

Pioneer

DVD LD PLAYER

DVL-919

Operating Instructions

CONGRATULATIONS ON YOUR PURCHASE OF THIS FINE PIONEER PRODUCT.

Pioneer is on the leading edge of DVD research for consumer products and this unit incorporates the latest technological developments.

We are sure you will be fully satisfied with the DVD player. Thank you for your support.

WARNING: TO PREVENT FIRE OR SHOCK HAZARD, DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.

IMPORTANT NOTICE

[For U.S. and Canadian models]

The serial number for this equipment is located on the rear panel. Please write this serial number on your enclosed warranty card and keep it in a secure area. This is for your security.

CAUTION: This product satisfies FCC regulations when shielded cables and connectors are used to connect the unit to other equipment. To prevent electromagnetic interference with electric appliances such as radios and televisions, use shielded cables and connectors for connections.

THE POWER SWITCH IS SECONDARY CONNECTED AND THEREFORE DOES NOT SEPARATE THE UNIT FROM MAINS POWER IN STANDBY POSITION.

[For Canadian model]

CAUTION: TO PREVENT ELECTRIC SHOCK DO NOT USE THIS (POLARIZED) PLUG WITH AN EXTENSION CORD, RECEPTACLE OR OTHER OUTLET UNLESS THE BLADES CAN BE FULLY INSERTED TO PREVENT BLADE EXPOSURE.

ATTENTION: POUR PREVENIR LES CHOCS ELECTRIQUES NE PAS UTILISER CETTE FICHE POLARISEE AVEC UN PROLONGATEUR, UNE PRISE DE COURANT OU UNE AUTRE SORTIE DE COURANT, SAUF SI LES LAMES PEUVENT ETRE INSEREES A FOND SANS EN LAISSER AUCUNE PARTIE A DECOUVERT.

Please read through these operating instructions so you will know how to operate your model properly. After you have finished reading the instructions, put them away in a safe place for future reference.

- This player is not suitable for commercial use.

IMPORTANT



The lightning flash with arrowhead symbol, within an equilateral triangle, is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

CAUTION

**RISK OF ELECTRIC SHOCK
DO NOT OPEN**

CAUTION:

TO PREVENT THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). NO USER-SERVICEABLE PARTS INSIDE. REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.



The exclamation point within an equilateral triangle is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

IMPORTANT SAFETY INSTRUCTIONS

READ INSTRUCTIONS — All the safety and operating instructions should be read before the product is operated.

RETAIN INSTRUCTIONS — The safety and operating instructions should be retained for future reference.

HEED WARNINGS — All warnings on the product and in the operating instructions should be adhered to.

FOLLOW INSTRUCTIONS — All operating and use instructions should be followed.

CLEANING — Unplug this product from the wall outlet before cleaning. The product should be cleaned only with a polishing cloth or a soft dry cloth. Never clean with furniture wax, benzene, insecticides or other volatile liquids since they may corrode the cabinet.

ATTACHMENTS — Do not use attachments not recommended by the product manufacturer as they may cause hazards.

WATER AND MOISTURE — Do not use this product near water — for example, near a bathtub, wash bowl, kitchen sink, or laundry tub; in a wet basement; or near a swimming pool; and the like.

ACCESSORIES — Do not place this product on an unstable cart, stand, tripod, bracket, or table. The product may fall, causing serious injury to a child or adult, and serious damage to the product. Use only with a cart, stand, tripod, bracket, or table recommended by the manufacturer, or sold with the product. Any mounting of the product should follow the manufacturer's instructions, and should use a mounting accessory recommended by the manufacturer.

CART — A product and cart combination should be moved with care. Quick stops, excessive force, and uneven surfaces may cause the product and cart combination to overturn.



VENTILATION — Slots and openings in the cabinet are provided for ventilation and to ensure reliable operation of the product and to protect it from overheating, and these openings must not be blocked or covered. The openings should never be blocked by placing the product on a bed, sofa, rug, or other similar surface. This product should not be placed in a built-in installation such as a bookcase or rack unless proper ventilation is provided or the manufacturer's instructions have been adhered to.

POWER SOURCES — This product should be operated only from the type of power source indicated on the marking label. If you are not sure of the type of power supply to your home, consult your product dealer or local power company.

LOCATION — The appliance should be installed in a stable location.

NONUSE PERIODS — The power cord of the appliance should be unplugged from the outlet when left unused for a long period of time.

GROUNDING OR POLARIZATION

If this product is equipped with a polarized alternating current line plug (a plug having one blade wider than the other), it will fit into the outlet only one way. This is a safety feature. If you are unable to insert the plug fully into the outlet, try reversing the plug. If the plug should still fail to fit, contact your electrician to replace your obsolete outlet. Do not defeat the safety purpose of the polarized plug.

If this product is equipped with a three-wire grounding type plug, a plug having a third (grounding) pin, it will only fit into a grounding type power outlet. This is a safety feature. If you are unable to insert the plug into the outlet, contact your electrician to replace your obsolete outlet. Do not defeat the safety purpose of the grounding type plug.

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 at plugs, convenience receptacles, and the point where they exit from the product.

OUTDOOR ANTENNA GROUNDING — If an outside antenna or cable system is connected to the product, be sure the antenna or cable system is grounded so as to provide some protection against voltage surges and built-up static charges. Article 810 of the National Electrical Code, ANSI/NFPA 70, provides information with regard to proper grounding of the mast and supporting structure, grounding of the lead-in wire to an antenna discharge unit, size of grounding conductors, location of antenna-discharge unit, connection to grounding electrodes, and requirements for the grounding electrode. See Figure A.

LIGHTNING — For added protection for this product during a lightning storm, or when it is left unattended and unused for long periods of time, unplug it from the wall outlet and disconnect the antenna or cable system. This will prevent damage to the product due to lightning and power-line surges.

POWER LINES — An outside antenna system should not be located in the vicinity of overhead power lines or other electric light or power circuits, or where it can fall into such power lines or circuits. When installing an outside antenna system, extreme care should be taken to keep from touching such power lines or circuits as contact with them might be fatal.

OVERLOADING — Do not overload wall outlets, extension cords, or integral convenience receptacles as this can result in a risk of fire or electric shock.

OBJECT AND LIQUID ENTRY — Never push objects of any kind into this product through openings as they may touch dangerous voltage points or short-out parts that could result in a fire or electric shock. Never spill liquid of any kind on the product.

SERVICING — Do not attempt to service this product yourself as opening or removing covers may expose you to dangerous voltage or other hazards. Refer all servicing to qualified service personnel.

DAMAGE REQUIRING SERVICE — Unplug this product from the wall outlet and refer servicing to qualified service personnel under the following conditions: When the power-supply cord or plug is damaged. If liquid has been spilled, or objects have fallen into the product.

If the product has been exposed to rain or water. If the product does not operate normally by following the operating instructions. Adjust only those controls that are covered by the operating instructions as an improper adjustment of other controls may result in damage and will often require extensive work by a qualified technician to restore the product to its normal operation.

If the product has been dropped or damaged in any way.

When the product exhibits a distinct change in performance — this indicates a need for service.

REPLACEMENT PARTS — When replacement parts are required, be sure the service technician has used replacement parts specified by the manufacturer or have the same characteristics as the original part. Unauthorized substitutions may result in fire, electric shock, or other hazards.

SAFETY CHECK — Upon completion of any service or repairs to this product, ask the service technician to perform safety checks to determine that the product is in proper operating condition.

WALL OR CEILING MOUNTING — The product should not be mounted to a wall or ceiling.

HEAT — The product should be situated away from heat sources such as radiators, heat registers, stoves, or other products (including amplifiers) that produce heat.

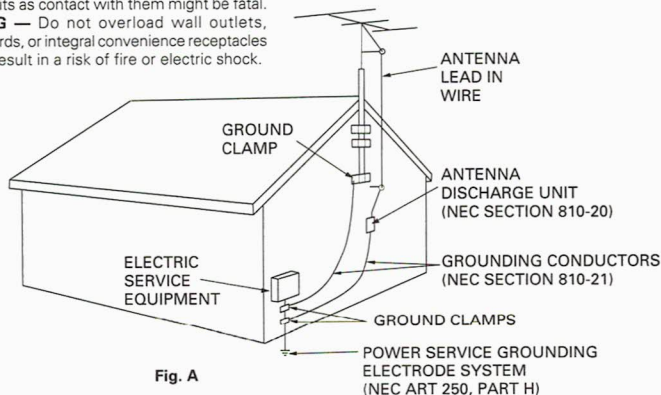


Fig. A

NEC - NATIONAL ELECTRICAL CODE

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

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

Information to User

Alteration or modifications carried out without appropriate authorization may invalidate the user's right to operate the equipment.

CAUTION

- Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.
- The use of optical instruments with this product will increase eye hazard.

[For Canadian model]

This Class B digital apparatus meets all requirements of the Canadian Interference-Causing Equipment Regulations.

[Pour le modèle Canadien]

Cet appareil numérique de la Classe B respecte toutes les exigences du Règlement sur le matériel brouilleur du Canada.










Disc Types Compatible with This Unit

- The marks shown on the right are found on disc labels or on disc cases.
All of the disc types listed in the table at right can be played on this unit without any adapter.
- To prevent malfunction, do not use an 8 cm (3 in.) adaptor (for CDs).

This unit complies with the NTSC color standard.

Discs other than those mentioned at right cannot be played.
To prevent possible problems, do not attempt to play other disc types.

Examples: DVD audio, CD-ROM, LD-ROM, DVD-ROM, High Definition LD, DVD that has a different region No. than this unit, etc. (Refer to "Glossary on page 55.)

