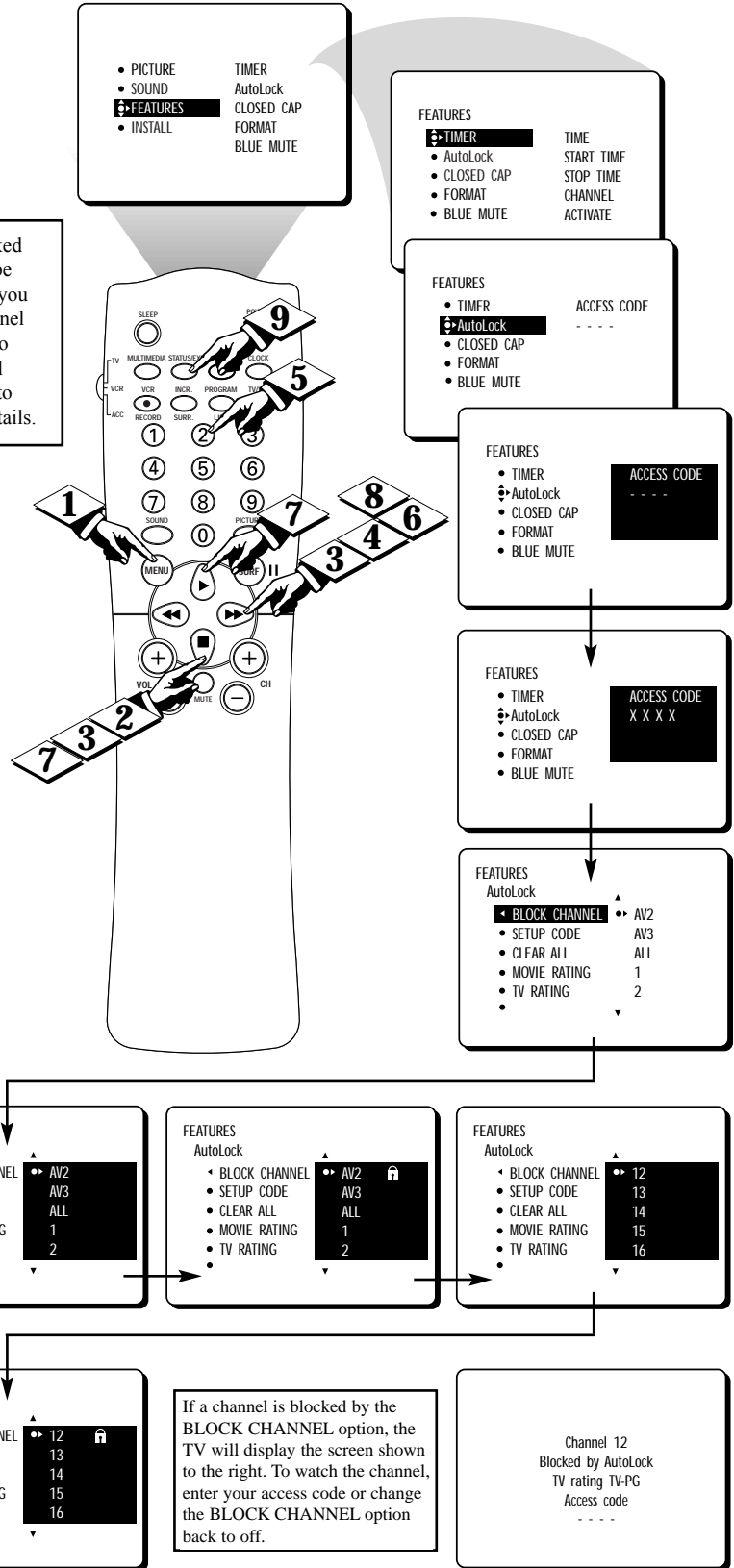
After your personal access code has been set (see the previous page), you are ready to select the channels or inputs you want to block out or censor.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEA-TURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the **AutoLock™** control.
- 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
- 5 Enter your four-digit **ACCESS CODE**. *CORRECT* will flash very briefly and the menu will move to the left with **BLOCK CHANNEL** highlighted.
- 6 Press the **CURSOR RIGHT** button to highlight the TV's available channels.
- 7 Press the **CURSOR UP** or **CURSOR DOWN** button to highlight the channel you want to block.
- 8 Press the **CURSOR RIGHT** button to block the channel. A padlock image appears to the right of the channel number.
Repeat steps 7 and 8 for any channels you want to block from viewing.
- 9 Press the **STATUS/EXIT** button to remove the menu from the screen.



NOTE: Blocked channels will be skipped when you press the Channel +/- buttons. To view a blocked channel, refer to page 28 for details.



NOTE: You also can block out the use of the A/V external inputs on the rear of the TV. This stops the viewing of VCR, DVD, and other sources that can be shown through the A/V input jacks. Select AV1, AV2, or AV3 and then select **BLOCK**.

AUTOLOCK™ – BLOCKING BY MOVIE RATING

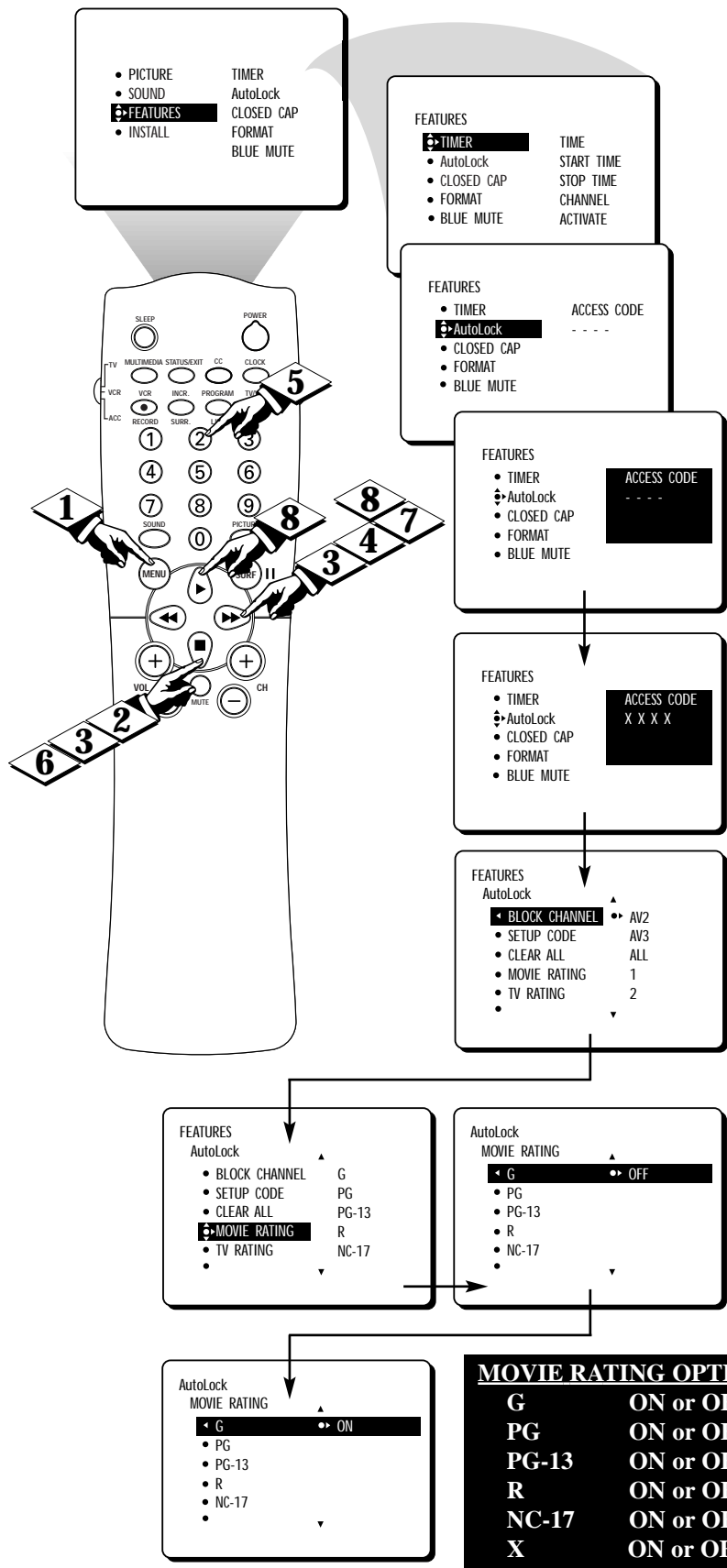


After your personal access code has been set (see page 19), you can select specific movie ratings that you want to censor.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEAT-URES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
- 5 Enter your four-digit **ACCESS CODE**. *CORRECT* will flash very briefly in red and the menu will move to the left with **BLOCK CHANNEL** highlighted.
- 6 Press the **CURSOR DOWN** button repeatedly until **MOVIE RATING** is highlighted.
- 7 Press the **CURSOR RIGHT** button and the Rating menu shifts to the left with **G** highlighted.
- 8 Press the **CURSOR UP** or **CURSOR DOWN** button to highlight each rating you want. Then press the **CURSOR RIGHT** button to turn the rating ON or OFF. Turning the rating ON will block programs with that rating from being seen.
- 9 Press the **STATUS/EXIT** button to remove the menu from the screen.

NOTE: When a rating is turned ON, all higher ratings also will be turned on automatically. For example, if the *R* rating is turned on, the *NC-17* and *X* ratings also will be turned on.



MOVIE RATING OPTIONS	
G	ON or OFF
PG	ON or OFF
PG-13	ON or OFF
R	ON or OFF
NC-17	ON or OFF
X	ON or OFF

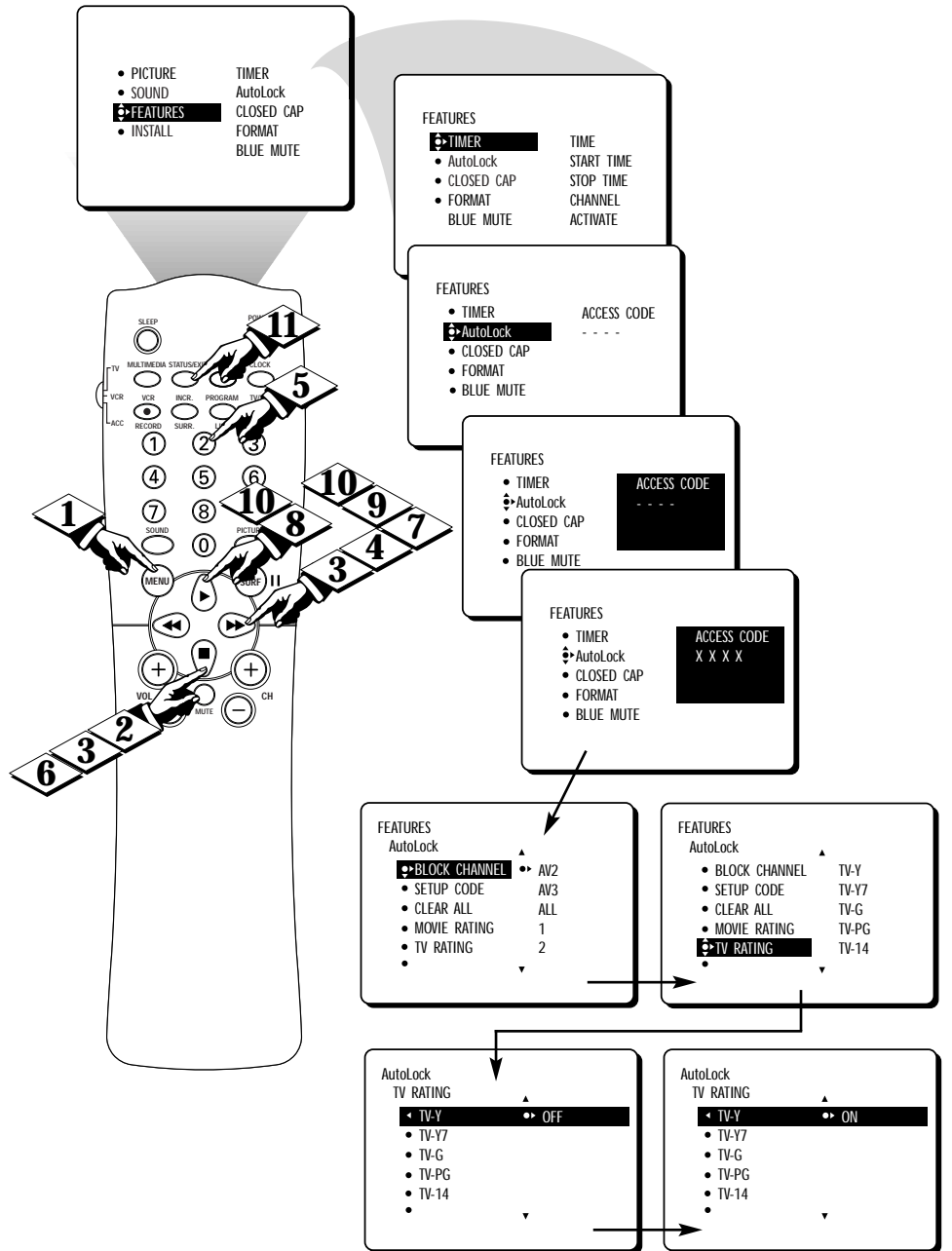


AUTOLOCK™ – BLOCKING BY TV RATING

You also can select specific TV ratings that you want to censor by following these steps.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
 - 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
 - 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
 - 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
 - 5 Enter your four-digit **ACCESS CODE** and the menu will move to the left with **BLOCK CHANNEL** highlighted.
 - 6 Press the **CURSOR DOWN** button repeatedly until **TV RATING** is highlighted.
 - 7 Press the **CURSOR RIGHT** button and the menu will shift to highlight the TV RATING options.
 - 8 Press the **CURSOR UP** or **DOWN** button to select a rating.
 - 9 Press the **CURSOR RIGHT** or **LEFT** button to turn the block on the rating **ON** or **OFF**.
- NOTE:** More specific subratings (for violence, sexual content, dialogue, or fantasy violence) are available for TV-Y7, TV-PG, TV-14, and TV-MA.
- 10 To access these subratings, press the **CURSOR RIGHT** button. Press the **CURSOR UP** or **DOWN** button to select the subrating that you want to block or unblock. Then press the **CURSOR RIGHT** or **CURSOR LEFT** button to turn the block on the subrating **ON** or **OFF**.
 - 11 Press the **STATUS/EXIT** button to remove the menu.



TV-Y: (All children -- This program is designed to be appropriate for all children.) Designed for a very young audience, including children ages 2-6. This type of programming is not expected to frighten younger children.

TV-Y7: (Directed to Older Children -- This program is designed for children age 7 and above.) It may be more appropriate for children who have acquired the development skills needed to distinguish between make-believe and reality. This programming may include mild fantasy and comic violence (FV).

TV-G: (General Audience -- Most parents would find this program suitable for all ages.) This type of programming contains little or no violence, no strong language, and little or no sexual dialogue or situations.

TV-PG: (Parental Guidance Suggested -- This program contains material that parents may find unsuitable for younger children.) This type of programming contains one or more of the following: some suggestive dialogue (D), infrequent coarse language (L), some sexual situations (S), or moderate violence (V).

TV-14: (Parents Strongly Cautioned -- This program contains some material that many parents would find unsuitable for children under 14 years of age.) This type of programming contains one or more of the following: intensely suggestive dialogue (D); strong, coarse language (L); intense sexual situations (S); or intense violence (V).

TV-MA: (Mature Audience Only -- This program is specifically designed to be viewed by adults and therefore may be unsuitable for children under 17.) This type of programming contains one or more of the following: crude, indecent language (L); explicit sexual situations (S); or graphic violence (V).

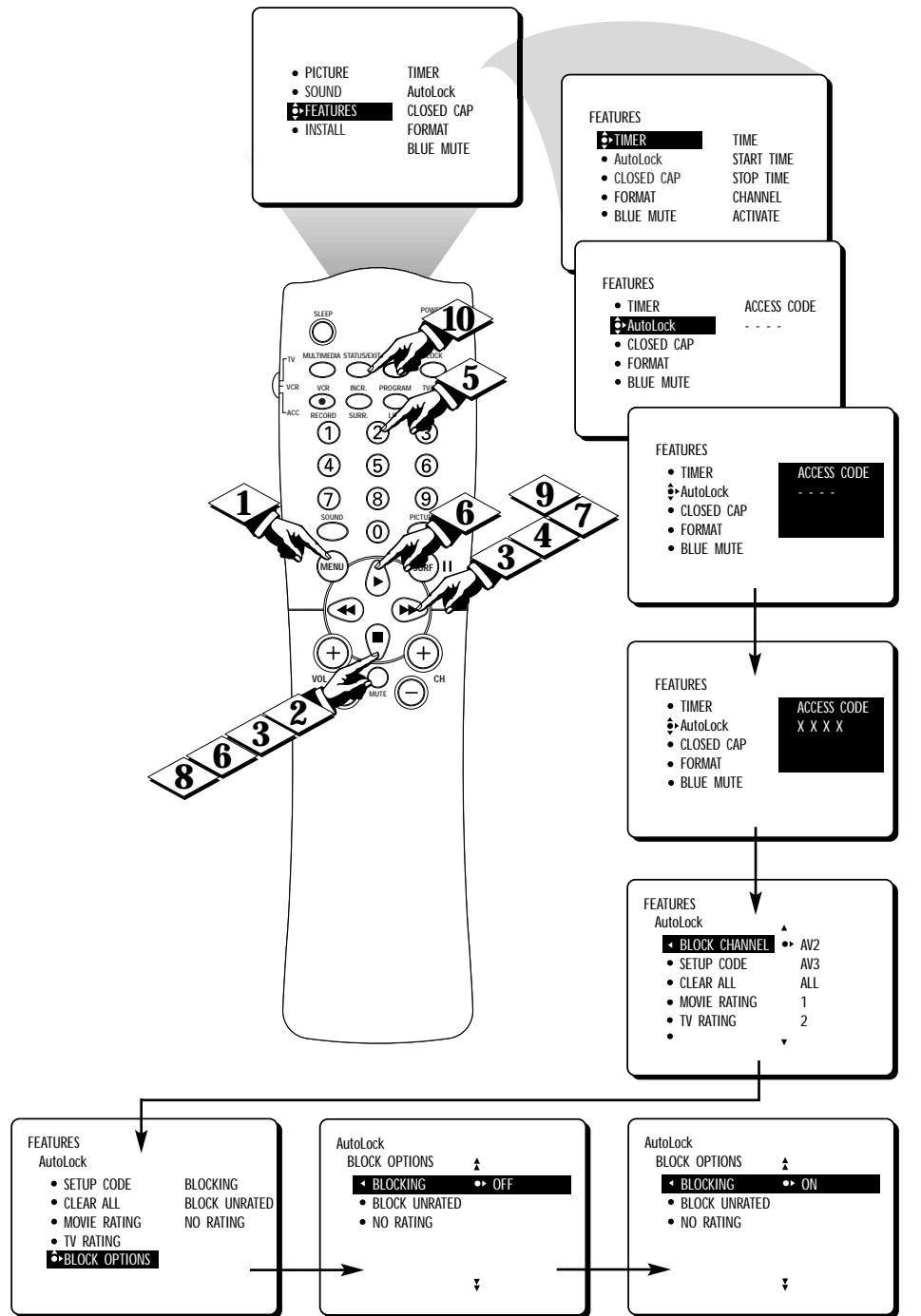
AUTOLOCK™ – TURNING BLOCK ON OR OFF



The **BLOCKING** control is what can be thought of as the “master switch” for AutoLock™. This control affects the settings you have chosen for blocking programs according to movie ratings or TV ratings, or for blocking programs that have no rating or are unrated. When the **BLOCKING** control is **OFF**, the blocking or censoring of programs is disabled. When the **BLOCKING** control is **ON**, blocking will occur according to the settings you have chosen. Follow these steps to toggle **BLOCKING** **OFF** or **ON**.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
- 5 Enter your four-digit **ACCESS CODE** and the menu will move to the left with **BLOCK CHANNEL** highlighted.
- 6 Press the **CURSOR DOWN** button repeatedly until **BLOCK OPTIONS** is highlighted.
- 7 Press the **CURSOR RIGHT** button to enter the **BLOCK OPTIONS** menu. **BLOCKING** will be highlighted.
- 8 Press the **CURSOR RIGHT** or **LEFT** button to toggle **BLOCKING** **ON** or **OFF**.
- 9 Press the **STATUS/EXIT** button to remove the menu.





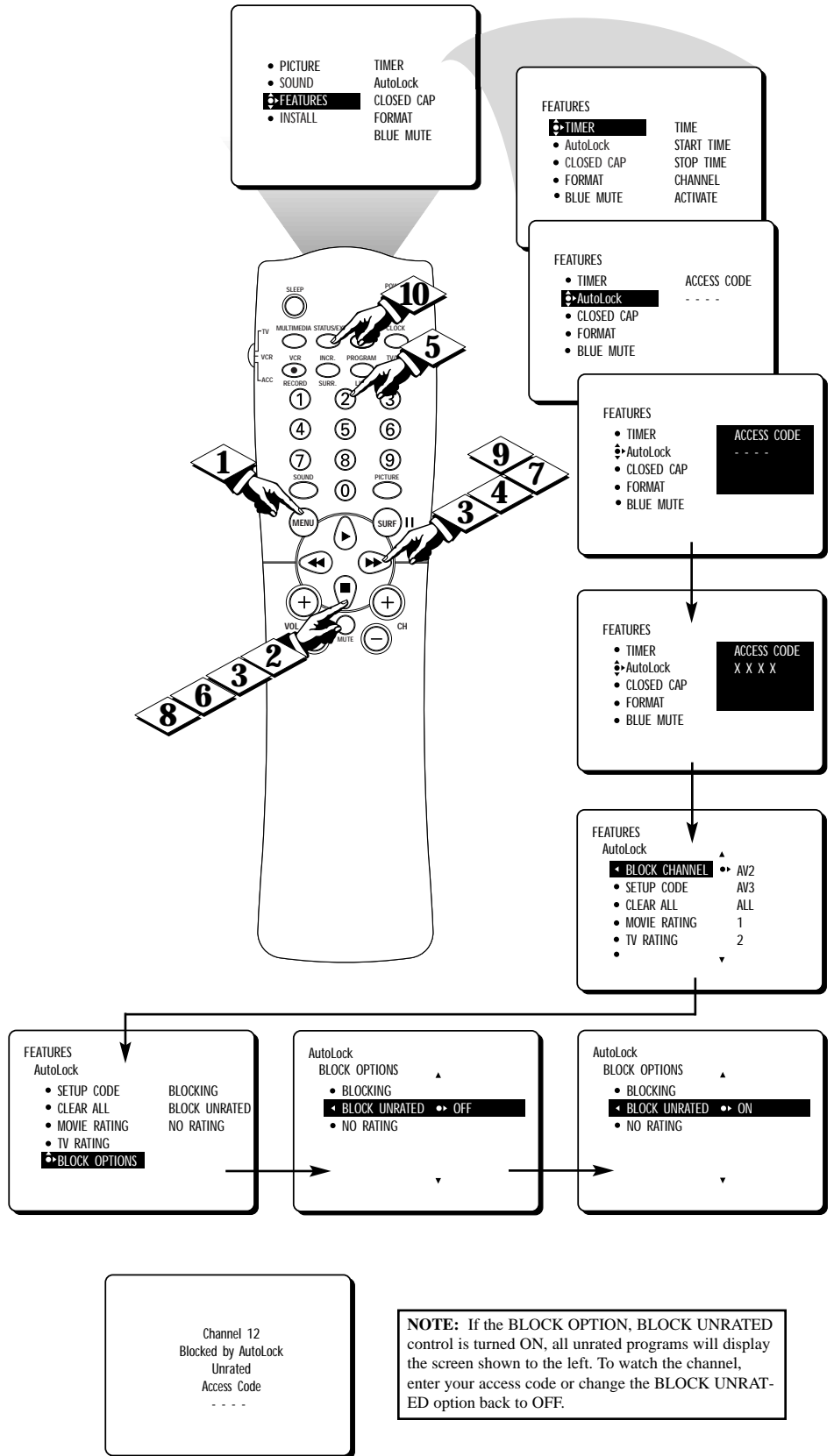
AUTOLOCK™ – BLOCKING UNRATED BROADCASTS

In addition to blocking specific ratings or channels, you may choose to block all programming that is unrated.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
- 5 Enter your four-digit **ACCESS CODE** and the menu will move to the left with **BLOCK CHANNEL** highlighted.
- 6 Press the **CURSOR DOWN** button repeatedly until **BLOCK OPTIONS** is highlighted.
- 7 Press the **CURSOR RIGHT** button to enter the **BLOCK OPTIONS** menu. **BLOCKING** will be highlighted.
- 8 Press the **CURSOR DOWN** button once to select **BLOCK UNRATED**.
- 9 Press the **CURSOR RIGHT** or **CURSOR LEFT** button to toggle **BLOCK UNRATED ON** or **OFF**.
- 10 Press the **STATUS/EXIT** button to remove the menu.

STOP



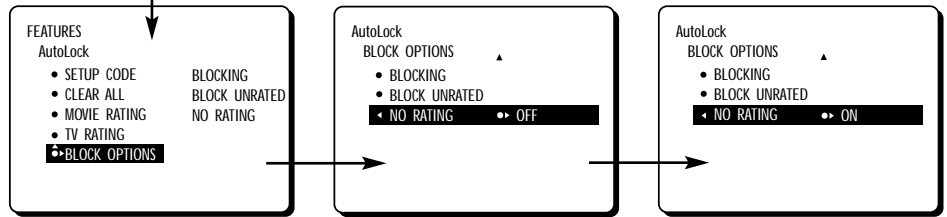
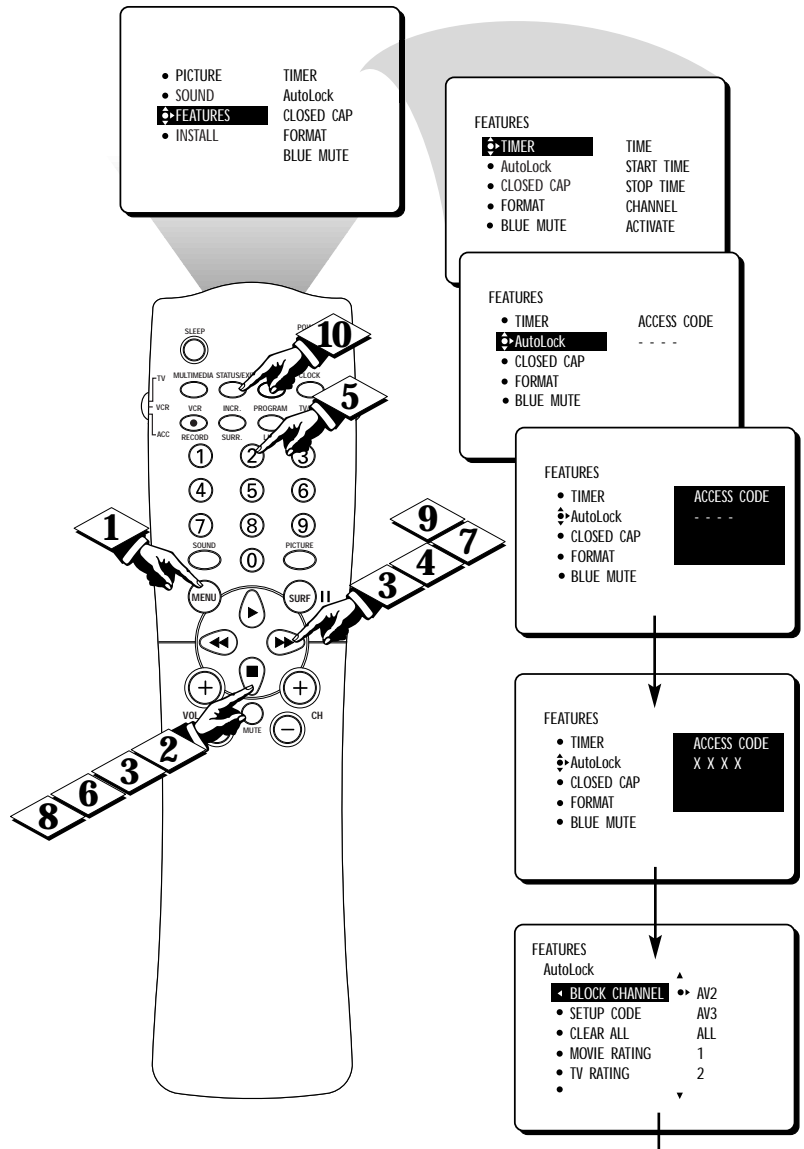
AUTOLOCK™ – BLOCKING BROADCASTS THAT HAVE NO RATING



Some programming is not encoded with content advisory data by the MPAA (Motion Picture Association of America) or the television broadcasters (see the explanation on page 18). To block such programming, follow these steps.

BEGIN

- 1 Press the **MENU** button on the remote to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight **FEATURES**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button again to highlight **ACCESS CODE**.
- 5 Enter your four-digit **ACCESS CODE** and the menu will move to the left with **BLOCK CHANNEL** highlighted.
- 6 Press the **CURSOR DOWN** button repeatedly until **BLOCK OPTIONS** is highlighted.
- 7 Press the **CURSOR RIGHT** button to enter the **BLOCK OPTIONS** menu. **BLOCKING** will be highlighted.
- 8 Press the **CURSOR DOWN** button twice to highlight **NO RATING**.
- 9 Press the **CURSOR RIGHT** or **CURSOR LEFT** button to toggle **NO RATING ON** or **OFF**.
- 10 Press the **STATUS/EXIT** button to remove the menu.



Channel 12
Blocked by AutoLock
No rating
Access Code

NOTE: If the **BLOCKING OPTION, NO RATING** control is turned **ON**, all programs containing **NO** content advisory data will display the screen shown to the left. To watch the channel, enter your access code or change the **NO RATING** option back to **OFF**.



AUTOLOCK™ – REVIEWING YOUR SETTINGS

To remind you which ratings you have blocked and which Block Options you have selected, a review screen is available to review your AutoLock™ settings. To access this screen follow the steps below.

BEGIN

1 Press the **STATUS/EXIT** button on your remote control twice. Your AutoLock™ settings will appear on the screen.

NOTE: If you have blocked specific subratings, such as V for Violence in the TV-PG category, these blocked subratings will not appear in the review. The subratings however, are still blocked according to your selections.

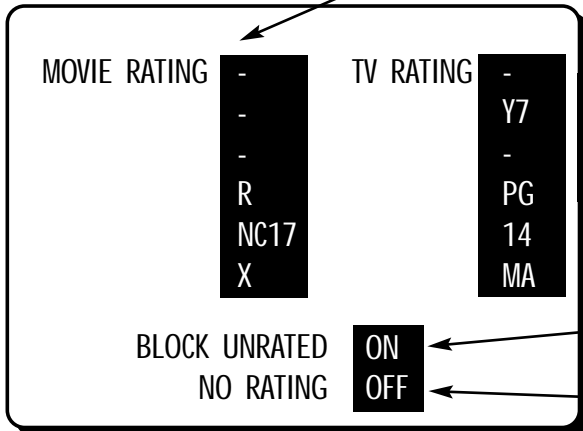
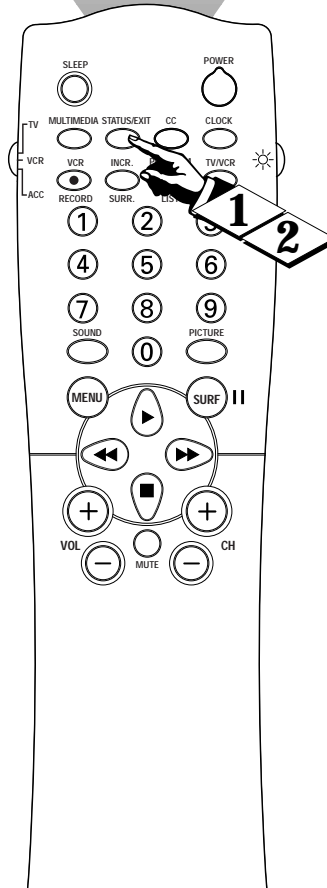
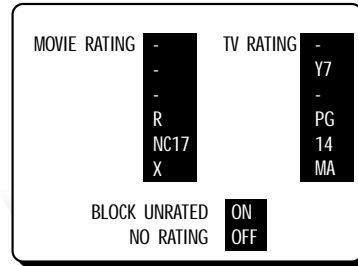
2 After a few seconds, the settings will leave the screen automatically, or you can press the **STATUS/EXIT** button a third time to remove them from the screen.

STOP

SMART HELP



Remember, the review screen will appear only if **BLOCKING** is set to **ON**. For details, see page 23.



MOVIE RATINGS – Shows all blocked movie ratings that were set within the MOVIE RATING feature. Some or all may be blocked at one time. **NOTE:** If a lower rating is blocked, higher ratings also will be blocked automatically (for example, if R is set to be blocked, X also will automatically be blocked).

TV RATINGS – Shows all blocked TV ratings that were set within the feature. Some or all may be blocked at one time. **NOTE:** If a lower rating is blocked, higher ratings also will be blocked automatically (for example, if TV-14 is set to be blocked, TV-MA also will automatically be blocked). TV ratings also have subratings for Violence (V), Fantasy Violence (FV), Sexual Situations (S), Coarse Language (L), and Suggestive Language (D). If the main rating is turned OFF but the subrating is turned ON, the program will be blocked; however, the rating will not appear within the AutoLock review menu.

BLOCK UNRATED – Shows ON or OFF, depending on the status of the BLOCK UNRATED feature.

BLOCK NO RATING – Shows ON or OFF, depending on the status of the BLOCK NO RATING feature.

AUTOLOCK™ – VIEWING BLOCKED PROGRAMMING

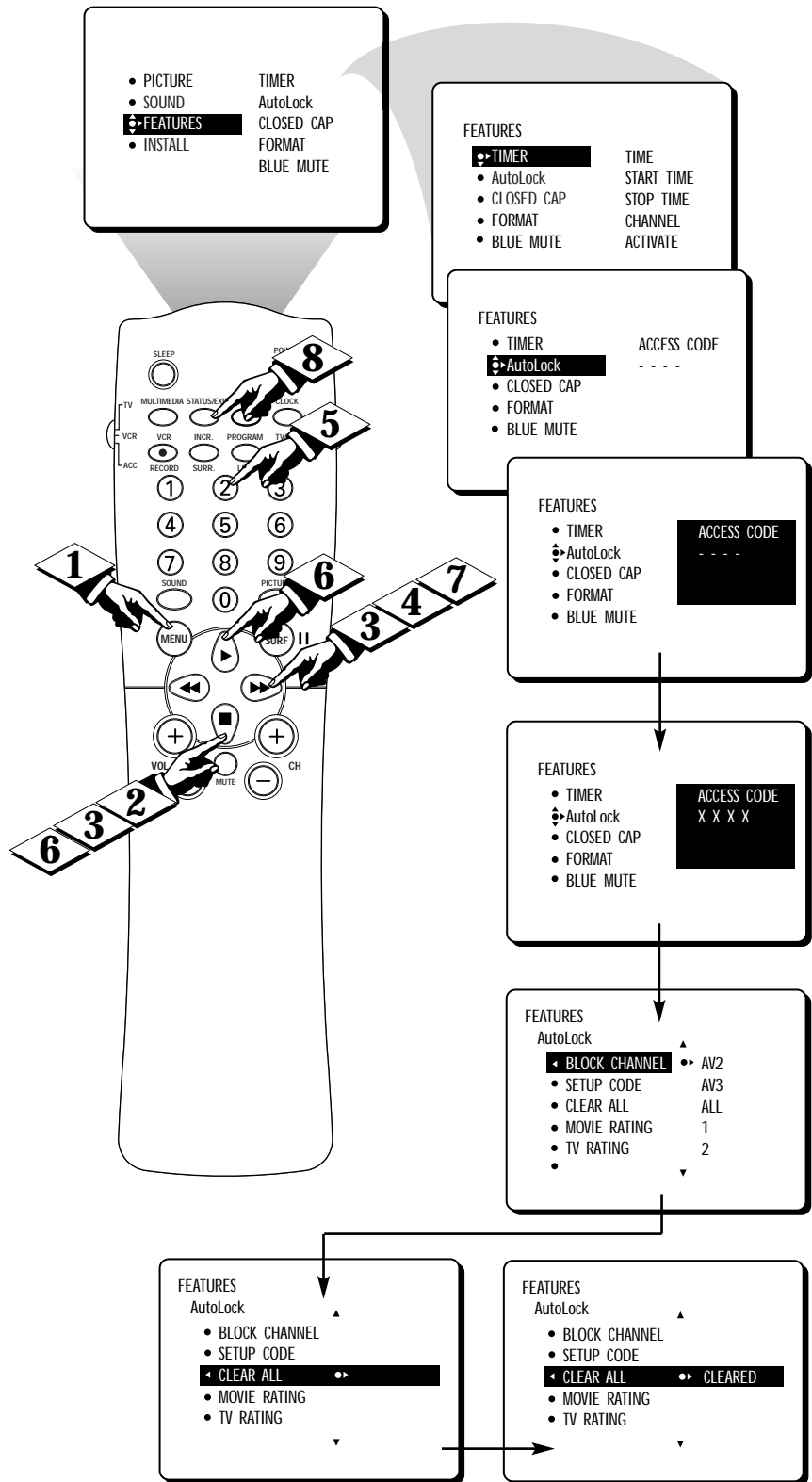


Various onscreen messages will appear when someone tries to view blocked programming. The message is determined by how the current programming is blocked. You may view the blocked programming and turn OFF the AutoLock™ feature by clearing all blocking options or by entering your access code.