Types of playable discs and their symbols	Diameter/Playable sides	Playback time
	DVD VIDEO	Digital audio Digital video (MPEG 2)
	12 cm (5 in.)/ single-sided	1 layer 2 layers 133 min. 242 min.
	12 cm (5 in.)/ double-sided	1 layer 2 layers 266 min. 484 min.
	DVD VIDEO	Digital audio Digital video (MPEG 2)
	8 cm (3 in.)/ single-sided	1 layer 2 layers 41 min. 75 min.
	8 cm (3 in.)/ double-sided	1 layer 2 layers 82 min. 150 min.
	VIDEO CD	Digital audio Digital video (MPEG 1) Max. 74 minutes
	VIDEO CD single	Digital audio Digital video (MPEG 1) Max. 20 minutes
	CD	Digital audio Digital video (MPEG 1) Max. 74 minutes
	12 cm (5 in.)/ single-sided	
	CD single	Digital audio Digital video (MPEG 1) Max. 20 minutes
	8 cm (3 in.)/ single-sided	
	CDV	Digital audio (max. 20 min.) (Audio part) Digital audio + video (max. 5 min.) (Video part)
	12 cm (5 in.)/ single-sided	
	VSD	Digital audio + video (max. 5 min.) (Video part) In these operating instructions, the VSD is treated as a kind of CDV.
	12 cm (5 in.)/ single-sided	
  	LD	CAV 1 hour on a double-sided disc
	30 cm (12 in.)	CLV 2 hours on a double-sided disc
	LD	CAV 28 min. on a double-sided disc
	20 cm (8 in.)	CLV 40 min. on a double-sided disc
	LD Single	CAV 14 min. on a single-sided disc
	20 cm (8 in.)	CLV 20 min. on a single-sided disc

Contents

Preparation

- Connecting the Player
 - Connection example 1 AV amplifier with a built-in decoder
 - Connection example 2 AV amplifier without a built-in decoder
 - Connection example 3 To a TV with video input
 - Connection example 4 To a TV with component video input
- Names and Functions
 - Remote control
 - Front panel
 - Display window
 - Rear panel

Basic Operation

- Playing DVDs, CDs, or Video CDs
- Playing LDs
- Skip Forward/Skip Back
- Stopping Playback /Switching Power Off

Settings

- Main Menu
- Changing Settings
- Changing Picture and Sound Quality
- Memorizing Settings for Your Favorite DVDs (Condition Memory)
- Selecting Languages (Multi-Language)
- Changing Audio Type
- Selecting a Subtitle Language (Multi-Language Subtitles)
- Viewing from a Different Camera Angle (Multi-Angle)
- Viewing Disc Information

Detailed Operation

- Resuming Playback After Stopping
- Searching for a Desired Scene (Title Search)
- Searching for a Desired Scene/Audio Track (Chapter/Track/Time/Frame Search)
- Playback in a Desired Order (Programmed Play)
- Repeat Play
- Still/Slow/Step Playback
- Random Play

Other

- Troubleshooting
- For Proper and Long Use
- Glossary
- Language Code List
- Specifications

Applicable discs



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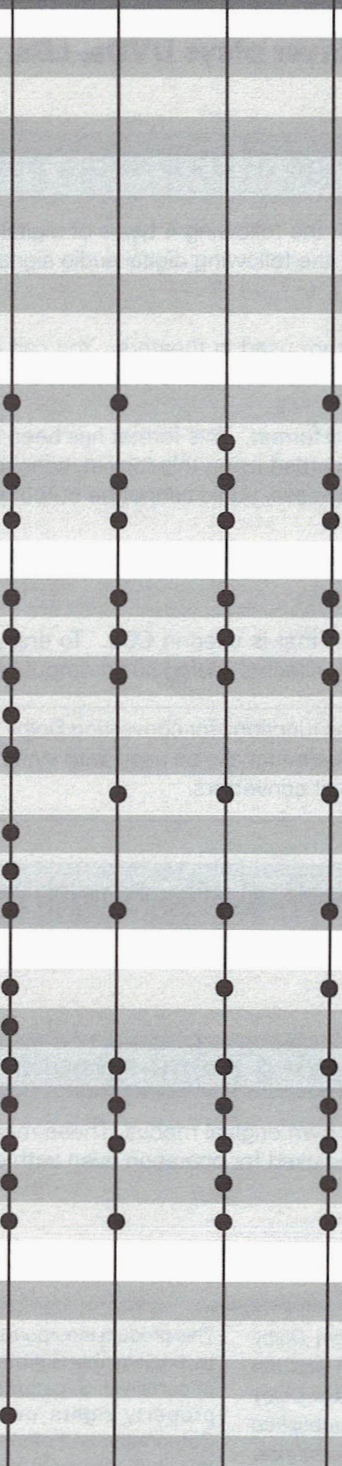
Preparation

Basic Operations

Settings

Detailed Operations

Other



All This and More!

The Pioneer DVD LD player plays DVDs, LDs, video CDs (with PBC), and audio CDs.

Supports a wide range of DVD audio output formats

DVD discs are recorded in one of the following 4 types of digital audio formats (as of September 1998). The digital audio output jacks of this player output any of the following digital audio signals.

- **Dolby Digital ***
This is a surround sound system used in theaters. You can enjoy Dolby Digital surround sound from DVDs that have been recorded using Dolby Digital by connecting this product to a Dolby Digital decoder or an AV amplifier that includes this decoder.
- **DTS****
This is another surround sound format. This format has been rapidly adopted by many theaters. To enjoy DTS surround sound from DVDs that have been recorded using this format, connect this product to a DTS decoder or an AV amplifier that includes this decoder. Note that, in this case, audio cannot be output via an analog audio output jack.
- **MPEG**
To enjoy DVDs recorded using the MPEG audio format, connect this product to an MPEG decoder or an AV amplifier that includes this decoder.
- **Linear PCM**
This is the same audio format that is used in CDs. To enjoy digital audio output, connect this product to an amplifier that includes a D/A converter. Two-channel analog audio output can also be set via the audio output jacks.

This product includes functions for converting Dolby Digital and MPEG audio into the Linear PCM format. This means that this product can be used with systems that play conventional CDs without any need for additional decoders or converters.

Enjoy spacious acoustical effects with only two front speakers (see page 37)

Set Virtual Dolby Surround*** mode to enjoy spacious effects without any additional surround-type speakers.


Operation while viewing menu screens (GUI: Graphical User Interface) (page 29)

DVDs come recorded with their own original menus. These menus are operated with the direction buttons. With the PIONEER player, the player's menus can be used for operation even with discs that have not been recorded with menus.

* *Manufactured under license from Dolby Laboratories. "Dolby", "AC-3" and the double-D symbol are trademarks of Dolby Laboratories. Confidential Unpublished Works, © 1992-1997 Dolby Laboratories, Inc. All rights reserved.*

** *"DTS" is a trademark of Digital Theater Systems, Inc.*

This product incorporates copyright protection technology that is protected by method claims of certain U. S. patents and other intellectual property rights owned by Macrovision Corporation and other rights owners. Use of this copyright protection technology must be authorized by Macrovision Corporation, and is intended for home and other limited viewing uses only unless otherwise authorized by Macrovision Corporation. Reverse engineering or disassembly is prohibited.

*** SRS Labs, Inc.'s TruSurround system  has been adopted as virtual technology.

TruSurround is a trademark of SRS Labs, Inc. SRS and the SRS symbol are registered trademarks of SRS Labs, Inc. in the United States and selected foreign countries.

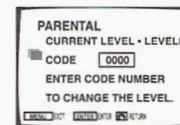
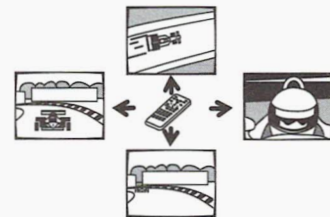
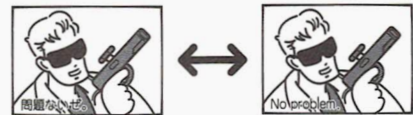
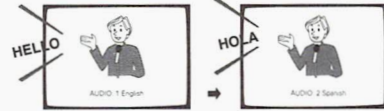
TruSurround is incorporated under license from SRS Labs, Inc.

Permission to use TruSurround technology has been registered through SRS Labs, Inc.

☆ This mark is used to indicate functions that may not operate with certain discs.

Enjoy the whole array of special functions that DVD has to offer

- **Multiple Languages** (see page 41)☆
Discs that contain multiple audio recordings can be played back in various languages.
- **Multilingual Subtitles** (see page 42)☆
You can select from a variety of languages used in subtitles.
- **Multi Aspect** (see page 33)☆
When playing discs that support wide-screen TV, you can select among various display formats (Wide Screen, Letterbox, Pan & Scan, etc.).
- **Multi angle** (see page 42)☆
You can even select different camera angles for the same scene.
- **Parental level** (see page 31)☆
Parental levels (user restriction levels) can be set so that, for example, a scene that is considered too violent for children will be skipped over.



Tips on reading these operating instructions

Explanations in this manual are grouped into the following five sections:

- Preparation** This section explains how to connect equipment.
- Basic Operations** This section explains how to use the playback function, power on/off function, and other basic functions.
- Settings** This section describes the wide array of user-selected functions.
- Detailed Operations** This section explains operations such as programmed playback and repeat playback.
- Other** This section explains other important items concerning this player.

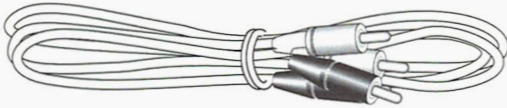
The following guide marks are used in this manual.

- Indicates explanations concerning DVD functions.
- Indicates explanations concerning LD functions.
- Indicates explanations concerning CD functions.
- Indicates explanations concerning Video CD functions.
- Indicates important points concerning operation of this unit.
- Indicates explanations of precautions concerning operation of the unit.
- Indicates suggestions and other supplementary explanations.