BEGIN

- 1 Press the **MENU** button on the remote to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button twice to highlight FEATURES.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. Then press the **CURSOR DOWN** button once to highlight the AutoLock control.
- 4 Press the **CURSOR RIGHT** button again to highlight ACCESS CODE.
- 5 Enter your four-digit ACCESS CODE and the menu will move to the left with BLOCK CHANNEL highlighted.
- 6 Press the **CURSOR DOWN** button twice to highlight CLEAR ALL.
- 7 Press the **CURSOR RIGHT** button twice. The CLEAR ALL option will display the word *CLEARED*. All blocked channels and programming are now viewable.
- 8 Press the **STATUS/EXIT** button to remove the menu.

If you tune to a specific channel that has been blocked by BLOCK CHANNEL or any of the AutoLock™ RATING options, simply enter your four-digit access code to view the channel. **NOTE:** this will unblock ALL channels until the TV is shut OFF. When powered back ON, all previously blocked channels will be blocked again.





SOUND – ADJUSTING THE TREBLE, BASS, AND BALANCE

Besides the normal volume level control, your TV also has individual sound-adjustment controls. The **TREBLE** (high frequency), **BASS** (low frequency), and **Speaker BALANCE** may all be used to adjust the sound playback of TV programs.

BEGIN

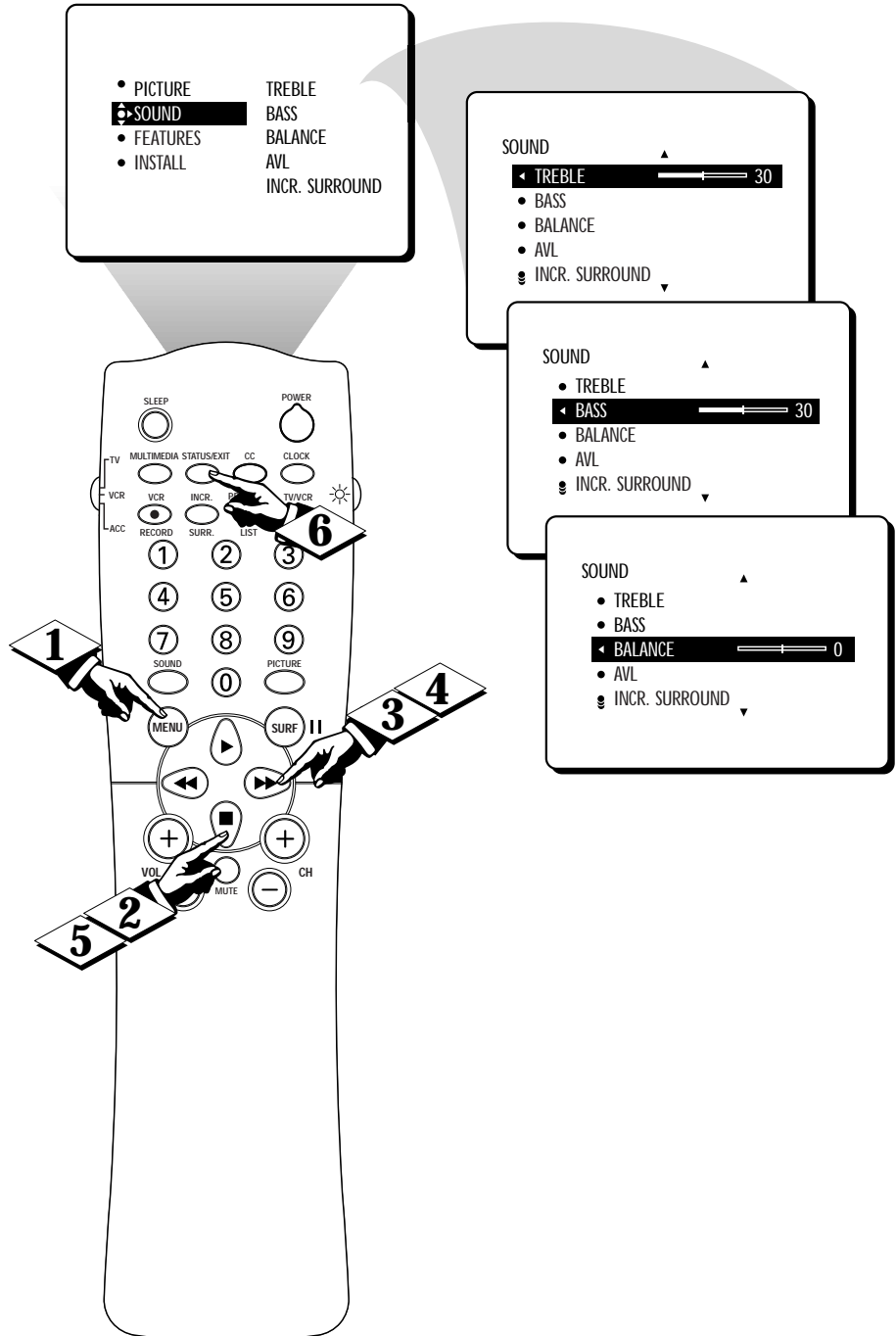
- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button once to highlight **SOUND**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TREBLE** will be highlighted and an adjustment bar will be shown to the right.
- 4 Use the **CURSOR RIGHT** or **CURSOR LEFT** button to adjust the **TREBLE** (high frequency) level of the television's sound.
- 5 After adjusting the **TREBLE** control, press the **CURSOR DOWN** button to select another sound adjustment: **BASS** or **BALANCE**. Press the **CURSOR RIGHT** or **CURSOR LEFT** button to adjust the selected control.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.



SMART HELP



Remember, when the bar scale is centered, speaker **BALANCE** is centered between the TV's left and right side speakers.





Use the Volume Bar control to see the TV's volume level settings on the TV screen. The Volume Bar will be seen each time the VOLUME buttons (on the TV or remote control) are pressed.

BEGIN

1 Press the **VOLUME (+) or (-) button** on the remote control to show the VOLUME bar display on the screen.

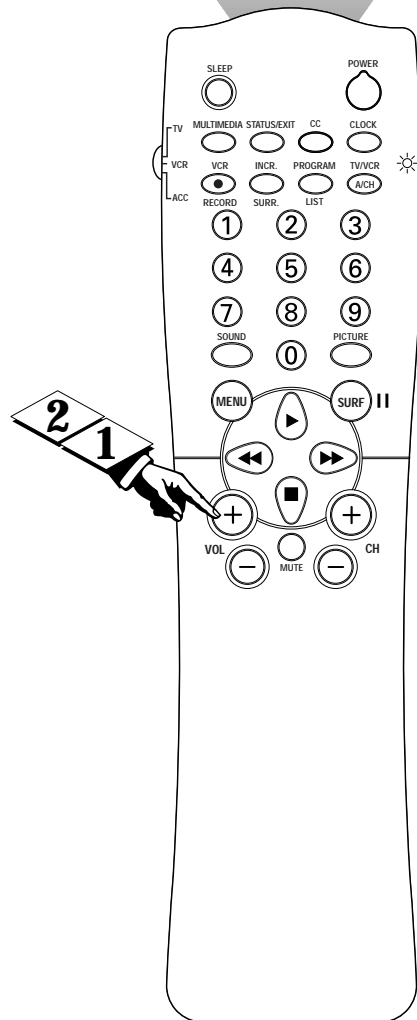
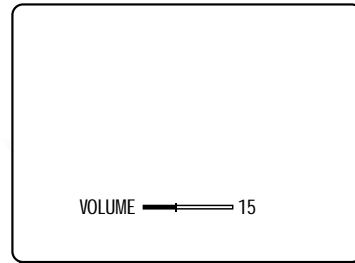
2 Press the **VOLUME (+) or (-) button** to adjust the television's sound level.

STOP

SMART HELP



Try it out. Press the VOL (+) and (-) buttons. The VOLUME bar will appear near the bottom center of the screen.



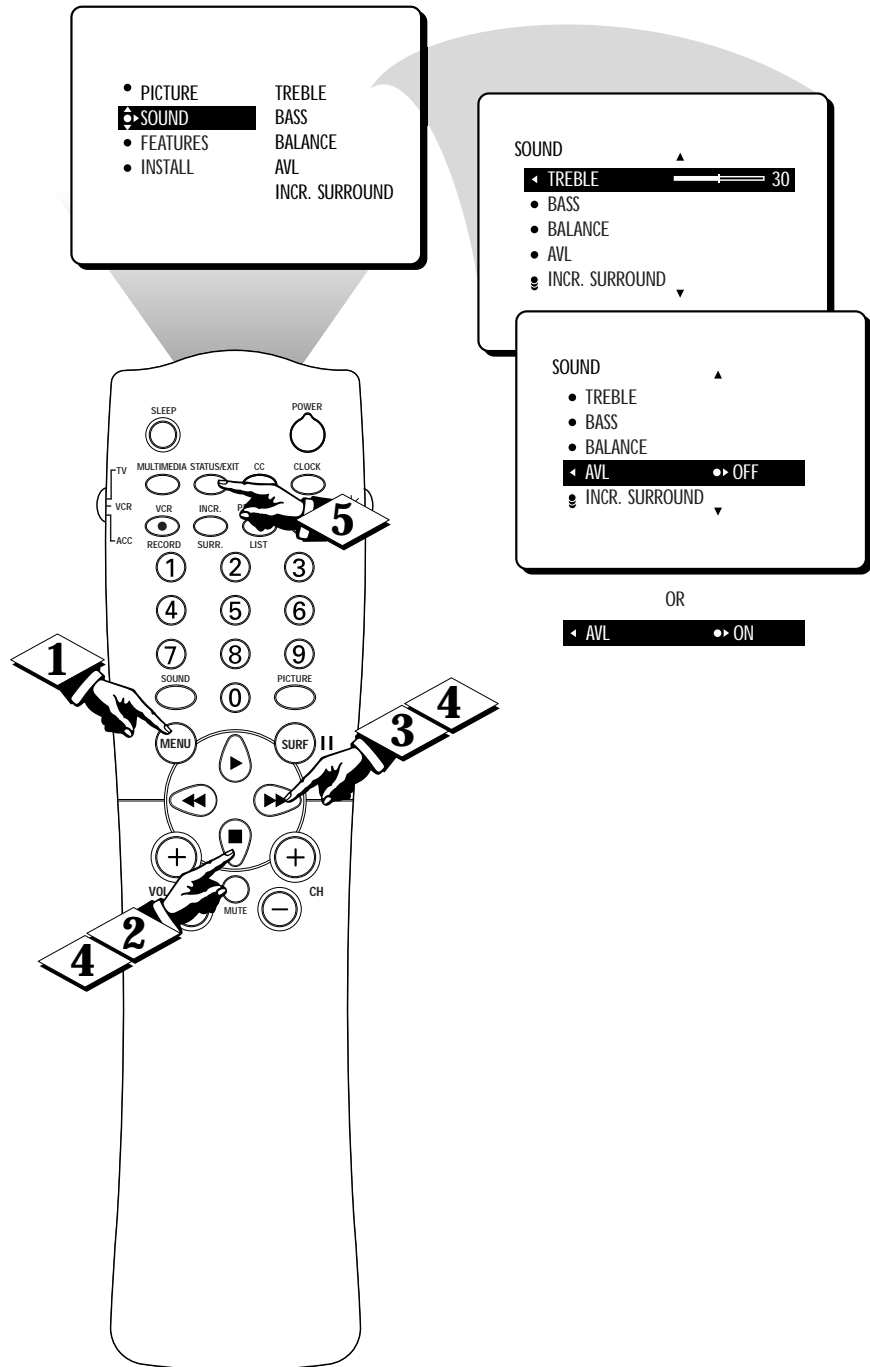
SOUND – USING THE AVL (AUDIO VOLUME LEVELER)



In most cases, the volume levels coming from broadcast programming or commercials are never the same. With the AVL (Audio Volume Leveler) control turned ON, you can have the TV level out sound that is being heard. This makes for a more consistent sound by reducing the peaks and valleys that occur during program changes or commercial breaks. To turn the AVL ON, follow these steps.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button once to highlight **SOUND**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left. **TREBLE** will be highlighted and an adjustment bar will be shown to the right.
- 4 Press the **CURSOR DOWN** button repeatedly until **AVL** is highlighted. Then press the **CURSOR RIGHT** or **CURSOR LEFT** button to toggle AVL ON or OFF.
- 5 Press the **STATUS/EXIT** button to remove the menu from the screen.





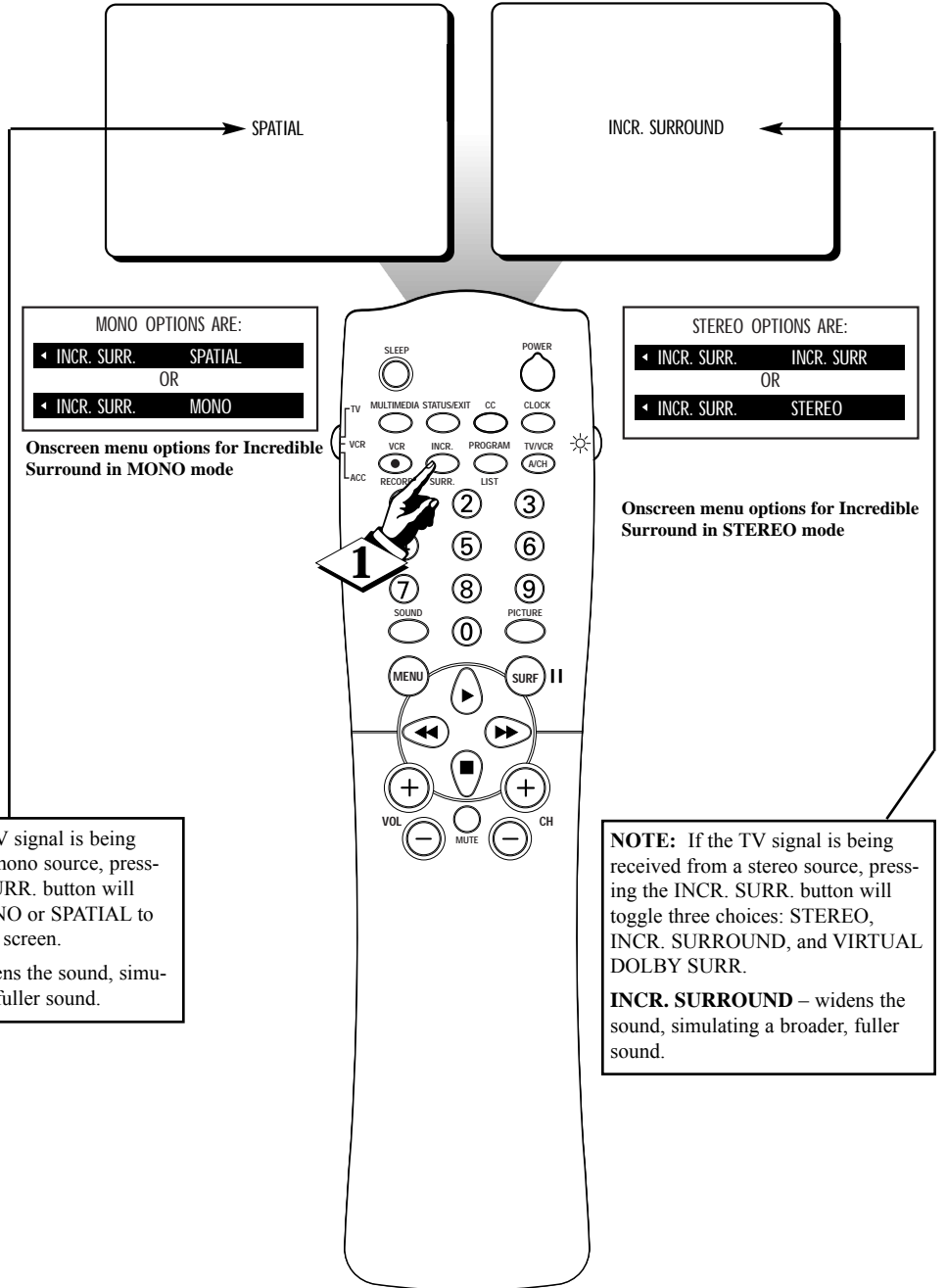
The Incredible Surround feature adds greater depth and dimension to both monaural (MONO) and stereo TV sound. With the control set to INCR. SURROUND (Incredible Surround), the TV's speakers can add even wider sound separation to normal broadcasts.