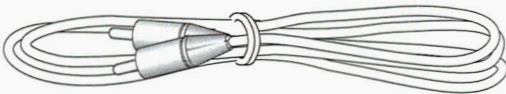
Before Using

Checking accessories

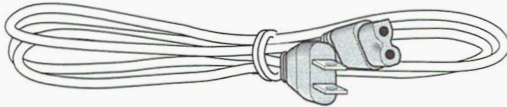
Audio cord



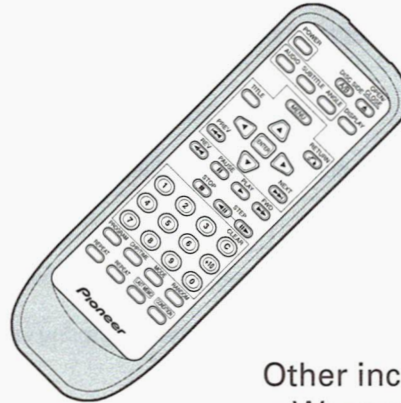
Video cord



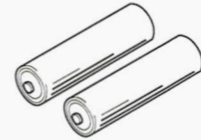
Power cord



Remote control unit



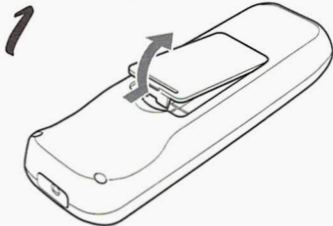
Batteries(AA/R6P) ... 2



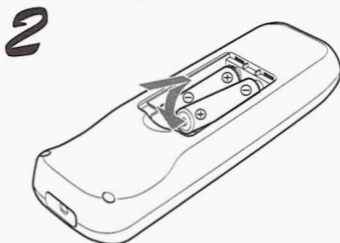
Other included items:

- Warranty card
- Operating Instructions (this manual)

Inserting batteries into the remote control

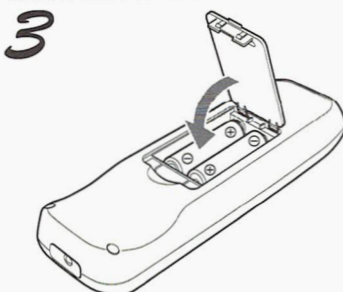


While pressing the back cover, pull out in the direction indicated by the arrow.



Insert batteries.

Make sure to match the plus (+) and minus (-) polarity guides on the batteries with the marks inside the battery compartment.



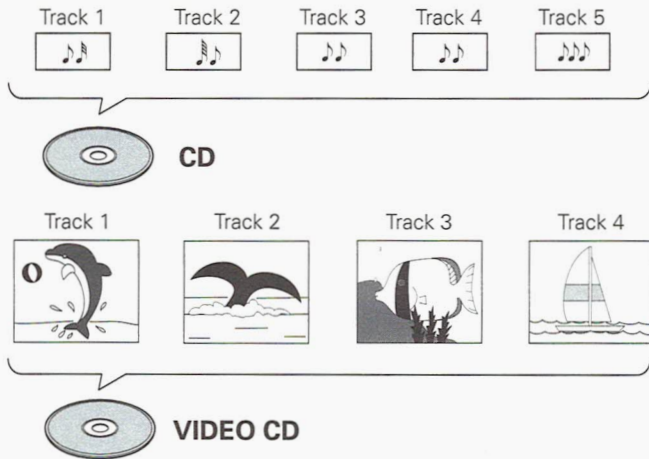
Close the cover.

Note

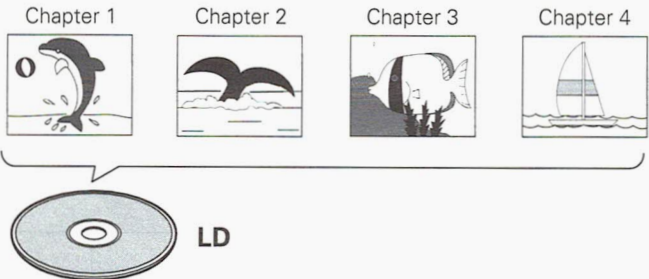
- ◆ Do not mix old and new batteries.
- ◆ When replacing batteries, use all new batteries.
- ◆ When not using the remote control for a long period of time (over 1 month), remove the batteries to avoid possible damage from battery corrosion. If battery leakage occurs, wipe the battery liquid from the battery component, then insert new batteries.

Disc contents

The contents of CDs and Video CDs are divided into tracks. (Generally, each track contains one song. In some cases, tracks can be further divided into indexed sections.)

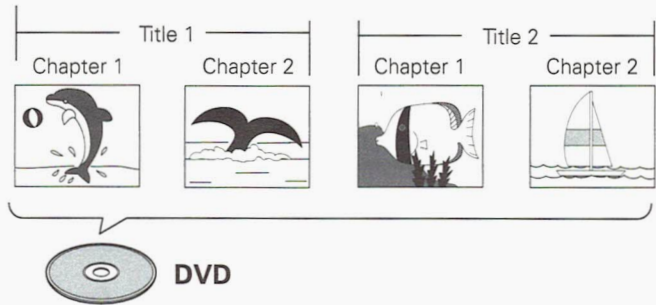


The contents of LDs are divided into chapters. The organization of LD chapters varies from disc to disc.





The contents of DVDs are divided into titles, which in turn are divided into chapters. However, the menu screen does not belong to any titles.

For movies, one movie generally corresponds to one title. On Karaoke discs, 1 song corresponds to 1 title. This is not always the case, though, which should be noted when using the search function or programming functions.




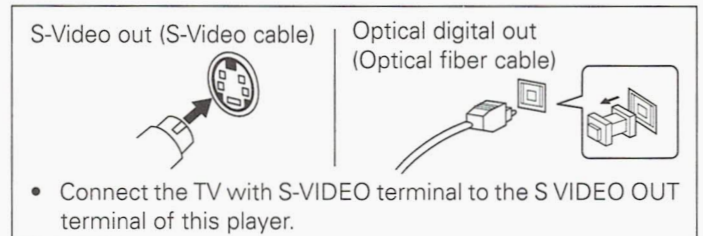
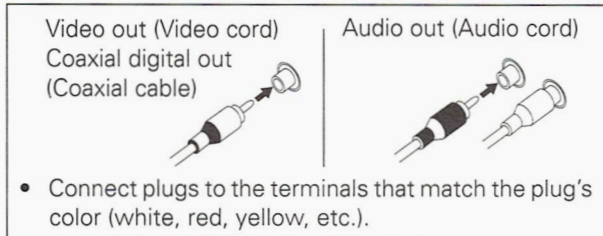
Disc operations

Certain disc operations for DVD discs may be disabled as required by the disc manufacturer. Consequently, disc operation and functions available on one disc may not be available on another disc. When using a Pioneer DVD LD Player, the following marks appear on the screen when an operation or function is prohibited by the disc manufacturer. When playing discs that support interactive operations via menus or during playback, the disc is played in linked sections rather than continuously, so certain operations such as repeat and program operations may not be usable with these discs. The Pioneer DVD LD Player (hereafter called "the player") displays one of the following prohibition marks on the TV screen in such cases.

- Mark indicating use prohibition by disc. 
- Mark indicating use prohibition by player. 



Connecting the Player

When making connections to this unit or when changing connections, always be sure to set the unit in standby mode by pressing the  STANDBY/ON switch, and unplug the power cord from the power outlet. Please also refer to the instruction manuals for the components that you are connecting (AV amplifier, TV etc.)



- In the connection diagrams shown on pages 14 to 17, the connection cords marked in dark colors (—) indicate the recommended connection methods. If the recommended connection method is not available, connect using the method indicated by cords marked in faded colors (—).
- DVD includes a wide variety of audio formats from different discs. After completing the cord connections, check them against the player's Output Settings menu (see pages 34 and 35) during stop mode.
- The correct connection method may differ depending on the type of connected component. See the page describing your type of component (check the table below).

Component being connected to this unit	Connection example	Output setting on this unit <ul style="list-style-type: none"> • The following are items to be changed from their factory settings. For details, refer to pages 34 and 35. See page 30 for instructions on restoring the factory settings.
AV amplifier with built-in Dolby Digital decoder*	Example 1 (page 14)	Use factory settings (no changes).
AV amplifier with built-in DTS decoder*	Example 1 (page 14)	Set "DTS" item to "ON."
AV amplifier with built-in MPEG decoder*	Example 1 (page 14)	Set "MPEG" item to "MPEG."
AV amplifier with built-in D/A convertor	Example 2 (page 15)	Set "DOLBY DIGITAL" item to "DOLBY DIGITAL ⇒ PCM."
Amplifier other than above or stereo amplifier	Example 2 (page 15)	Use factory settings (no changes).
TV with video input jack	Example 3 (page 16)	Use factory settings (no changes).
TV with component input jacks	Example 4 (page 17)	Set "VIDEO OUT" item to "COMPONENT."

- When connecting to a component bearing the Pioneer  mark:
If you use a commercially available cord with a mini plug (no resistance) to connect this player's CONTROL IN jack to the CONTROL OUT jack of another component bearing the  mark, you can control the player as a system component (via system control).
- Note, however, that when the player has been connected for system control, you cannot operate it by pointing the remote control at it. Instead, point the remote control at the connected component (AV amplifier, etc.).
- When controlling the player as part of a system, **be sure to connect it to the amplifier via audio and video cords even if you are using only digital components.**
- For more details, refer to the connected component's Operating Instructions.

Precautions when connecting the player

This product employs an analog copy protection method. If you connect the player to a TV via a VCR, or record and playback the contents of a disc with a VCR, the playback picture may not be normal.

Generally, this product uses the following two output methods.

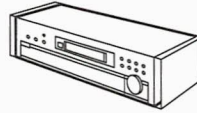
1. S video output/video output (See connection examples 1, 2, and 3)
2. Component video output (See connection example 4)

Use the player's menu operations to set the video output mode to suit the connected video output type. (The factory setting is S video output/video output.) Incorrect video output may result if incompatible connection methods and settings are used.