BEGIN

1 Press the **INCR. SURR.** button on the remote control to turn the Incredible Surround feature ON.

When the TV signal is being received in Stereo, pressing this button will give you these options: STEREO, or INCR. SURROUND.

When the TV signal is in MONO, the choices displayed will read SPATIAL or MONO.



MONO OPTIONS ARE:
 ◀ INCR. SURR. SPATIAL
 OR
 ◀ INCR. SURR. MONO

Onscreen menu options for Incredible Surround in MONO mode

STEREO OPTIONS ARE:
 ◀ INCR. SURR. INCR. SURR
 OR
 ◀ INCR. SURR. STEREO

Onscreen menu options for Incredible Surround in STEREO mode

NOTE: If the TV signal is being received from a mono source, pressing the INCR. SURR. button will cause either MONO or SPATIAL to appear on the the screen.
SPATIAL – widens the sound, simulating a broader, fuller sound.

NOTE: If the TV signal is being received from a stereo source, pressing the INCR. SURR. button will toggle three choices: STEREO, INCR. SURROUND, and VIRTUAL DOLBY SURR.
INCR. SURROUND – widens the sound, simulating a broader, fuller sound.



SOUND – SETTING THE TV FOR STEREO AND SAP

You can receive broadcast stereo TV programs. The TV has both an amplifier and twin speakers through which the stereo sound can be heard.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button once to highlight the **SOUND** menu.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left.
- 4 Press the **CURSOR DOWN** button repeatedly until the **STEREO** control is highlighted.
- 5 Press the **CURSOR LEFT** or **CURSOR RIGHT** button to select **STEREO** or **MONO**. When **STEREO** has been selected, the television will reproduce any stereo broadcast signal it receives.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.



SECOND AUDIO PROGRAM (SAP)

An SAP is an additional part of the stereo broadcast system. Sent as a third audio channel, an SAP can be heard apart from the current TV program sound. TV stations are free to use SAP for any number of purposes.

If an SAP signal is not present with a selected program, the SAP option cannot be selected. Also, if SAP is selected on a channel (with SAP) and you select another channel, when you return to the original channel, SAP will be OFF. You will have to reselect the SAP feature.

IF SECONDARY AUDIO PROGRAMMING IS BEING BROADCAST:

◀ SAP ▶ AVAILABLE

OR

◀ SAP ▶ OFF

IF SECONDARY AUDIO PROGRAMMING IS NOT BEING BROADCAST:

◀ SAP ▶ NOT AVAILABLE

OR

◀ SAP ▶ OFF

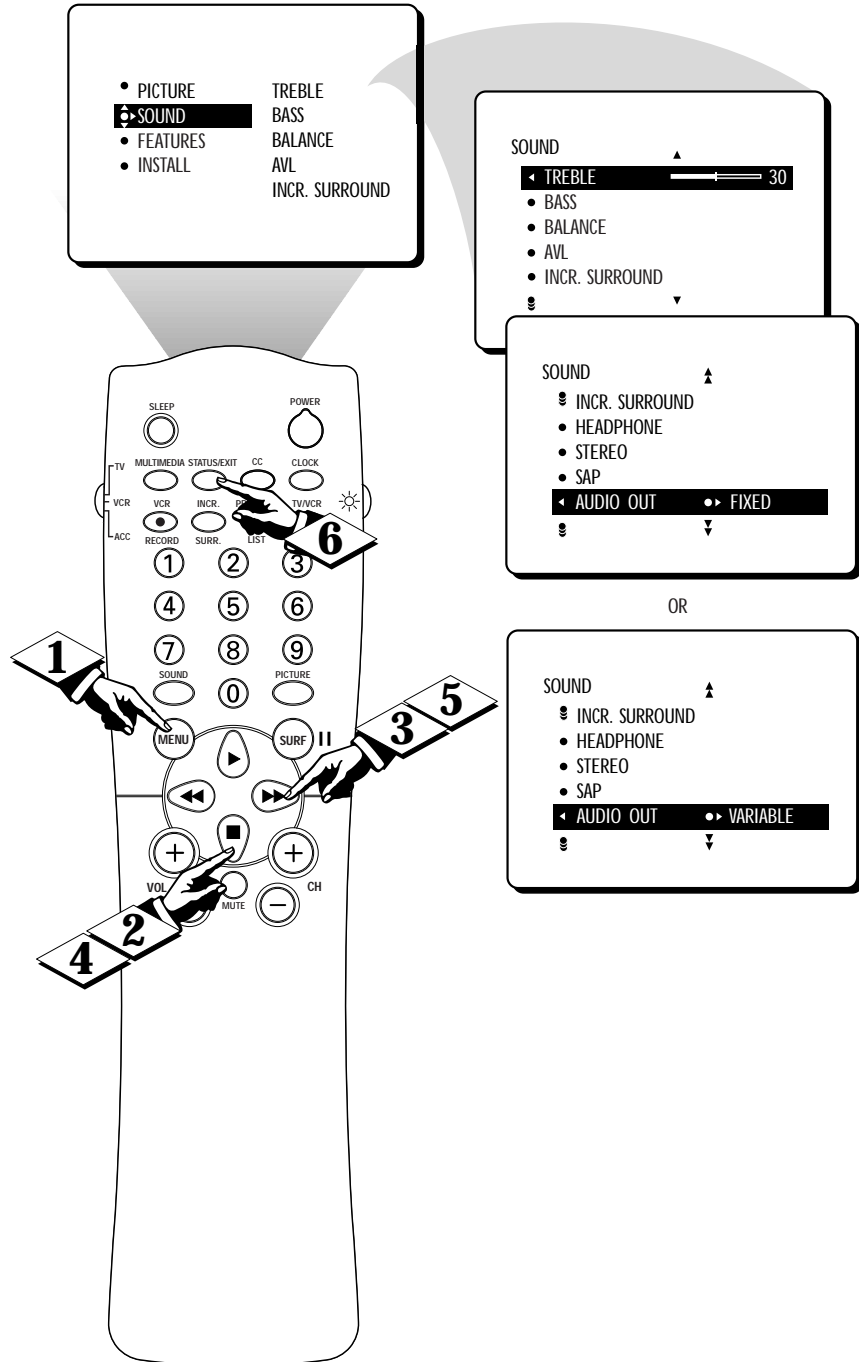
SOUND – SETTING THE AUDIO OUT CONTROL



If you have connected the TV's **AUDIO OUTPUT** jacks to the **AUDIO INPUT** jacks on a stereo receiver, set **AUDIO OUT** to either **VARIABLE** or **FIXED** to determine whether you adjust the volume at the stereo or at the TV. If you select **VARIABLE**, change the volume at the TV using the TV's remote control. If you select **FIXED**, adjust the volume at the stereo using the stereo's controls. To select **FIXED** or **VARIABLE**, follow these steps.

BEGIN

- 1 Press the **MENU** button on the remote control to show the onscreen menu.
- 2 Press the **CURSOR DOWN** button once to highlight **SOUND**.
- 3 Press the **CURSOR RIGHT** button and the menu will shift to the left.
- 4 Press the **CURSOR DOWN** button repeatedly until **AUDIO OUT** is highlighted.
- 5 Press the **CURSOR LEFT** or **CURSOR RIGHT** button to set the **AUDIO OUT** to **VARIABLE** or **FIXED**.
- 6 Press the **STATUS/EXIT** button to remove the menu from the screen.





SOUND – USING THE TV SPEAKER CONTROL AND AUDIO OUTPUT JACKS

Would you like to hear TV programs through your audio hi-fi system? The TV's Audio Output jacks and TV Speaker ON/OFF control work together to offer you this TV sound option.

BEGIN

- 1 **Connect the R(ight) and L(eft) AUDIO OUT** jacks on the TV to the R and L audio input jacks on your amplifier or sound system. Set the audio system's volume to a normal listening level.
- 2 **Turn the TV and audio system ON.** You can now adjust the sound level coming from the audio system with the VOLUME (+) or (-) buttons on the TV or remote control.

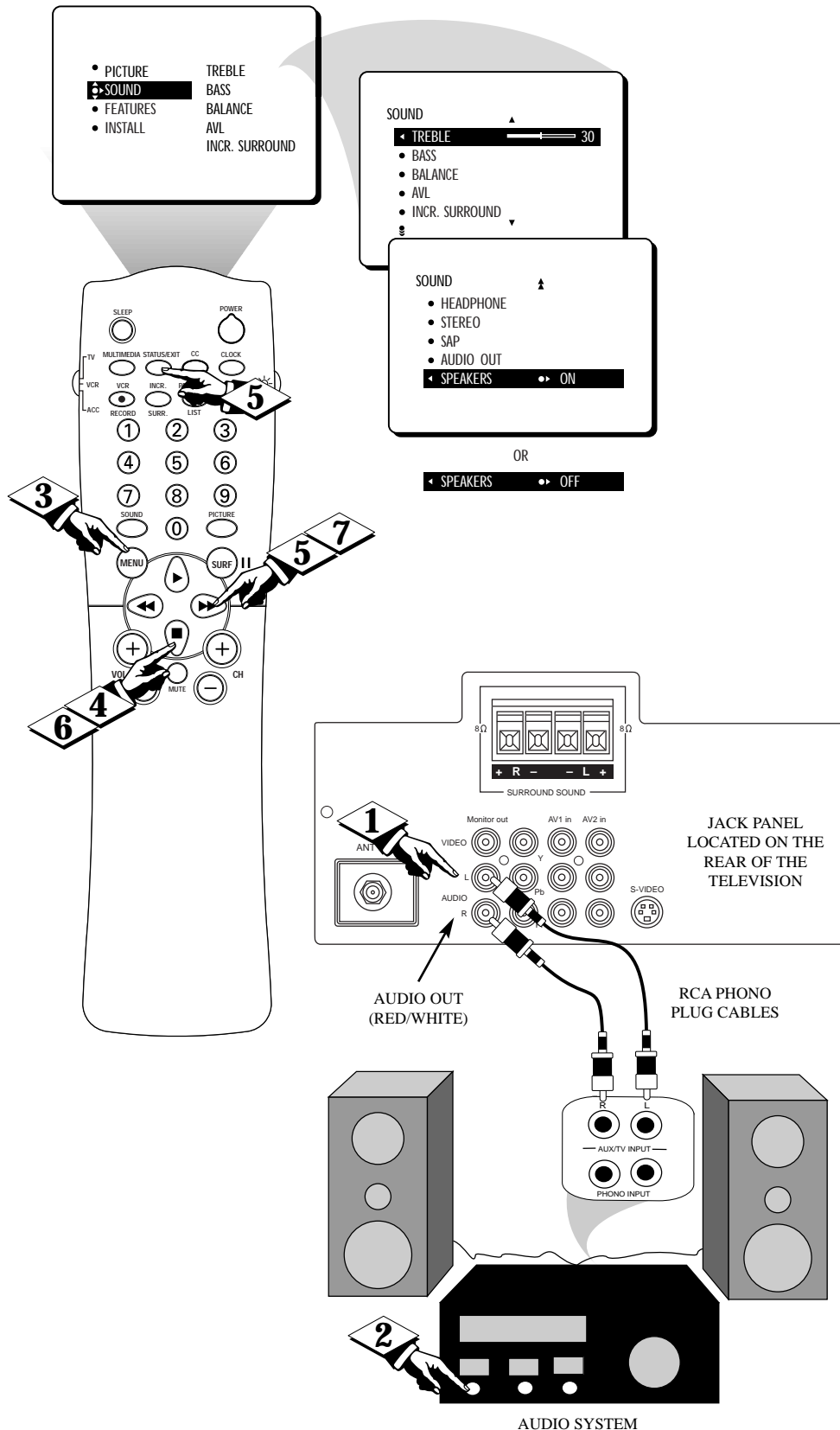
To hear the TV sound from only the audio system speakers:
- 3 **Press the MENU** button on the remote control to show the onscreen menu.
- 4 **Press the CURSOR DOWN** button once to highlight SOUND.
- 5 **Press the CURSOR RIGHT** button and the menu will shift to the left.
- 6 **Press the CURSOR DOWN** button repeatedly until the SPEAKERS control is highlighted.
- 7 **Press the CURSOR RIGHT** or **CURSOR LEFT** button to turn the television's speakers ON or OFF. With the SPEAKERS control set to OFF, you should hear the TV sound coming only from the audio system speakers.



SMART HELP



Remember, the audio system may have to be in AUX(iliary) mode to play sound from the TV.



SOUND – USING THE SURROUND SOUND EXTERNAL SPEAKER CONNECTIONS

By adding optional external speakers to the TV's sound system, you can create the feeling of reflected sound that surrounds you at a movie theater or concert hall.

BEGIN

- 1** Connect both external speakers to the speaker wire terminals on the TV.

Recommended speakers: 8 ohm, 15 watt minimum. Be sure the (+) and (-) speaker wires are connected to the correct R(ight) and L(ef) speaker terminals on the TV.

- 2** Place the speakers so that the viewing area is between the TV and the rear surround speakers. (See overhead view drawing.)

- 3** Turn the TV and the **STEREO** control ON.

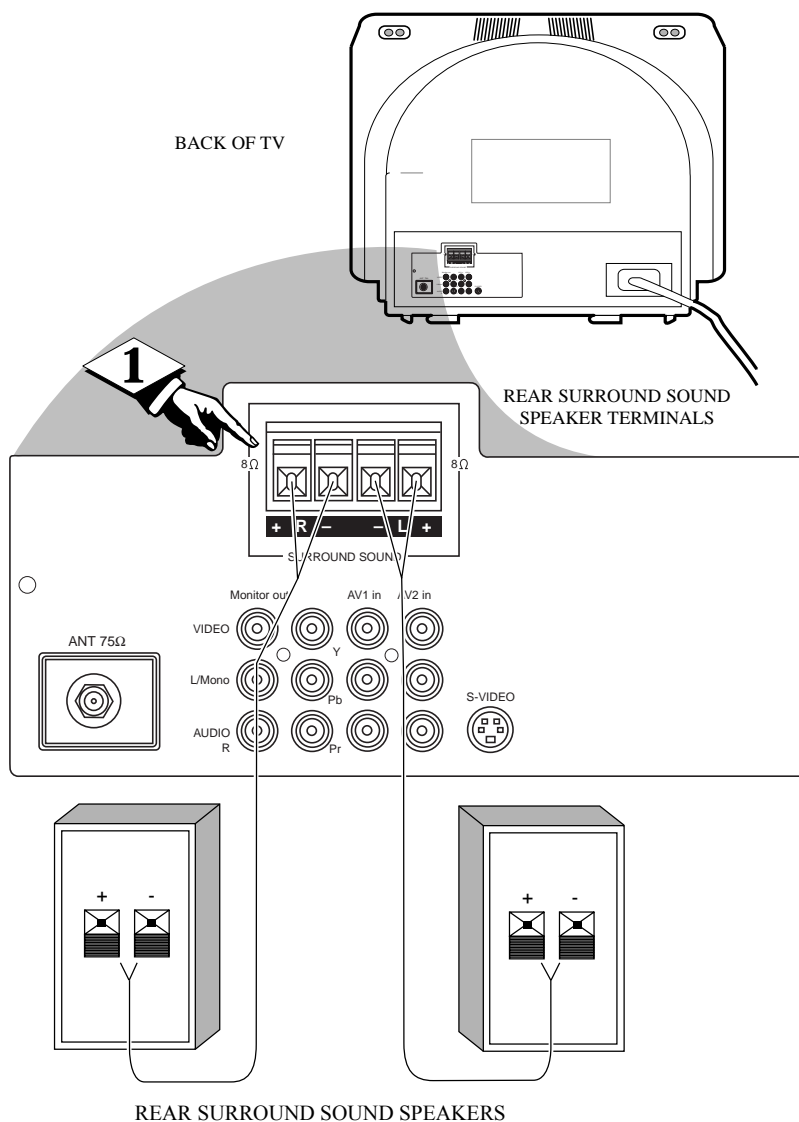
After setup, whenever a stereo signal is received, the audio will be heard in Surround Sound.



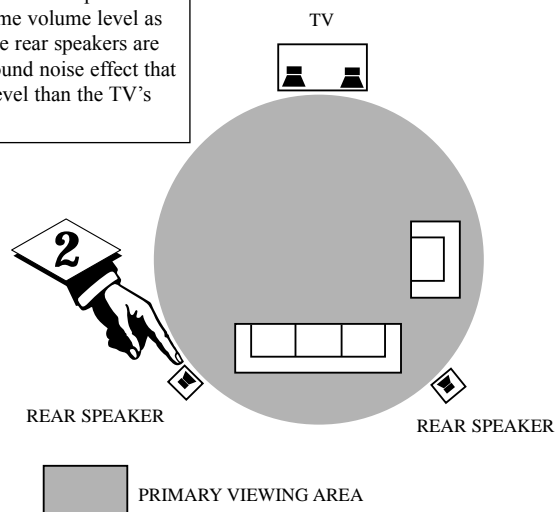
SMART HELP



Remember, Surround Sound will not work with only one speaker connected, nor with a monaural audio source supplied, unless the Incredible Surround feature is turned ON (see page 31).



NOTE: The rear Surround Sound speakers will not be heard at the same volume level as the front TV speakers. The rear speakers are intended to give a background noise effect that requires a lower volume level than the TV's front speakers.





SOUND – USING THE AUDIO/VIDEO INPUT JACKS

AUDIO/VIDEO INPUTS

The TV's audio/video input jacks are for direct picture and sound connections between the TV and a VCR (or similar device) that has audio/video output jacks.

BEGIN

1 Connect the VIDEO (yellow) cable to the VIDEO AV1 jack on the back of the TV. Then connect the AUDIO (red and white) cables to the AUDIO (left and right) AV1 jacks on the rear of the TV.

2 Connect the VIDEO (yellow) cable to the VIDEO OUT jack on the back of the VCR. Then connect the AUDIO (red and white) cables to the AUDIO (left and right) OUT jacks on the rear of the VCR.

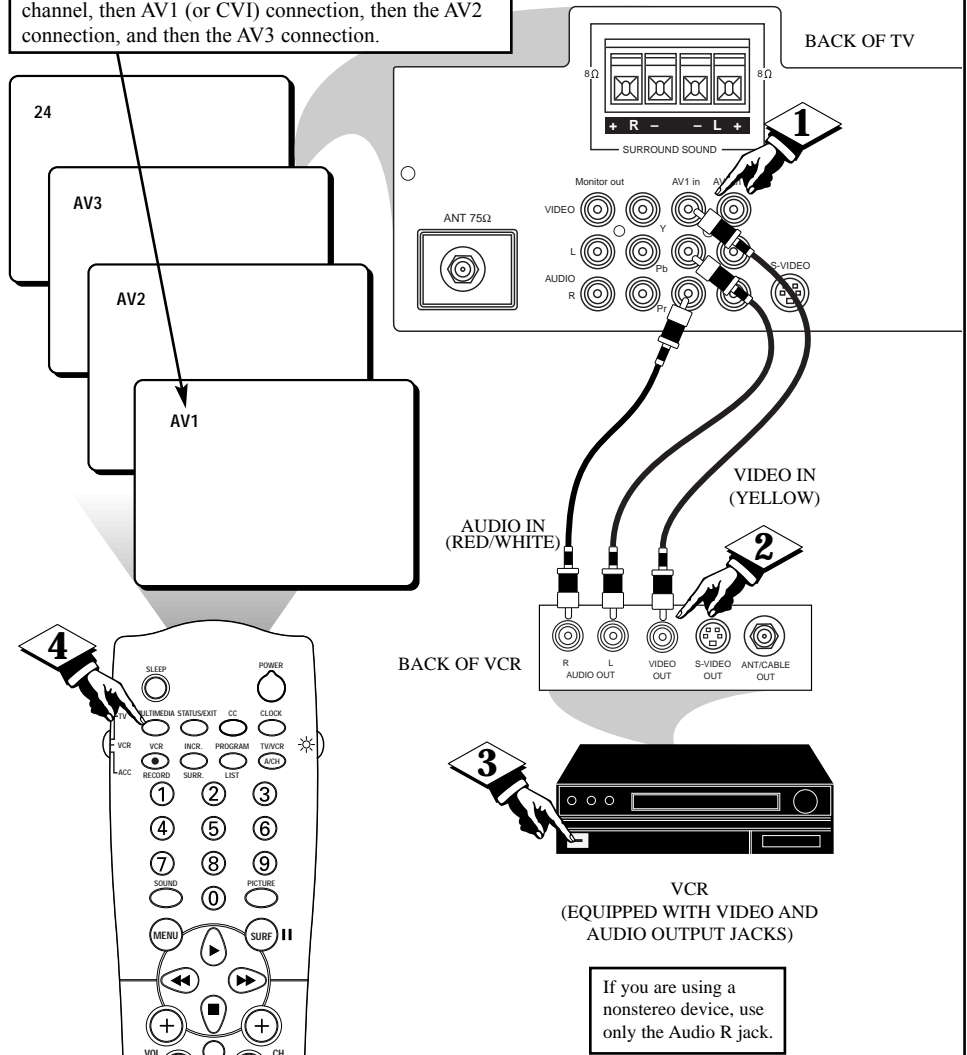
3 Turn the VCR and the TV ON.

4 Press the MULTIMEDIA button on the remote control to select the AV1 channel.

With the VCR ON and a prerecorded tape inserted, press the PLAY button to view the tape on the television.



NOTE: Repeatedly pressing the MULTIMEDIA button on the remote control will toggle the picture source from the current channel (Tuner A or B), the last viewed channel, then AV1 (or CVI) connection, then the AV2 connection, and then the AV3 connection.



NOTE: For more convenient direct playback connections, you can use your TV's side video input panel, located on the right and angled toward the front for easy access. The audio/video jacks in this panel allow for quick connections that are especially handy for playing back camcorder (composite video or S-VHS) tape recordings. Press the remote control's SOURCE button to select the AV3 mode. Then use the side jack panel inputs for playback on the TV.



S-VIDEO INPUT

The *S(uper)-Video* connection on the rear of the TV can provide you with better picture detail and clarity for the playback of accessory sources such as DBS (digital broadcast satellite), DVD (digital video discs), video games, and S-VHS VCR (video cassette recorder) tapes than the normal antenna picture connections.

NOTE: The accessory device must have an S-VIDEO OUT (put) jack in order for you to complete the connection on this page.

BEGIN

- 1 **Connect the S-VIDEO CABLE** to the S-VIDEO input jack on the rear of the television. Then **connect the AUDIO (red and white) cables** to the AUDIO AV2 jacks on the rear of the TV.
- 2 **Connect the S-VIDEO CABLE** to the S-VIDEO output jack on the accessory device. Then **connect the red and white AUDIO cables** to the AUDIO (left and right) output jacks on the rear of the accessory device.
- 3 **Turn the accessory device ON.**
- 4 **Press the MULTIMEDIA button** on the remote control to tune the AV2 channel. You are now ready to view the tape or disc on the TV.

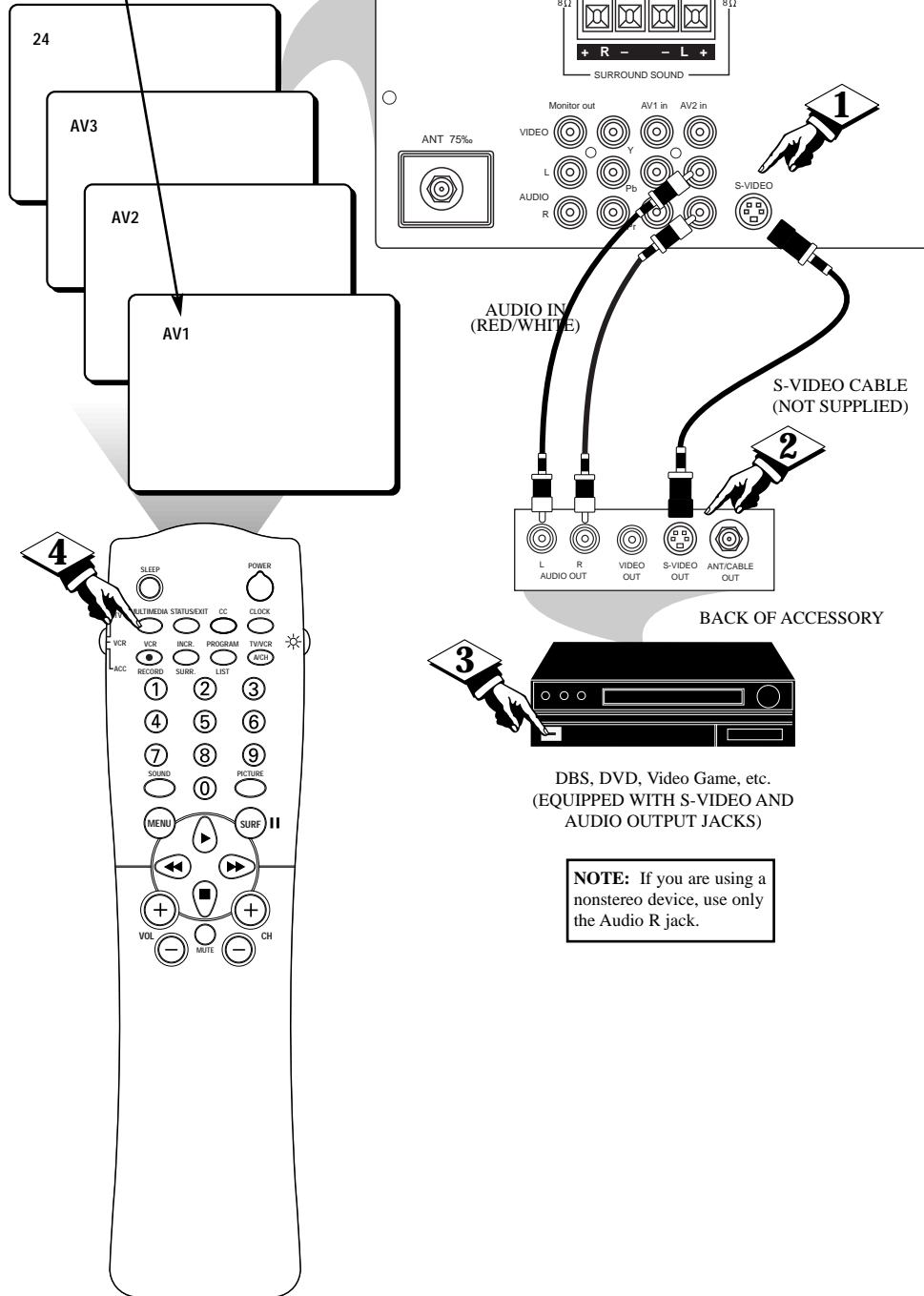


SMART HELP

The S-VIDEO and VIDEO AV2 in(puts) are in parallel. The S-VIDEO input is dominant when in use. If separate video signals are connected to the S-VIDEO and VIDEO AV2 in(puts), the signal from the VIDEO AV2 in(put) will not be usable.

If you have added AV2 in(puts) to the TV's channel memory, just press the CHANNEL (+) or (-) button until the AV2 in(puts) (channel) mode is selected.

NOTE: Repeatedly pressing the MULTIMEDIA button on the remote will toggle the picture source from the current channel, the last viewed channel, then the AV1 (or CVD) connection, the AV2 connection, and the AV3 connection.





SOUND – USING THE AUDIO/VIDEO INPUT JACKS (CONT'D)

COMPONENT VIDEO INPUTS

Component Video inputs provide for the highest possible color and picture resolution in the playback of digital signal source material, such as with DVD players. The color difference signals (Pb, Pr) and the luminance (Y) signal are connected and received separately, which allows for improved color bandwidth information (not possible when using composite video or S-Video connections).

BEGIN

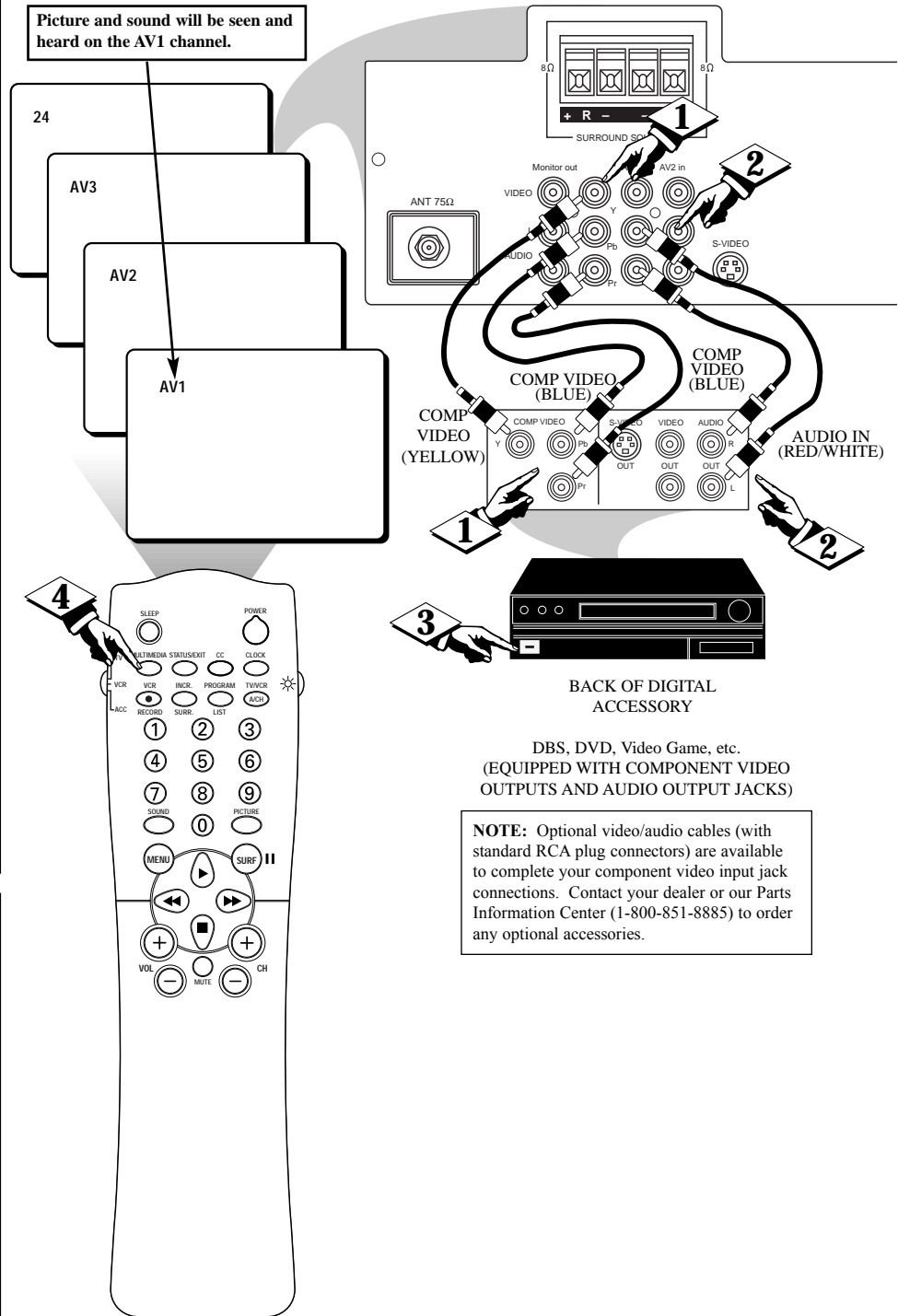
- 1 **Connect the Component (Y, Pb, Pr) Video OUT** jacks from the DVD player (or similar device) to the (Y, Pb, Pr) AV1 in(put) jacks on the TV.
- 2 **Connect the red and white AUDIO CABLES** to the Audio (left and right) output jacks on the rear of the accessory device to the Audio (L and R) AV1 in(put) jacks on the TV.
- 3 **Turn the TV and the DVD (or digital accessory device) ON.**
- 4 **Press the MULTIMEDIA button** on the remote to tune to the AV1 channel. You are now ready to view the disc on the TV.



SMART HELP



The description for the component video connectors may differ depending on the DVD player or accessory digital source equipment used (for example, Y, Pb, Pr; Y, B-Y, R-Y; Y, Cr, Cb). Although abbreviations and terms may vary, the letters *b* and *r* stand for the blue and red color component signal connectors, and *Y* indicates the luminance signal. Refer to your DVD or digital accessory owner's manual for definitions and connection details.



NOTE: Optional video/audio cables (with standard RCA plug connectors) are available to complete your component video input jack connections. Contact your dealer or our Parts Information Center (1-800-851-8885) to order any optional accessories.



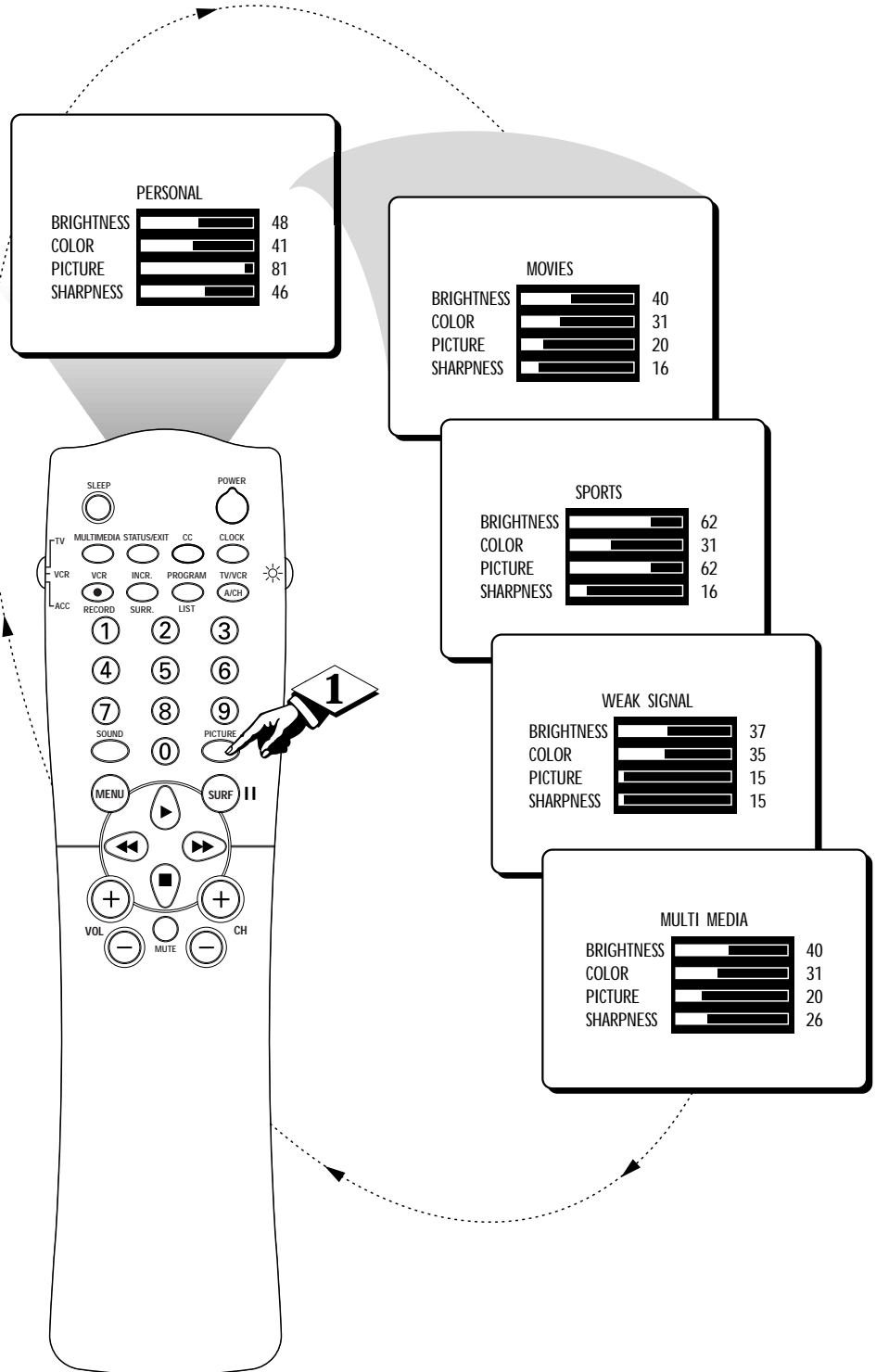
Whether you're watching a movie or a video game, your TV has automatic video control settings that will match with your current program source or content. AutoPicture™ quickly resets your TV's video controls for a number of different types of programs and viewing conditions that you may have in your home. The Movies, Sports, Weak Signal, and Multimedia AutoPicture™ controls have been preset at the factory to automatically adjust the TV's brightness, color, picture, sharpness, tint, and color temperature levels. The Personal AutoPicture™ settings are the ones that you made through the PICTURE options within the onscreen menu.