Connecting the Player

Connection example 1

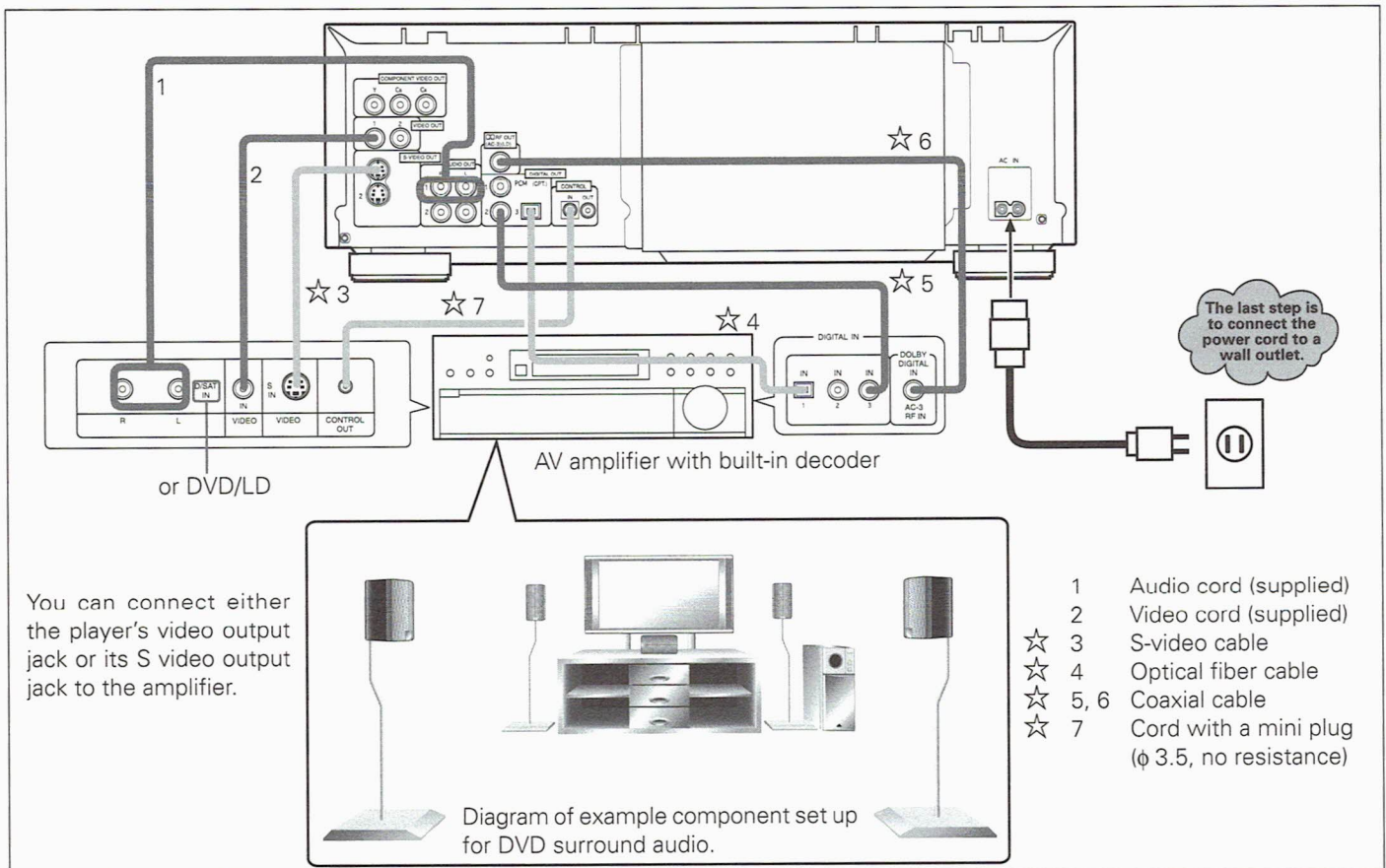
Connecting to an AV amplifier with a built-in decoder



Refer to this example when connecting to the digital input jack of an AV amplifier that includes any of the following decoders.

- Dolby Digital (AC-3) decoder
- DTS decoder
- MPEG decoder
- Set the digital output via the menu screen that appears during the stop mode so that it suits the connected AV amplifier. (See pages 34 and 35.)

- Connect the player's digital output jack (coaxial digital out 2 or optical out) to the digital input jack (Dolby Digital {AC-3}, DTS, or MPEG) of an AV amplifier with a built-in decoder. Select the type of output jack – coaxial digital output jack 2 or optical output jack – to use on the player according to the amplifier's input jack.
- If the amplifier has a built-in Dolby Digital decoder, connect the player's RF output (for LDs) to the amplifier's Dolby Digital (AC-3) RF input jack.
- There is no digital output of analog audio signals from LDs, so the player's audio output jack also should be connected to the amplifier's audio input jack.
- **Set "(S) VIDEO" as the player's video output mode via the menu screen (this is the factory setting). (See page 35.)**
- **Select the aspect ratio that best suits your TV. (See page 33.)**



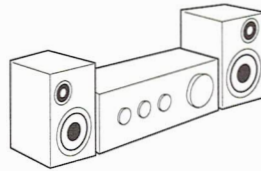
Note

☆ Indicates use of commercially available cables.

There will be no sound output from the AUDIO OUT jacks and coaxial DIGITAL OUT 1 (PCM) jack during DTS audio playback.

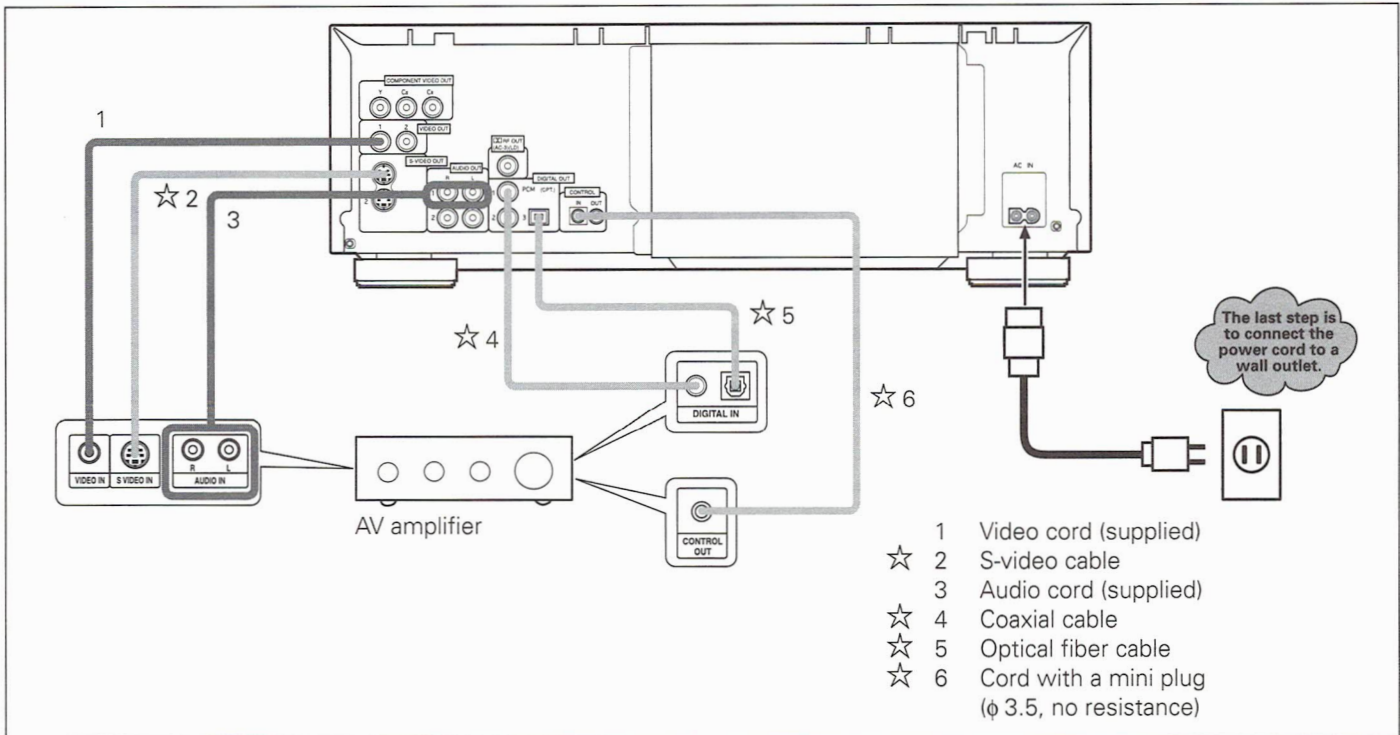
Connection example 2

Connecting to an AV amplifier without a built-in decoder or an AV amplifier with a built-in D/A converter



Refer to this example when connecting to an ordinary AV amplifier, stereo amplifier or an amplifier with a built-in D/A converter.

- Connect the player's audio output jacks to the amplifier's CD, LD, AUX, or other audio input jacks. (Do not connect to PHONO jacks.)
- Connect the player's video output jack to the amplifier's video input jack. You can use either the video output jack or the S video output jack. When connecting a digital output, use either the coaxial DIGITAL OUT 1 (PCM) jack or the optical DIGITAL OUT jack.
- There is no digital output of analog audio signals from LDs, so the player's audio output jack also should be connected to the amplifier's audio input jack.
- **Set "(S) VIDEO" as the player's video output mode via the menu screen (this is the factory setting). (See page 35.)**
- **Select the aspect ratio that best suits your TV. (See page 33.)**
- If you are using a Dolby Pro Logic AV amplifier, you can enjoy surround effect.



Note

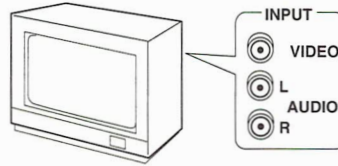
☆ Indicates use of commercially available cables.

Connecting the Player

Refer to one of the following two examples to suit the type of your TV.