(BEGIN)

1 Press the **PICTURE** button on the remote control. The current AutoPicture™ setting will appear in the middle of the screen.

2 Press the **PICTURE** button repeatedly to select either PERSONAL, MOVIES, SPORTS, WEAK SIGNAL, or MULTI MEDIA picture settings.

NOTE: The PERSONAL setting and the PICTURE options within the onscreen menu are the same. This is the only option in AutoPicture™ that can be changed. To adjust these settings, use the PICTURE options within the onscreen menu. All other settings are set up at the factory during production and cannot be adjusted.





REMOTE CONTROL – USING AUTO SOUND™

AutoSound™ allows you to select from three factory-set controls and a personal control that you set according to your own preferences through the onscreen Sound menu. The three factory-set controls (Voice, Music, and Theatre) enable you to tailor the TV sound so as to enhance the particular program you are watching. Follow these steps to select any of the options.

BEGIN

1 Press the **SOUND** button on the remote control. The current AutoSound™ setting will appear in the middle of the screen.

2 Press the **SOUND** button repeatedly to toggle among the four settings: PERSONAL, VOICE, MUSIC, or THEATRE.

Remember, only the PERSONAL control can be changed by the viewer. This changes the settings in the main onscreen menu's SOUND controls.



SMART HELP



Remember, AutoSound™ works only with the programs coming through the ANTENNA/CABLE (ANT) input on the rear of the TV (RF audio). It will not control the sound levels for the external connections.

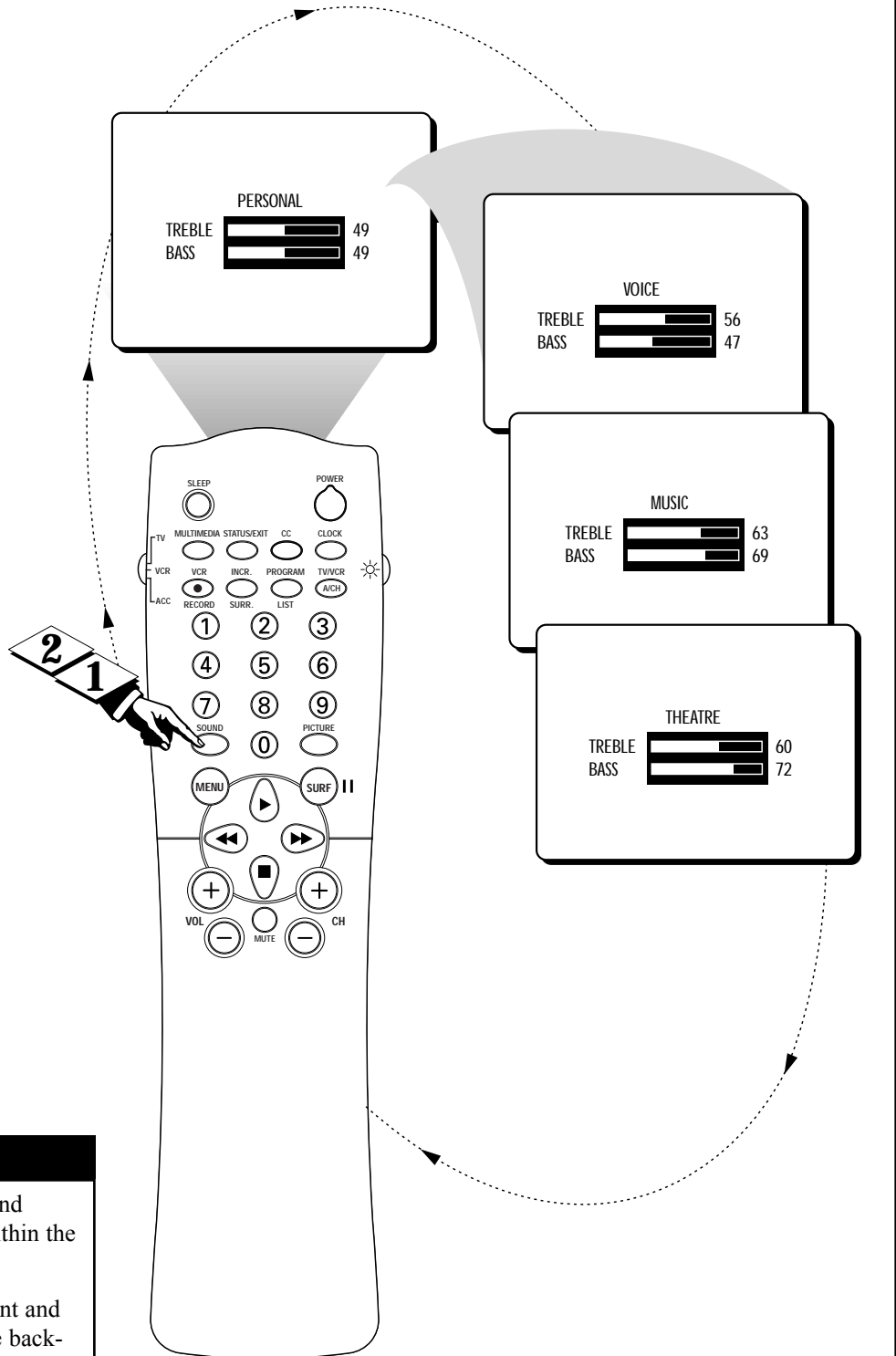
AutoSound™ Options

PERSONAL – presents the TV's sound according to the settings you make within the sound menu.

VOICE – brings voices to the forefront and emphasizes them. Moves music to the background.

MUSIC – emphasizes music over voices.

THEATRE – provides a balance between voices and music.





A list or series of previously viewed channels can be selected with the SURF button on your remote control. With this feature, you can easily switch between different TV channels that currently interest you. The SURF control allows you to set up to ten channels in its quick viewing list.

BEGIN

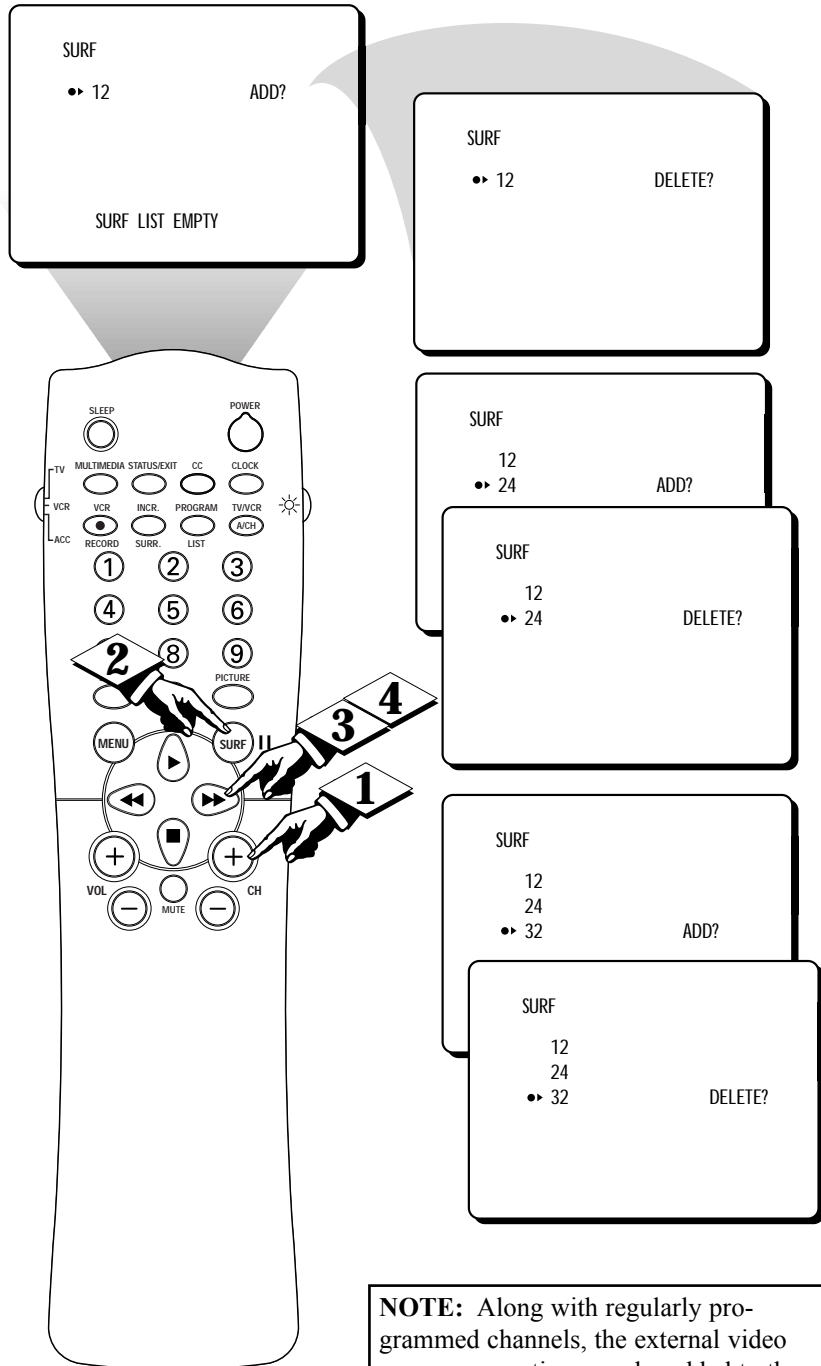
- 1 Press the CHANNEL(+) or (-) button (or the numbered buttons) to select a channel to add to the SURF list.
- 2 Press the SURF button on the remote control. The onscreen display may read, "SURF LIST EMPTY." The number of the current channel will be shown with "ADD?" to the right.
- 3 While the SURF list message or the SURF channel list appears on the screen, press the CURSOR RIGHT button to add the present channel to the SURF list.
- 4 If you want to delete the present channel from the SURF list, press the CURSOR RIGHT button again.

Repeat steps 1 through 3 to add more channels (up to 10) to the SURF list.

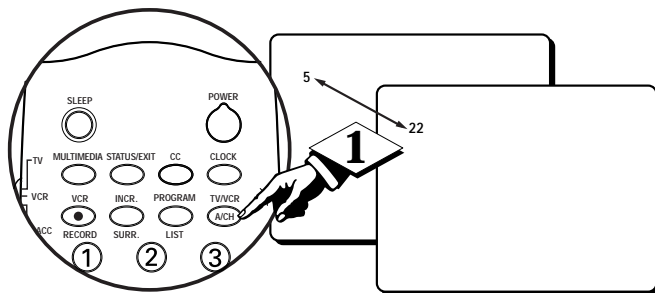


A/CH BUTTON

Your remote also has an A/CH (Alternate Channel) button. Pressing this button will toggle between the current and one previous channel.



NOTE: Along with regularly programmed channels, the external video source connections can be added to the SURF list. This means that the AV1, AV2, and AV3 channels can be added to your SURF list. Just tune to their channel and use the same procedure described on this page.



REMOTE CONTROL – OPERATING ACCESSORY DEVICES (DIRECT ACCESS)

Your remote control is capable of working your TV and many other devices that respond to infrared remote control commands, such as VCRs, cable boxes, satellite systems, and DBS. Your remote may be already, as is, to work an accessory device, or you may need to use one of the methods (“Code Entry” or “Search”) explained on pages 43 and 44.

First, try this simple test to see if your TV remote control will give you direct access to the accessory device’s functions, or if you will need to try another method in order to set up your TV remote control for that capability.

(BEGIN)

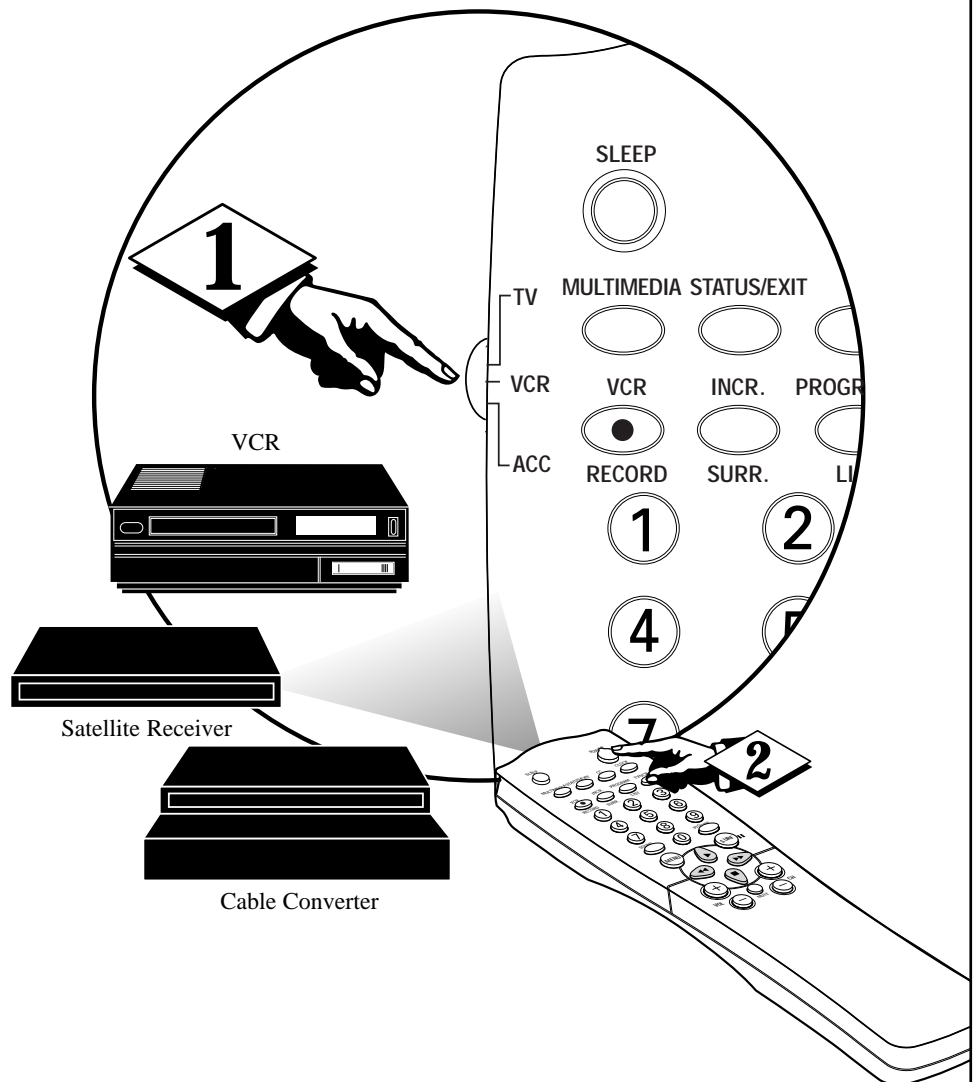
1 Place the TV/VCR/ACC mode switch in the proper position.

2 Point the remote control at the remote sensor window of the accessory device and press the POWER button.

3 Does the remote control turn the device ON?

If YES, stop and try other function buttons on the remote. If they also work the device, then the remote is ready and no further steps are needed.

If NO, go to page 43 to try the Code-Entry method.



REMOTE CONTROL – OPERATING ACCESSORY DEVICES (CODE ENTRY)



Follow these simple steps to enter a three-digit Accessory Device Code Number that will allow you to use your TV remote to work the functions of an accessory device. Please read through the steps once before performing them.

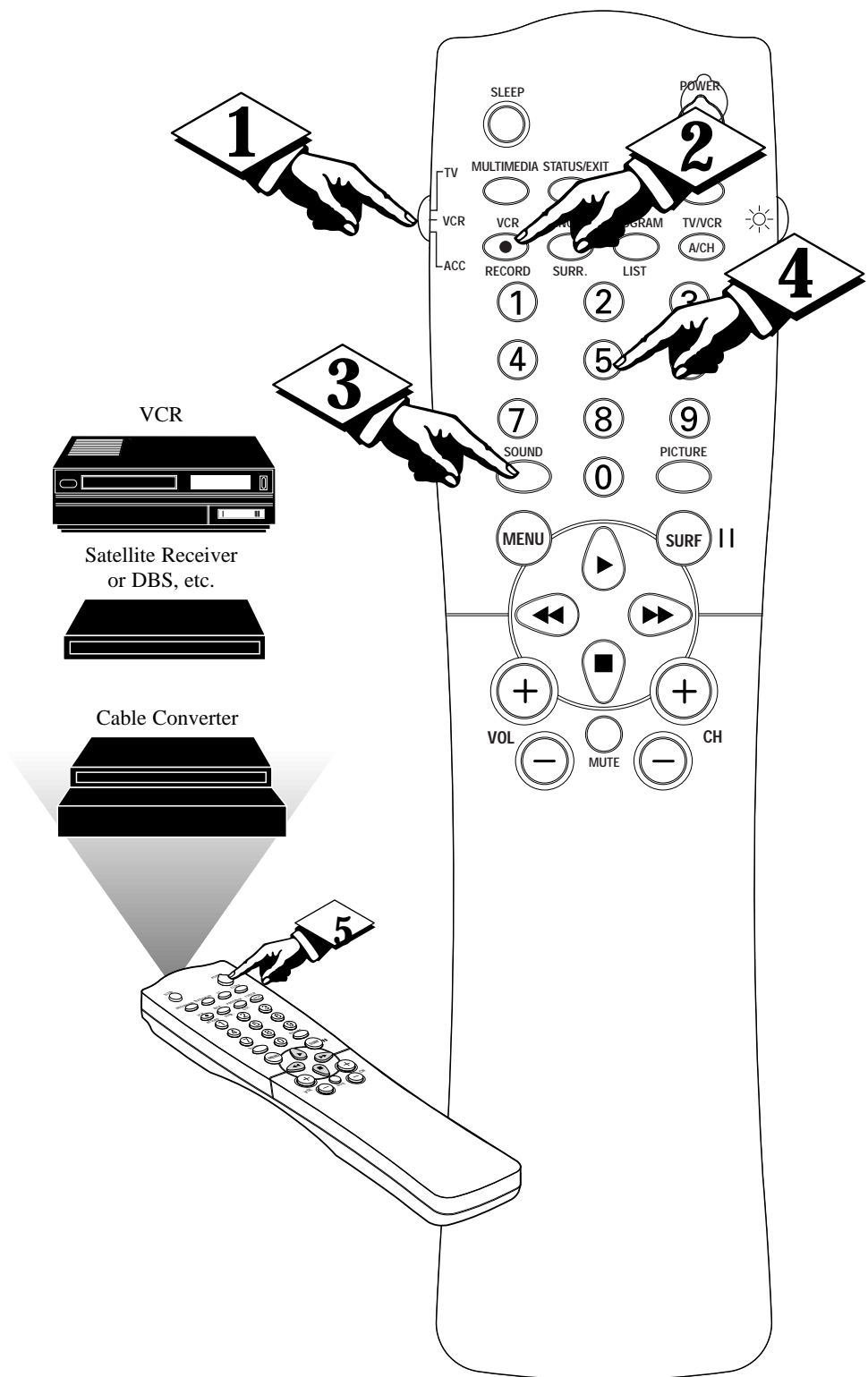
BEGIN

- 1** Look up a three-digit Accessory Device Code Number for the accessory device (found on pages 45–46) whose functions you want to work with your TV's remote control.
- 2** Press the VCR RECORD button on the remote control and release.
- 3** Press the SOUND button on the remote within 30 seconds, then release.
- 4** Enter the three-digit Direct-Entry Code Number for your desired device. The remote is now ready to send commands to the unit.
- 5** Point the remote at the remote sensor window of the device. Then press the POWER button on the remote to turn the unit ON.
- 6** Enter the three-digit Accessory Code Number for the accessory device. The TV remote control should now be ready to send commands to the accessory device.

NOTE: If the process just explained doesn't work the first time, repeat the same Accessory Device code number.

If after a second try the TV remote control does not operate your accessory device, see if other three-digit Accessory Device Code Numbers are shown for your device on the list pages 45–46 and repeat the steps above using a new number.

If after repeated attempts this method does not work for you, go to page 44 and follow the steps for using the Search method to set up your remote control.



REMOTE CONTROL – OPERATING ACCESSORY DEVICES (SEARCH)

Follow these simple steps to have your TV remote search for the code it needs to work the functions of your accessory device. Please read through the steps once before performing them.

NOTE: The Search method works only with devices equipped with channel display indicators or channel display capability.

(BEGIN)

- 1 Press the **POWER** button on the device you are attempting to program to turn it ON.
- 2 Slide the **TV/VCR/ACC** mode switch to the **VCR** position if you're setting up a VCR or to the **ACC** position if you're setting up any other accessory device.
- 3 Press the **(VCR) • RECORD** and **SOUND** buttons simultaneously and hold them down. The device will begin to change channels after the remote identifies the correct code.
- 4 When the channels start to change, release the **VCR RECORD** and **SOUND** buttons.

NOTE: Don't let the device scan up more than five channels. If you do, the remote control may pass up the correct code, and another two-minute search cycle will have to be done.

If no channel change happens within two minutes, repeat steps 1–4. Should a channel change still not occur, the remote will not work the desired device.

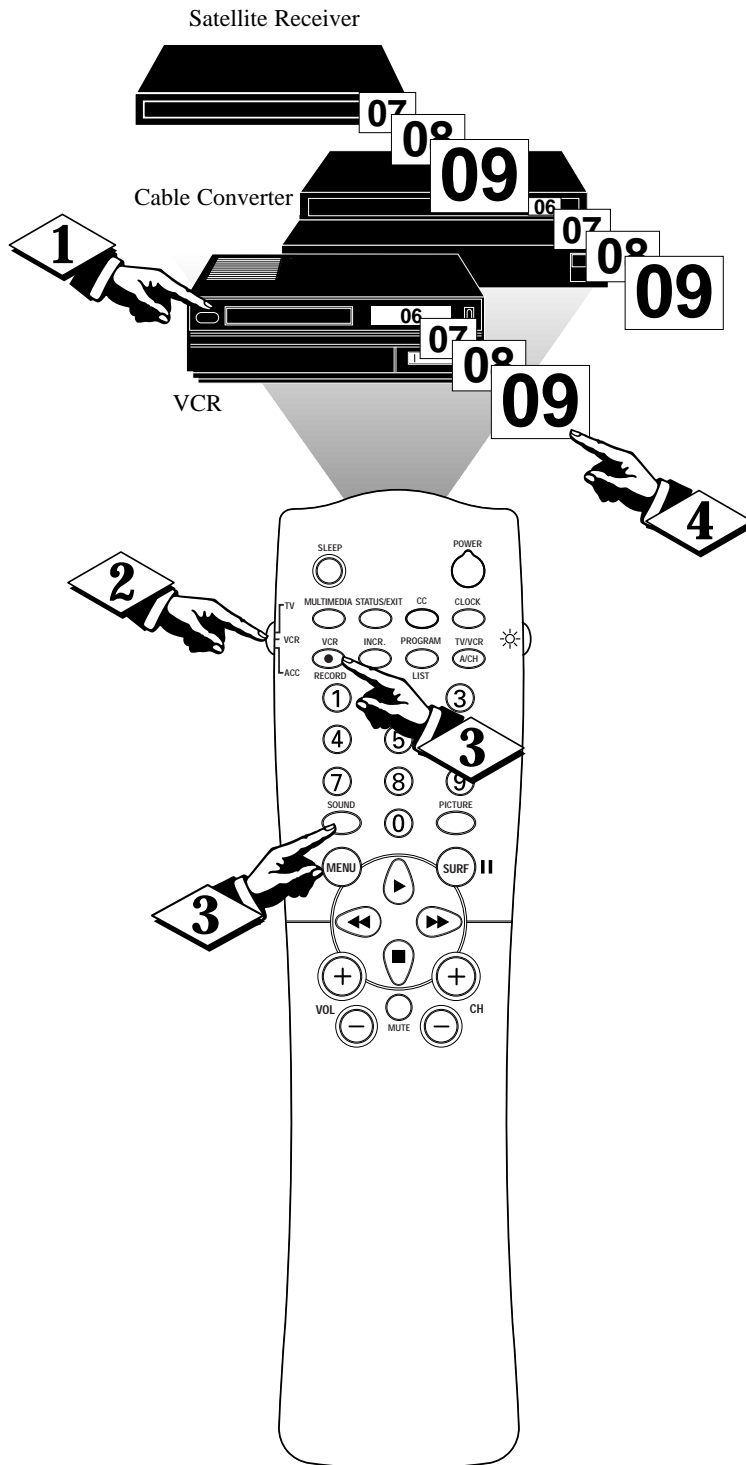


SMART HELP



Don't let the device scan up more than five channels. If you do, the remote may pass up the right code, and another two-minute search cycle will have to be done.

If no channel change happens within two minutes, repeat steps 1–4. Should a channel change still not occur, the remote control will not work the desired device.



REMOTE CONTROL – ACCESSORY DEVICE CODE NUMBERS



VCR	REMOTE CODE NO.	VCR	REMOTE CODE NO.	VCR	REMOTE CODE NO.
Admiral	.048	Loewe	.004	Sanyo	.046, 047, 104, 240, 268
Advantz	.358	Logik	.004, 072	Saville	.352
Adventure	.000	MEI	.035	Scott	.043, 045, 121, 164, 211, 212
Aiko	.278	MGA	.043, 061	Sears	.000, 035, 037, 042, 046, .047, 054, 066, 104, 105
Aiwa	.000, 037, 307, 348, 352	MGN Technology	.240	Sharp	.046, 062
Akai	.041, 049, 053, 061, 106, 315	MTC	.000, 240	Shintom	.072
Alba	.352	Magnavox	.000, 035, 081, 146, 181	Shogun	.051, 240
Amercian High	.035	Marta	.037	Shoral	.004
Amstrad	.325, 332	Matsui	.004, 348, 352	Siemens	.003
Asha	.240	Matsushita	.035, 162, 454	Singer	.072
Audiovox	.037	Memmorex	.307	Sinudyne	.004
Baird	.107	Memorex	.000, 035, 037, 039, 046, .047, 048, 104, 240, 266, 307	Sony	.000, 011, 022, 032, 033, .034, 035, 253, 275
Beaumark	.240	Metz	.003, 347	Sunkel	.348
Bell & Howell	.104	Minolta	.042, 105	Sunpak	.253
Blaupunkt	.003, 006, 154	Mitsubishi	.043, 061, 067, 075, 173, 443	Sylvania	.000, 035, 043, 081, 103, 110
Brandt	.187, 320, 321	Motorola	.035, 048	Symphonic	.000
Broksonic	.121, 184, 211, 295, 361	Multitech	.000, 072	TMK	.036, 208, 240
Bush	.352	NAD	.058	Tatung	.041
CCE	.072, 278	NEC	.036, 040, 041, 067, 104	Teac	.000, 041
Calix	.037	Nikko	.037	Technics	.035, 162
Canon	.035	Nikon	.034, 253	Teknika	.000, 035, 037
Caphart	.020	Noblex	.240	Telefunken	.187, 320, 321
Carver	.081, 146	Nordmende	.297, 320, 321	Tansal	.322
Citizen	.037, 278	Okano	.346	Thomas	.000
Colt	.072	Olympus	.035, 226	Thomson	.320
Combitach	.352	Optimus	.037, 048, 058, 104, .162, 432, 454	Toshiba	.043, 045, 066, 212, 366
Craig	.037, 047, 072, 240, 271	Optonica	.062	Totavision	.037, 240
Curtis Mathes	.035, 041, 060	Orion	.004, 295, 348, 352, 479	Towada	.322
Cybermax	.051, 240	Panasonic	.035, 077, 162, 225, .226, 378, 454	Unitech	.240
Daewoo	.020, 045, 276	Penney	.035, 037, 038, 040, .042, 065, 105	Universon	.325
Daytron	.020	Pentax	.042, 065, 105	Vactor	.045
Denon	.042	Philco	.035	Vactor Research	.038, 040
Dynatech	.000	Philips	.035, 062, 081, 110, 403	Video Concepts	.040, 045, 061
Electroponic	.037	Pilot	.037	Videosonic	.240
Emerex	.032	Pioneer	.058, 067	Wards	.000, 035, 042, 047, 048, 060, 062, .072, 081, 149, 161, 212, 240
Emerson	.000, 002, 036, 037, 043, 061 .068, 088, 121, 164, 208, 209, .211, 212, 278, 295, 361, 479	Portland	.020	XR-1000	.000, 035, 072
Ferguson	.107, 320, 321	Profax	.322	Yamaha	.038
Fisher	.047, 054, 066, 104	Profitronic	.240	Zenith	.000, 033, 034, 039
Fuji	.033, 035	Protec	.072		
Funai	.000	Pulsar	.039, 051	CABLE CONVERTOR	REMOTE CODE NO.
GE	.035, 060, 065, 202	Quarter	.046	ABC	.001, 003, 007, 008, .011, 013, 014, 017
Garrard	.000	Quartz	.046	Aliegio	.153
Go Video	.232, 279, 432	Quasar	.035, 077, 162, 454	Andover	.544
Gold Star	.037, 038	RCA	.042, 060, 065, 077, .105, 106, 149, 202	Antronix	.022
Gradiente	.000, 406	Radio Shack	.000, 037	Archer	.022, 153
Grundig	.003, 007, 195, 347	Radix	.037	Balcor	.056
HI-Q	.047	Randex	.037	British Telecom	.105
Harley Davidson	.000	Realistic	.000, 035, 037, 045, 047 .048, 062, 066, 104	Cable Star	.056
Harman/Kardon	.038, 075	Ricoh	.034, 253	Cablatenna	.022
Harwood	.068, 072	Runco	.039	Cabletime	.161, 271, 377, 448
Headquarter	.046	SEG	.322	Cableview	.022
Hinari	.004, 352	SEI	.004	Century	.153
Hitachi	.000, 004, 041, 042, .065, 105, 168, 235	STS	.042	Citizen	.153
Ingersol	.004	Saba	.297, 320, 321	Clyde	.086
JVC	.008, 041, 067, 208, 384, 486	Saisho	.004	Colour Voice	.025, 031
Jensen	.041	Salora	.075	Comtec	.274
KEC	.037, 278	Samsung	.045, 051, 053, 240	Comtronics	.040
KLH	.072	Sanky	.039, 048	Contec	.019
Kenwood	.038, 041, 067, 384	Sansui	.000, 041, 067, 271	Cryptovision	.600
Kodak	.035, 037			Deceat	.423
LXI	.037				
Lloyd's	.000, 206				



REMOTE CONTROL – ACCESSORY DEVICE CODE NUMBERS

CABLE CONVERTOR	REMOTE CODE NO.
Eastern	.002, 274
Everquest	.015, 040
Filmnet	.443
Focus	.400
France Telecom	.451
GC Electronics	.056
GEC	.086
Ganard	.153
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MNet	.443
Macon	.033
Magnavox	.027, 032, 334
Memorex	.000
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NSC	.063, 070
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Tusa	.015
Unike	.022, 153

CABLE CONVERTOR	REMOTE CODE NO.
United Artists	.007
United Cable	.003
Universal	.022, 056, 153, 191
Videoway	.250
Viewstar	.027, 063, 258
Visi Cable+	.461
Westminster	.105
Wolsey Gaine	.544
Zenith	.000, 054, 525
Zentek	.400

DBS	REMOTE CODE NO.
Alpha Star	.772
Echostar	.775
HTS	.775
Hitachi	.819
Hughes Network System	.749
Jerrold	.627
Magnavox	.722, 724
Memorex	.724
Panasonic	.701
Philips	.722, 724
Primestar	.627
RCA	.566
Sony	.639
Toshiba	.790
Uniden	.724

SATELLITE	REMOTE CODE NO.
AST	.351
Akai	.515
Alba	.352, 515, 613
Aldea	.288
Amstrad	.080, 252, 345, 461, 509, 689
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Hinari	.183

SATELLITE	REMOTE CODE NO.
Hirschmann	.397, 573
Houston	.668
Huth	.220, 243, 268
ITT	.108
Intervision	.592
JVC	.515, 571
Kathrein	.092, 504, 622, 658
La Sat	.513, 607
Lennox	.592
Lupus	.369
Luxor	.108, 573
Manhattan	.592
Maspro	.092, 336, 750
Matsui	.571
Mediamarkt	.248
Minerva	.571
Mintec	.576
Morgan's	.243, 513
Newhaus	.220
Nikko	.360, 713
Nokia	.108, 397, 573
Nordmende	.362
Orbitech	.501
Pace	.067, 183, 336, 455, 791
Paliadium	.571
Palsat	.501
Philips	.200, 292, 571, 750
Phonotrend	.288, 592
Plasmatic	.442
Proset	.288
Quadral	.362, 628
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Radix	.396
SAT	.351, 461
SEG	.369
Saba	.336
Salora	.108
Satec	.183
Schwaiger	.183, 504
Seemann	.396, 578, 626
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Sony	.704
Star Trak	.421
Strong	.421
Sunstar	.513
Tantec	.336
Techni Sat	.262, 501
Teleka	.243, 613
Tonna	.668
Triad	.351
Universum	.571
Vtech	.351
Wisi	.351, 396

DVD	REMOTE CODE NO.
Kenwood	.534
Mitsubishi	.521
Panasonic	.490
Philips	.539
Pioneer	.550
RCA	.522
Sony	.552
Toshiba	.503

REMOTE CONTROL – USING THE REMOTE’S VCR BUTTONS

When using the TV remote control with a VCR, first make certain it is set to control your VCR (by the REMOTE CODE or SEARCH method).

BEGIN

1 Set the TV/VCR/ACC mode switch to VCR on the remote control.

2 Point the top of the remote toward the front of the VCR (remote sensor window) when pressing the buttons.



VCR System Switch

Set in the VCR position to send remote commands to the VCR.

Record Button

Hold the (VCR) • RECORD button down to begin a VCR recording.

Play Button

Press to begin playback of a videotape.

Rewind Button

Press to rewind tapes. For some VCR's, the STOP button may have to be pressed first, then REWIND. In playback mode, hold down the button to view the picture moving rapidly in reverse.

Stop Button

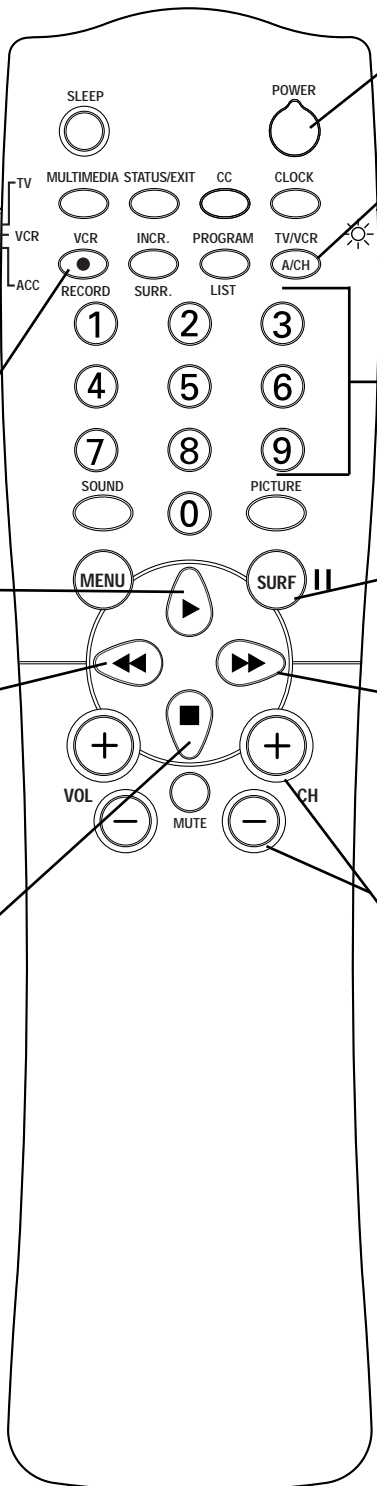
Press to stop the motion of a tape in playback, rewind, fastforward, and so on.