Connection example 3

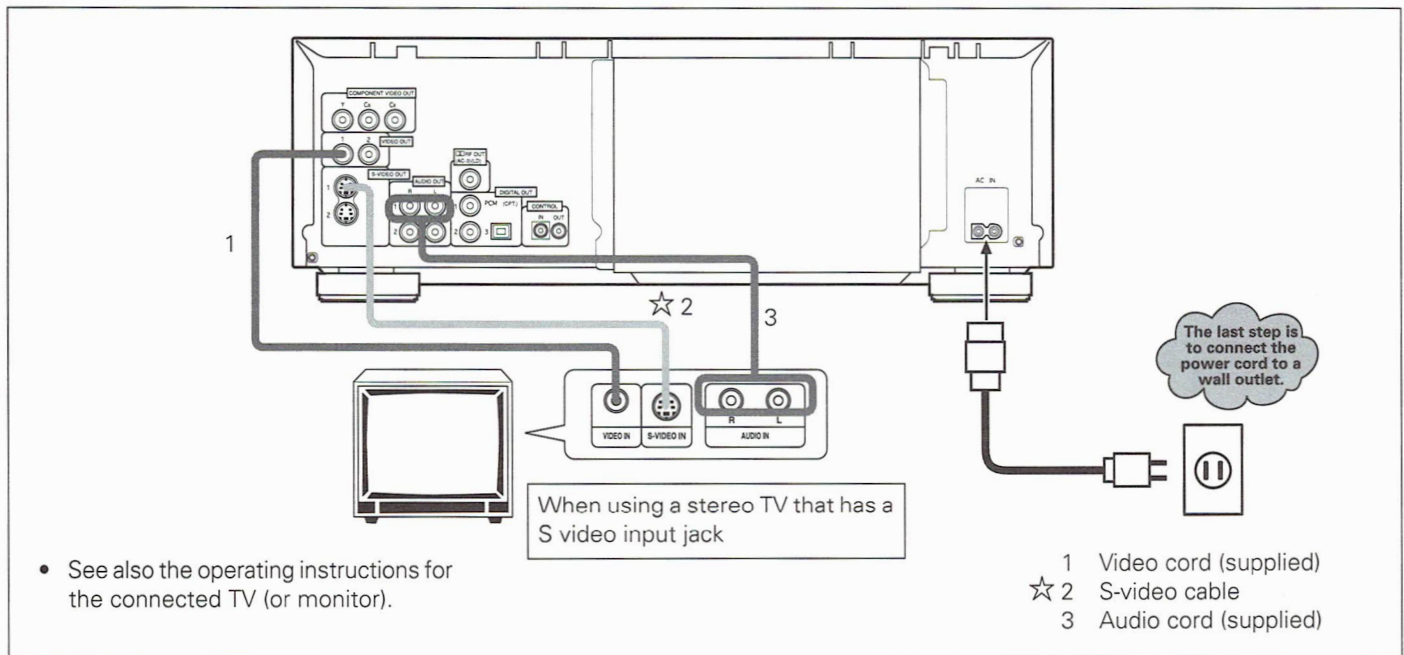
Connecting to a TV with video input jack



This is the easiest connection method to use if your TV has an unused video input jack.

- **Select the aspect ratio that best suits your TV. (See page 33.)**

- Match the color-coded (white, red, and yellow) jacks and plugs when connecting.
- Connect the TV's S video input jack to the player's S video output jack to enjoy sharper video images.
- **Set "(S) VIDEO" as the player's video output mode via the menu screen (this is the factory setting). (See page 35.)**

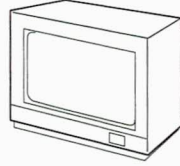


Note

☆ Indicates use of commercially available cables.

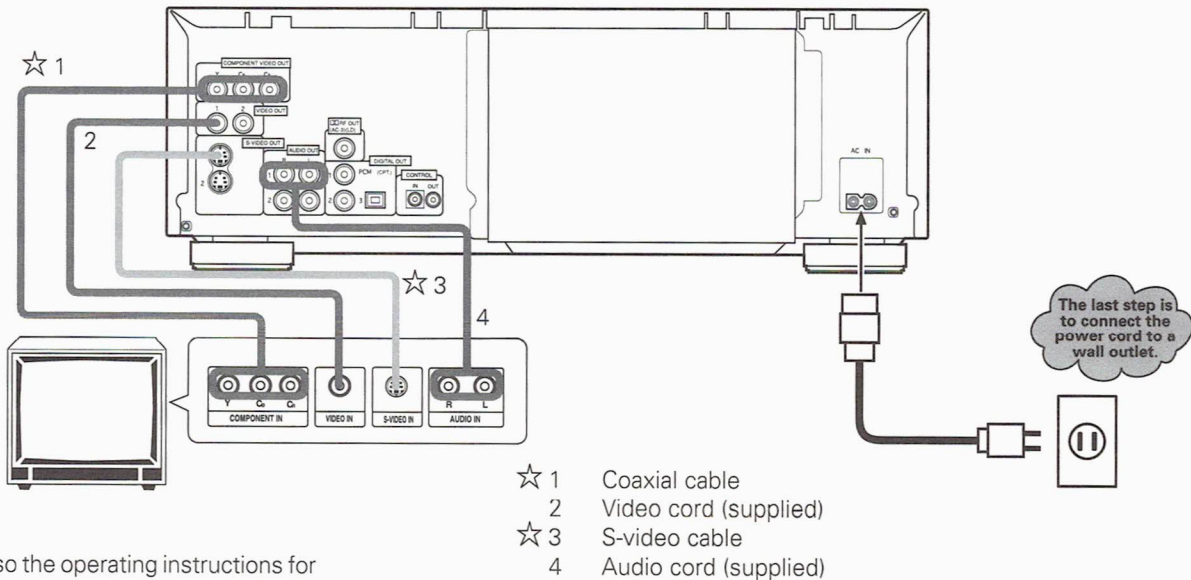
Connection example 4

Connecting to a TV with component video input



You can enjoy better picture quality by using a TV that has component video inputs. (You may not be able to connect to color difference inputs (Y, P_B, P_R) on high-definition TVs.)

- A TV that has component input jacks can be used for video input. This will provide higher picture quality during playback.
- The names of the component input jacks differ among different TVs.
- LD video will be output in black and white from the COMPONENT VIDEO OUT jacks. Be sure to also connect the video output jack using the supplied video cord.
- **Set "COMPONENT" as the player's video output mode via the menu screen. (See page 35.)**
- **When the player is set to output the component video signals, black and white pictures will be output from the video output jacks and S-video output jack of this player.**
- If the picture's colors change or become faded, make adjustments via the TV's controls.



- See also the operating instructions for the connected TV (or monitor).

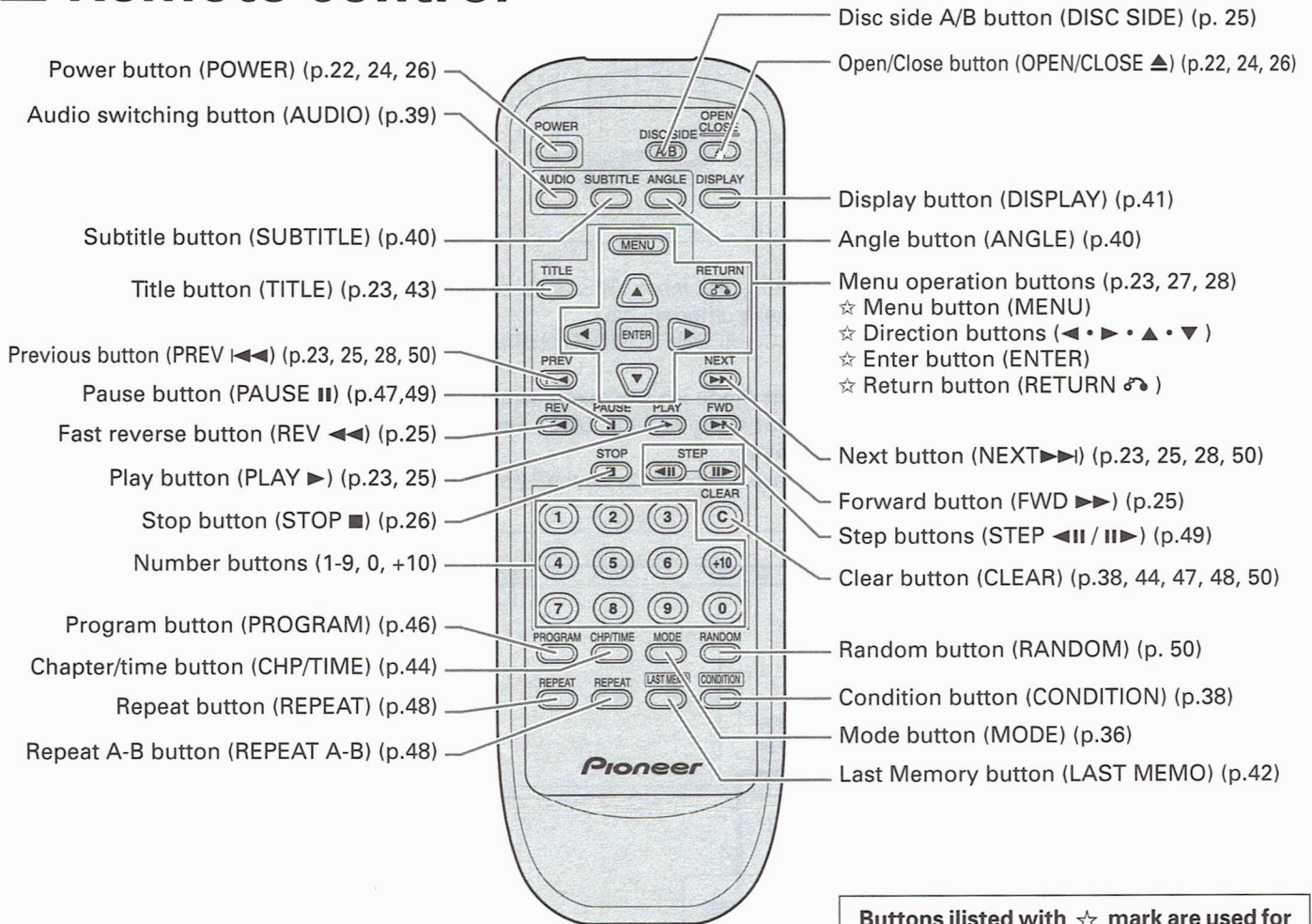
Note

Certain TVs will change automatically the input selector setting according to the type of input video signal (component, S-video or composite video). In this case, connect each type of video output jack of this player to the corresponding video input jacks on the TV.