SMART HELP



Remember, the VCR buttons on the remote will not operate your VCR if those features are not found on your VCR remote control.

NOTE: All VCR functions (particularly Search, Rewind, Fast Forward, etc.) will operate the same as with the original VCR remote control provided with the VCR.



Power Button

Press to turn the VCR ON and OFF.

TV/VCR Button

Press while in the VCR mode (the VCR indicator on the front of the unit will light) to view the playback of a tape. Press again to place in the TV position (the VCR indicator light will go off) to view one program while recording another program.

Number Buttons

Press buttons for the direct selection of VCR channels.

Pause Button II

Press to temporarily stop the tape during a playback or recording. Press again to release Pause.

Fast Forward Button

Press to rapidly advance the tape. For some VCRs, you may need to press the STOP button first, then the FAST FORWARD button. In playback mode, hold the button down to view the picture moving rapidly in the forward direction.

Channel + and – Buttons

Press to scan up or down through the VCR channel numbers.



TROUBLESHOOTING

Please make these simple checks before calling for service. Because charges for TV installation and adjustment of customer controls are not covered under your warranty, these tips can save you time and money.

CAUTION: A video source (such as a video game, compact disc interactive [CDI], or TV information channel) that shows a constant nonmoving pattern on the TV screen can cause picture tube damage. When your TV is continuously used with such a source, the pattern of the nonmoving portion of the game (or other source) can leave a permanent image on the picture tube. When you're not using the video source, turn it OFF. Also, regularly alternate the use of such video sources with normal TV viewing.

No Power

- Check the TV power cord. Unplug the TV, wait 10 seconds, then reinsert the plug into the outlet and push the POWER button again.
- Check that the outlet is not on a wall switch.
- Be sure the fuse is not blown on the AC power strip, if one is being used.

No Picture

- Check antenna connections. Are they properly secured to the TV's ANT 75Ω plug?
- Check the TUNER MODE control for the correct tuner setting.
- Try running the Auto Program feature to find all available channels.
- Press the AV button on the remote to make sure the correct signal source is selected (AV 1, AV 2, AV 3, or S-VIDEO).

No Sound

- Check the VOLUME buttons.
- Check the MUTE button on the remote control.
- Check the SPEAKER onscreen control. If it is in the OFF position, sound at the set will be eliminated.
- If you're attempting to hook up auxiliary equipment, check the audio jack connections.
- (If applicable) Check the audio receiver for the correct operating mode.

Remote Does Not Work

- Check the batteries. If necessary, replace them with AA Heavy Duty (Zinc Chloride) or Alkaline batteries.
- Clean the remote control and the remote control sensor window on the TV.
- Check the TV power cord. Unplug the TV, wait 10 seconds, then reinsert the plug into the outlet and push the POWER button again.
- Be sure the fuse is not blown on the AC power strip, if one is being used.
- Check to be sure the TV outlet is not on a wall switch.

TV Displays Wrong Channel or No Channels Above 13

- Repeat channel selection.
- Add the desired channel numbers (using the CHANNEL EDIT control) into the TV's memory.
- Check to be sure the TUNER MODES are set to the CABLE option and run the Auto Program feature to find all available channels.

Cleaning and Care

- To avoid possible shock hazard, be sure the TV is unplugged from the electrical outlet before cleaning.
- When you are cleaning the TV, take care not to scratch or damage the screen surface (avoid wearing jewelry or using anything abrasive). Wipe the front screen with a clean cloth dampened with water. Use even, easy, vertical strokes when cleaning.
- Gently wipe the cabinet surfaces with a clean cloth or sponge dampened in a solution of cool, clear water. Use a clean, dry cloth to dry the wiped surfaces.
- Never use thinners, insecticide sprays, or other chemicals on or near the cabinet, as they might cause permanent marring of the cabinet finish.



Alternate Channel • The feature that allows you to toggle between the last two channels viewed by pressing the A/CH button on the remote control.

Auto Programming • The feature that, when activated, scans for all available channels from regular antenna or cable signals and stores only active broadcast stations in the TV's memory.

Channel Edit • The feature that allows you to add or delete channels from the list of channels stored in the TV's memory. Channel Edit makes it easy to limit or expand the number of channels that are available to you when you press the Channel (+) or (-) buttons on your remote control.

Closed Captioning • The broadcast standard feature that allows you to read the voice content of television programs on the TV screen. Designed to help the hearing impaired, Closed Captioning uses onscreen "text boxes" to show dialogue and conversations while a TV program is in progress.

Coaxial Cable • A single, solid antenna wire normally matched with a metal plug (F type) end connector that screws (or pushes) directly onto a 75-ohm input found on the television or VCR.

Direct Audio/Video Inputs • Connectors, located on the rear of the TV, used for the input of audio and video signals. These inputs are designed for use with VCRs (or other accessories) in order to receive higher picture resolution and offer sound-connection options.

Identify • The method by which a TV remote control searches and finds an operating code for another product (such as a VCR or a cable converter). After the code has been "identified," the TV remote control can operate and send commands to the other product.

Incredible Stereo (or Surround) • False acoustic management of the audio signal that produces a dramatic expansion of the wall of sound that surrounds the listener and heightens overall viewing pleasure.

Menu • An onscreen listing of feature controls that are available for you to adjust.

Multichannel Television Sound (MTS) • The broadcast standard that allows for stereo sound to be transmitted with the TV picture.

Onscreen Displays (OSD) • The wording or messages generated by the television (or VCR) to help you with specific feature controls (color adjustment or programming, for example).

Programming • The process of adding or deleting channel numbers into the television's memory circuits. Through programming, the TV "remembers" only the locally available or desired channel numbers and skips over any unwanted channel numbers.

Remote Control Sensor Window • The window or opening found on the television control panel and through which infrared remote control command signals are received.

Second Audio Program (SAP) • An additional audio channel provided for within the Multichannel Television Sound (MTS) broadcast standard. The most frequently proposed use for SAP is the simultaneous bilingual broadcast of TV material.

Status/Exit Button • The remote-control function that allows you to quickly confirm what channel number is being viewed. *Status/Exit* also can be used to clear the television of onscreen displays or information (rather than waiting for the displays to "time out," or automatically disappear from the screen).

Twin-Lead Wire • The more commonly used name for the two-strand, 300-ohm antenna wire used with many indoor and outdoor antenna systems. In many cases, this type of antenna wire requires an additional adapter (or balun) in order to connect to the 75-ohm input terminals designed into the more recent TVs and VCRs.

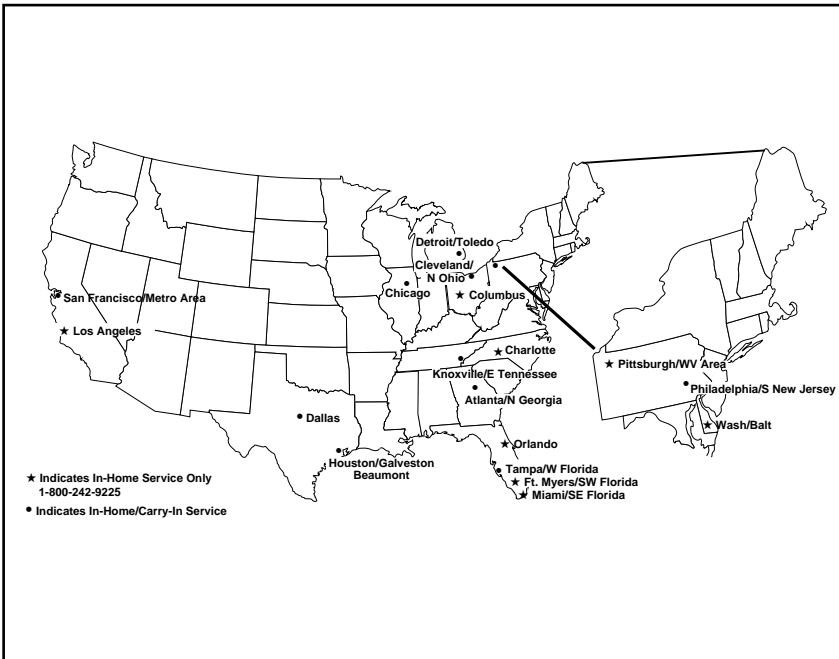


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* Refer to the *Quick Use and Installation Guide* for information.

FACTORY SERVICE LOCATIONS



NOTE: If you reside in one of our Philips Factory Service Branch areas (see directory on back), you can contact the nearest Service Branch to obtain efficient and expedient repair for your product. If your product is In-Warranty, you should have proof-of-purchase to ensure No Charge Service. For Out-of-Warranty service, call the location nearest you.

NOTA: Si vous résidez dans une des régions desservies par une succursale de service après vente du fabricant Philips (voir liste ci-dessous), vous pourrez contacter la branche de service après vente la plus près de chez vous pour obtenir un service après vente rapide et efficace. Si le produit est sous garantie, il suffira de présenter une preuve d'achat pour bénéficier d'un service sans frais. Pour les produits non couverts par la garantie, contactez le centre le plus près de chez vous.

NOTA: Si Ud. reside en una de nuestras zonas para sucursales Philips de servicio al de fábrica (ver directorio más abajo), Ud. puede comunicarse con la sucursal de servicio más cercana para obtener una reparación oportuna y eficaz de su producto. Si su producto está todavía bajo garantía, Ud. debe presentar comprobante de compra para no ocasionar ningunos cargos por servicio. Para servicio después del vencimiento de la garantía, llame al lugar más cercano de los abajo indicados.

In Canada

How you can obtain efficient and expedient carry-in, mail-in, or in-home service for your product

Please contact Philips at
1-800-661-6162 (French speaking)
1-800-363-7278 (English speaking)

Au Canada

Comment obtenir le service après-vente pour les produits apportés ou envoyés par la poste à notre centre de service ou le service à domicile

Veuillez contacter philips à:
1-800-661-6162 (Francophone)
1-800-363-7278

En el Canadá

Cómo recibir servicio eficiente para su producto, en persona, por correo o a domicilio

Favor de comunicarse con Philips al:
1-800-661-6162 (francófono)
1-800-363-7278 (anglófono)

QUALITY SERVICE IS AS CLOSE AS YOUR TELEPHONE! SIMPLY LOOK OVER THE LIST BELOW FOR THE NUMBER OF A FACTORY SERVICE CENTER NEAR YOU. YOUR PRODUCT WILL RECEIVE EFFICIENT AND EXPEDIENT CARRY-IN, MAIL-IN, OR IN-HOME SERVICE, AND YOU WILL RECEIVE PEACE OF MIND, KNOWING YOUR PRODUCT IS BEING GIVEN THE EXPERT ATTENTION OF PHILIPS' FACTORY SERVICE. AND, IF THE PHONE NUMBER LISTED FOR YOUR AREA IS LONG DISTANCE, CALL 1-800-242-9225 FOR FACTORY SERVICE.

COMMENT OBTENIR NOTRE SERVICE APRÈS VENTE RAPIDE ET EFFICACE SOIT PAR COURRIER, À DOMICILE, OU EN SE PRÉSENTANT À UN CENTRE DE SERVICE PHILIPS. PLUS DE 600 CENTRES DE RÉCEPTION DE PRODUITS À RÉPARER À TRAVERS LE PAYS: CONTACTER LE CENTRE DE SERVICE AUX CONSOMMATEURS LE PLUS PROCHE POUR SAVOIR L'EMPLACEMENT DE CES DÉPÔTS DANS UN RAYON DE 50 À 75 MILES (80 KM À 120 KM) DU CENTRE DE SERVICE LOCAL.

CÓMO OBTENER UN SERVICIO OPORTUNO Y EFICIENTE POR CORREO, EN CASA O EN PERSONA PARA SU PRODUCTO A TRAVÉS DE UN CENTRO PHILIPS DE SERVICIO. MAS DE 600 SITIOS POR TODO EL PAIS PARA LA RECEPCION DE PRODUCTOS NECESITADOS DE REPARACIONES: COMUNICARSE CON EL CENTRO DE SERVICIO DE FABRICA MAS CERCANO PARA ESTOS LUGARES DENTRO DE UN RADIO DE 80 A 120 KM (50 A 75 MILLAS) DEL CENTRO DE SERVICIO LOCAL.

GEORGIA

Philips Factory Service of Georgia
200 N. Cobb Pkwy., Suite 120
Marietta, GA 30062
(770) 795-0085

FLORIDA

Philips Factory Service of Florida
1911 US Highway 301 North
Tampa, FL 33619
(813) 621-8181

WESTERN U.S.A.

Philips Factory Service Western Region
681 East Brokaw Rd.
San Jose, CA 95112
(408) 436-8566

TEXAS

Philips Factory Service of Texas
1110 N. Post Oak Rd., Suite 100
Houston, TX 77055
(713) 682-3990

CENTRAL U.S.A.

Philips Factory Service Central US
950 Keynote Circle
Brooklyn Heights, OH 44131
(216) 741-3334

MICHIGAN

Philips Factory Service of Michigan
25173 Dequindre
Madison Heights, MI 48071
(248) 544-2110

DALLAS AREA

Philips Factory Service of Dallas
415 N. Main Street, #107
Euless, TX 76040
(713) 682-3990

ILLINOIS

Philips Factory Service of Illinois
1279 W. Hamilton Pkwy.
Itasca, IL 60143
(630) 775-0990

TENNESSEE

Philips Factory Service of East Tennessee
6700 D Papermill Rd.
Knoxville, TN 37919
(423) 584-6614

MID-ATLANTIC

Philips Factory Service Mid-Atlantic
352 Dunks Ferry Rd.
Bensalem, PA 19020
(215) 638-7500

LIMITED WARRANTY

COLOR TELEVISION

90 Days Free Labor

One Year Free Replacement of Parts (Two Years Free Replacement on Color Picture Tube)

This product can be repaired in-home.

WHO IS COVERED?

You must have proof of purchase to receive warranty service. A sales receipt or other document showing that you purchased the product is considered proof of purchase.

WHAT IS COVERED?

Warranty coverage begins the day you buy your product. For 90 days thereafter, all parts will be repaired or replaced free, and labor is free. From 90 days to one year from the day of purchase, all parts will be repaired or replaced free, but you pay for all labor charges. From one to two years from the day of purchase, you pay for the replacement or repair of all parts except the picture tube, and for all labor charges. After two years from the day of purchase, you pay for the replacement or repair of all parts, and for all labor charges.

All parts, including repaired and replaced parts, are covered only for the original warranty period. When the warranty on the product expires, the warranty on all replaced and repaired parts also expires.

WHAT IS EXCLUDED?

Your warranty does not cover:

- labor charges for installation or setup of the product, adjustment of customer controls on the product, and installation or repair of antenna systems outside of the product.
- product repair and/or part replacement because of misuse, accident, unauthorized repair or other cause not within the control of Philips Consumer Electronics Company.
- reception problems caused by signal conditions or cable or antenna systems outside the unit.
- a product that requires modification or adaptation to enable it to operate in any country other than the country for which it was designed, manufactured, approved and/or authorized, or repair of products damaged by these modifications.
- incidental or consequential damages resulting from the product. (Some states do not allow the exclusion of incidental or consequential damages, so the above exclusion may not apply to you. This includes, but is not limited to, prerecorded material, whether copyrighted or not copyrighted.)
- a product used for commercial or institutional purposes.

WHERE IS SERVICE AVAILABLE?

Warranty service is available in all countries where the product is officially distributed by Philips Consumer Electronics Company. In countries where Philips Consumer Electronics Company does not distribute the product, the local Philips service organization will attempt to provide service (although there may be a delay if the appropriate spare parts and technical manual(s) are not readily available).

MAKE SURE YOU KEEP...

Please keep your sales receipt or other document showing proof of purchase. Attach it to this owner's manual and keep both nearby. Also keep the original box and packing material in case you need to return your product.

BEFORE REQUESTING SERVICE...

Please check your owner's manual before requesting service. Adjustments of the controls discussed there may save you a service call.

TO GET WARRANTY SERVICE IN U.S.A., PUERTO RICO OR U.S. VIRGIN ISLANDS...

Contact a Philips factory service center (see enclosed list) or authorized service center to arrange repair.

(In U.S.A., Puerto Rico and U.S. Virgin Islands, all implied warranties, including implied warranties of merchantability and fitness for a particular purpose, are limited in duration to the duration of this express warranty. But, because some states do not allow limitations on how long an implied warranty may last, this limitation may not apply to you.)

TO GET WARRANTY SERVICE IN CANADA...

Please contact Philips at:

1-800-661-6162 (French Speaking)

1-800-363-7278 (English Speaking)

(In Canada, this warranty is given in lieu of all other warranties. No other warranties are expressed or implied, including any implied warranties of merchantability or fitness for a particular purpose. Philips is not liable under any circumstances for any direct, indirect, special, incidental or consequential damages, howsoever incurred, even if notified of the possibility of such damages.)

REMEMBER...

Please record the model and serial numbers found on the product below. Also, please fill out and mail your warranty registration card promptly. It will be easier for us to notify you if necessary.

MODEL # _____

SERIAL # _____

This warranty gives you specific legal rights. You may have other rights which vary from state/province to state/province.

Philips Consumer Electronics Company, P.O. Box 2976, Longview, Texas 75606, (903) 242-4800