☆ Indicates use of commercially available cables.

Names and Functions

Remote control

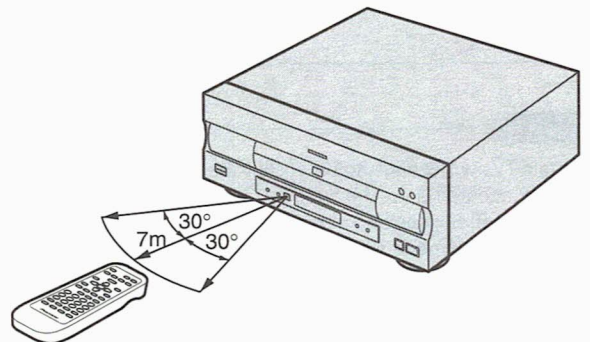


Buttons ilisted with ☆ mark are used for menu operation.

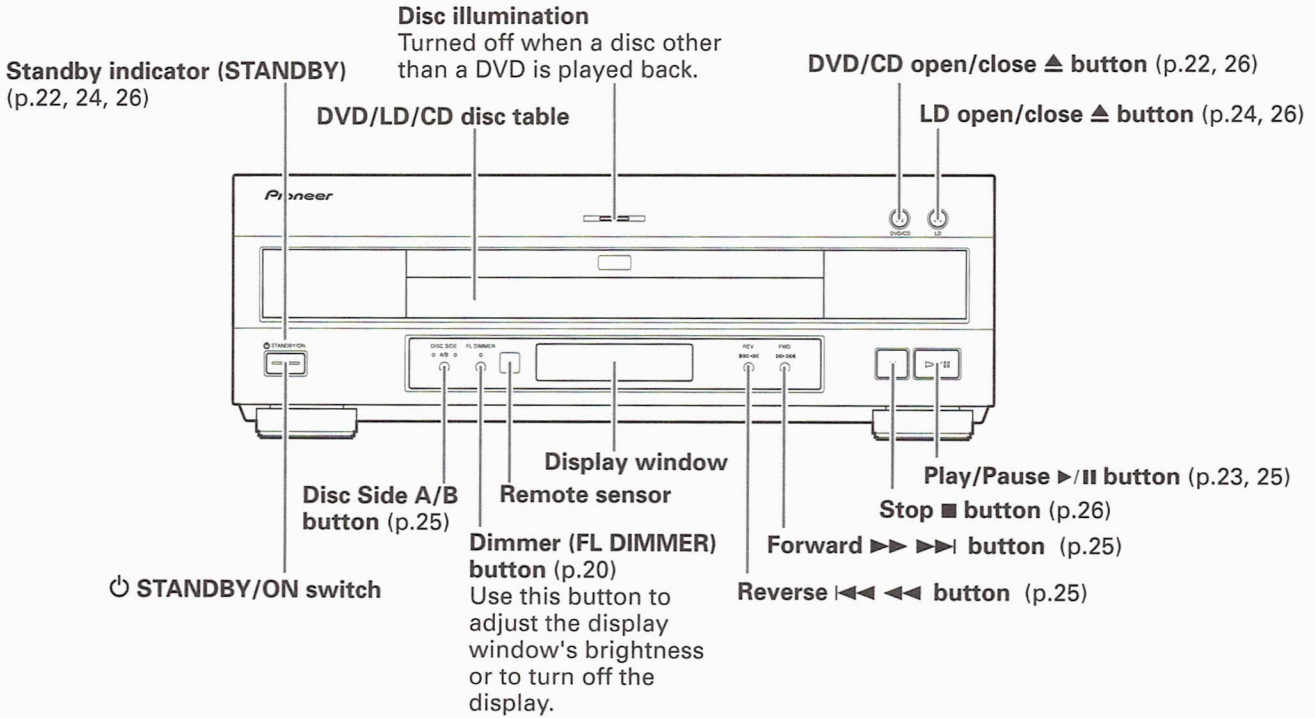
Remote control operation

When operating the remote control, point it at the remote sensor located on the player's front panel. The remote control can be used up to 23 feet (7 m) from the player and within a 30° angle from the middle of the sensor.

- Exposing the remote sensor to direct sunlight or strong light may cause faulty operation.
- If the CONTROL IN jack on the player's rear panel is connected to another component, point the remote control at that component to operate the player (see page 12). The remote control will not work in this case when pointed at the player.



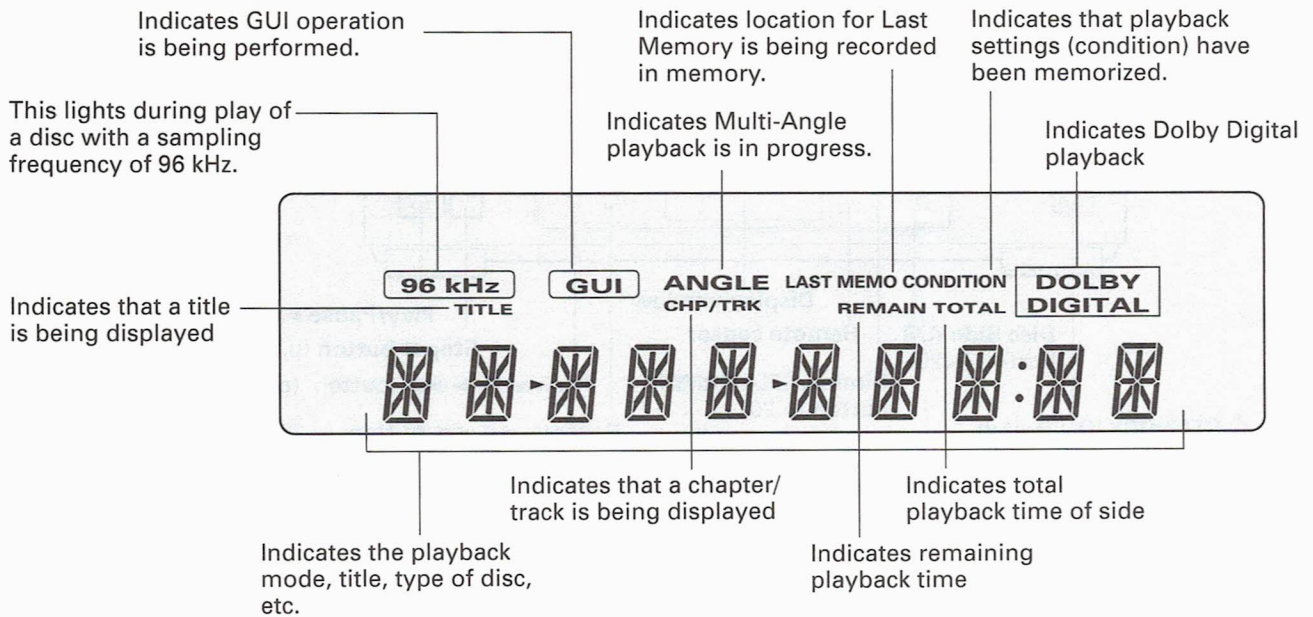
Front panel



Display window

When you press the FL DIMMER button, the brightness of the display window changes among the following settings.

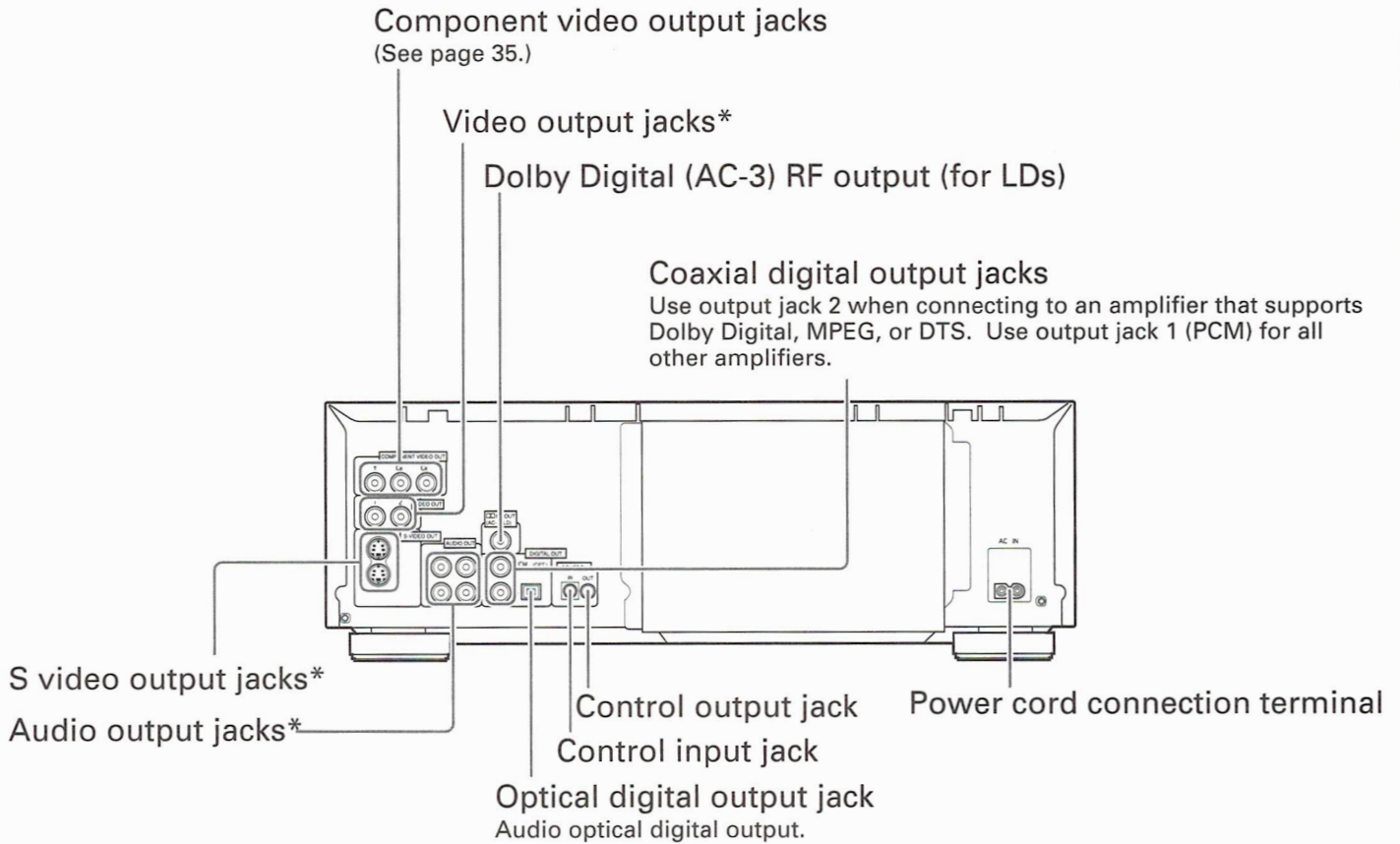
Bright → Semi-dark → Dark → off



Rear panel

Digital output jacks (coaxial and optical)

These provide digital audio output. Select the digital output settings that best suit your amplifier. (See pages 34 to 35).



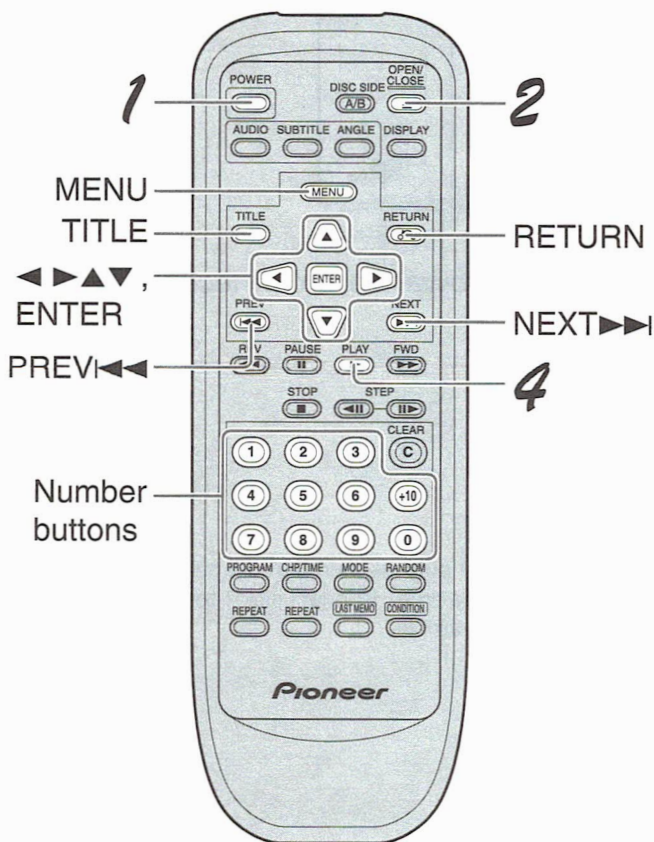
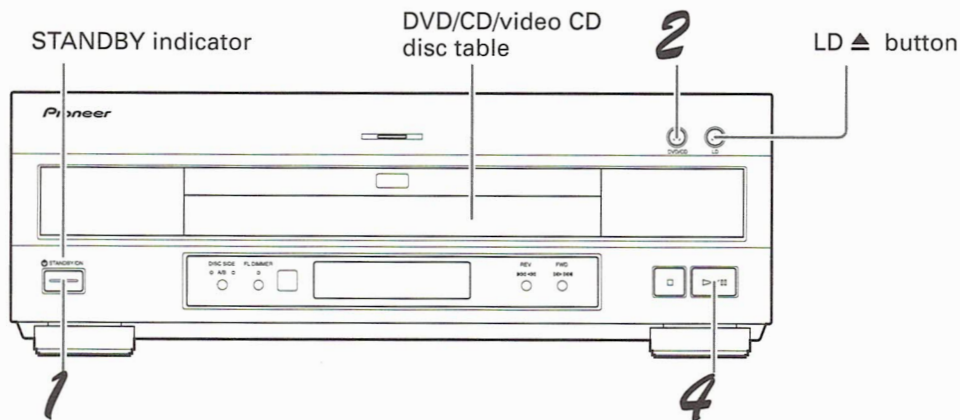
* There are two pairs of outputs, numbered 1 and 2, which can be connected at the same time. Connect jack 1 to a TV and jack 2 to an AV amplifier, for example.



Playing DVDs, CDs, or Video CDs



- After turning on the TV, set the TV's input selector to the correct position (VIDEO, etc.) for playing DVDs.
- Turn the power on for any connected stereo system components.
- **When playing a DVD that was recorded for wide-screen viewing, set the aspect ratio that best suits your TV. (See page 33.)**



1 Press the **⏻** STANDBY/ON switch or the **POWER** button.

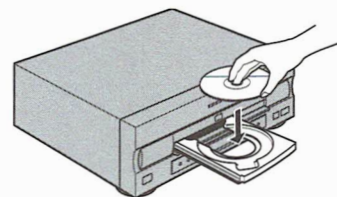
- The STANDBY indicator on the player turns off.

2 Press the **DVD/CD ▲** button.

- This ejects the DVD/CD/video CD disc table.
- Pressing the **OPEN/CLOSE ▲** button on the remote control also ejects the DVD/CD disc table and, in some cases, the larger LD disc table as well. See the next page for details.

3 Load a disc.

- Load a disc with the label side facing up, using the disc table guide to align the disc.



- Press the **▲** button to close the disc table. Depending on the disc, playback starts automatically.

Playing DVDs, CDs, or Video CDs

4 Press the ►/II button.

- Or, using the remote control, press the **PLAY** button.
- Playback will begin.
- Depending on the disc, a menu may be displayed. See the right column on this page for details.

Tips

- Press the **DVD/CD ▲** button on the player to eject the DVD/CD/video CD disc table (see Figure 1). Pressing the **LD ▲** button on the player causes the whole disc table including the LD disc table to be ejected (see Figure 2).

Figure 1

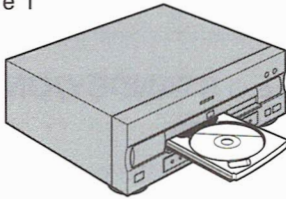
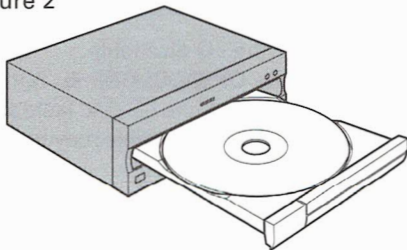


Figure 2



- After turning on the power, the first time you press the **OPEN/CLOSE ▲** button on the remote control, the whole disc table is ejected. If, after turning on the power, you have ejected the disc table using the **DVD/CD ▲** button or the **LD ▲** button on the player's front panel, pressing the remote control's **OPEN/CLOSE ▲** button will eject the disc table that was last ejected and closed.
- When loading a disc, align it with the disc guide.

Playback by menu selection

- Use the remote control for this operation.

Various menus are displayed by DVDs that include selection menu or video CDs that include PBC (Playback Control).

Example from DVD with menu



Example from video CD with PBC



- Note that the menu format and selection method differ among different DVDs and video CDs.

Selecting an item

● DVD

Use the **▲▼◀▶** buttons to select, then press the **ENTER** button.

● Video CD

Use the number buttons to select an item number.

Use the **" +10 "** button when entering a value of 10 or above.

Example: To enter 23, press **" +10 "**, **" +10 "**, **" 3 "**.

Tips

- **Starting playback of a video CD without displaying any menus**

This can be done when playing video CDs. For example, to start from a particular track number, press the corresponding number button in stop mode.

memo

- **Returning to the menu screen**

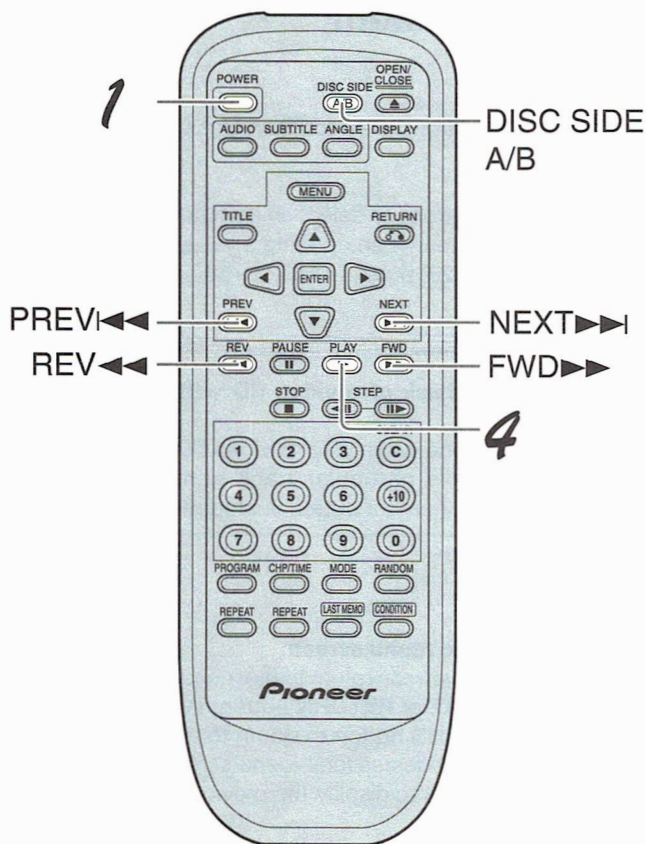
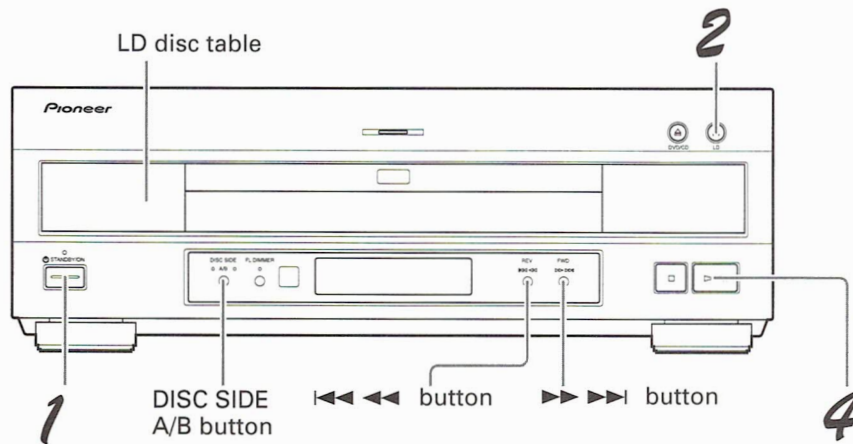
With DVD discs, you can return to the menu screen by pressing the **TITLE**, **MENU**, or **RETURN** button. With video CD discs, press the **RETURN** button to return to the menu screen.

- If a video CD provides several menu screens, use the **PREV** and **NEXT** buttons to display the previous or next screen.

Playing LDs



- After turning on the TV, set the TV's input selector to the correct position (VIDEO, etc.) for playing DVDs.
- Turn the power on for any connected stereo system components.



1 Press the **STANDBY/ON** switch or the **POWER** button.

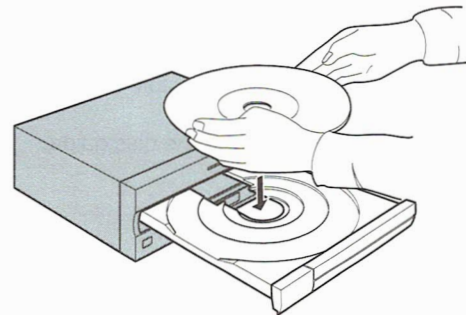
- The STANDBY indicator on the player turns off.

2 Press the **LD** button.

- This ejects the LD disc table.
- Pressing the **OPEN/CLOSE** button on the remote control also ejects the LD disc table and, in some cases, only the DVD/CD disc table may be ejected. See page 23 for details.

3 Load a disc.

- Load a disc with the desired side's label facing up.



- Press the **LD** button to close the disc table.



Skip Forward/Skip Back

Skipping Forward to the Next Chapter (Track)

Press the **NEXT** button on the remote control (or the button on the front panel).

- Press once to skip forward to the next chapter (track).

Skipping Back to the Previous Chapter (Track)

Press the **PREV** button on the remote control (or the button on the front panel).

- Press once to skip back to the start of the chapter (track) currently playing.
- Press again to skip back to the start of the previous chapter (track).

Fast Forward

Press and hold the **FWD** button on the remote control (or the button on the front panel).

- Release the **FWD** button when you reach the desired location. Normal playback resumes.
- When the "SCAN" indicator on the screen changes from flashing to lit, fast forward will continue even if the button is released. When the desired location has been reached, press the **PLAY** button.

Fast Reverse

Press and hold the **REV** button on the remote control (or the button on the front panel).

- Release the **REV** button when you reach the desired location. Normal playback resumes.
- When the "SCAN" indicator on the screen changes from flashing to lit, fast reverse will continue even if the button is released. When the desired location has been reached, press the **PLAY** button.

4 Press the **▶/||** button.

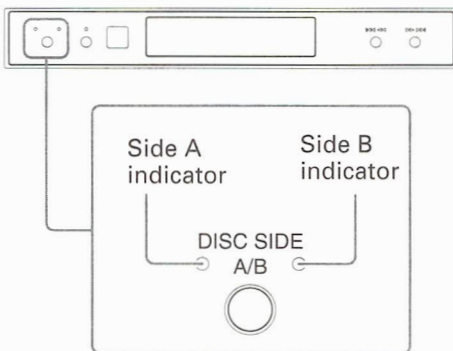
- Or, using the remote control, press the **PLAY** button.
- Playback will begin.
- When playing a double-sided LD, the second side is played automatically after the first side has been played.

Note

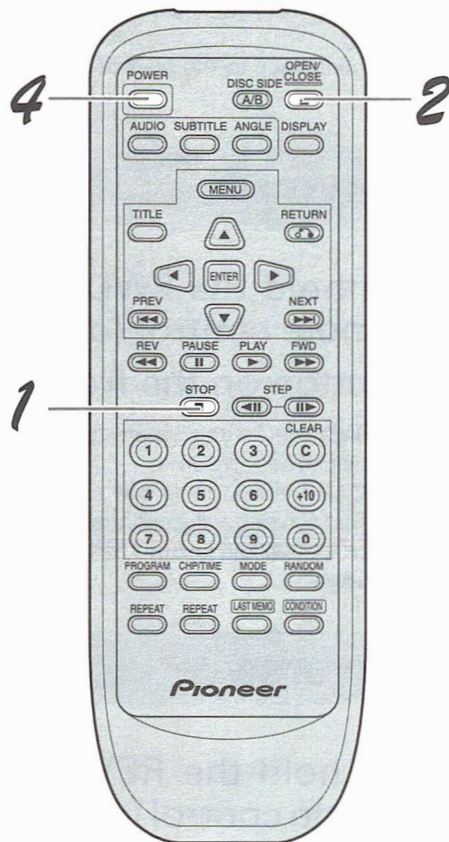
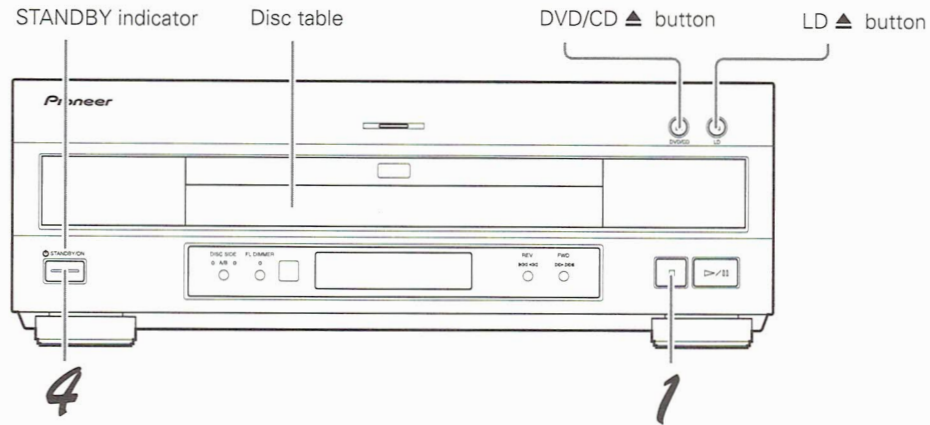
- ◆ Not aligning a disc with the disc guide or loading two discs at once may damage the disc and/or the player.

Tips

- Load a double-sided LD with the side A label facing up and the side B label facing down. The recorded sides A and B are on the opposite sides of the disc itself.
- Press the **DISC SIDE A/B** button to switch between sides A and B. The player's corresponding indicator lights to show the selected side.



Stopping Playback / Switching Power Off



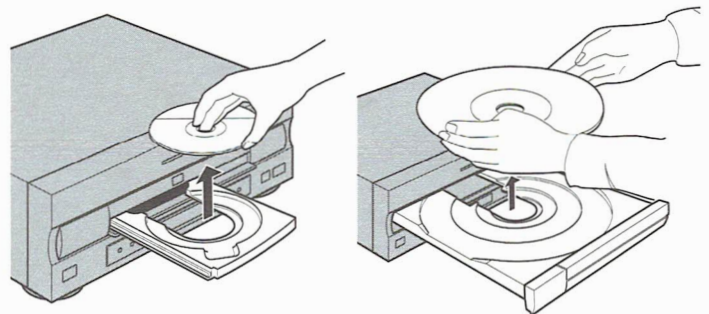
1 Press the STOP ■ button.

- Playback stops.

2 Press the OPEN/CLOSE ▲ button.

- Or press the DVD/CD ▲ button or the LD ▲ button on the player's front panel.
- The disc table comes out.

3 Remove the disc.



Removing DVD/CD/video CD

Removing LD

4 Press the ⏻ STANDBY/ON switch or the POWER button.

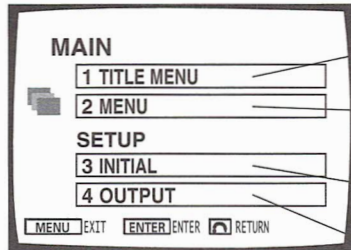
- When the ⏻ STANDBY/ON switch or the POWER button is pressed, the disc table goes back in, and the STANDBY indicator lights.

Main Menu

The MAIN MENU screen is used to select among two screens – the TITLE MENU screen and MENU screen, and two SETUP screens – the INITIAL screen and the OUTPUT screen.

Load a disc onto a disc table, then press the MENU button from stop mode. (If playback has started automatically, press the ■ button, then press the MENU button.)

Example:
For DVD



TITLE MENU screen*:

Selects a title to be played (Title Search).

MENU screen*:

Selects a chapter (track) within a title, or to select subtitle and audio languages, and viewing angles.

INITIAL setup screen:

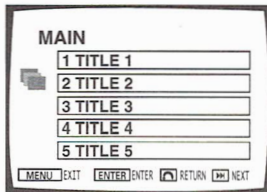
Selects various player functions and screen display settings.

OUTPUT setup screen:

Selects the type of audio and video signals to be output.

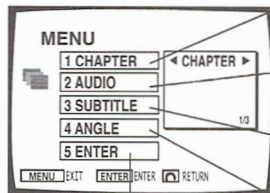
* On discs recorded with menus, menu formats and selection methods differ among different discs.

Title Menu



Use this menu to select a title to be played. This selection screen is the same as the one in "Direct Search with title numbers" on page 43.

Menu Screen Contents



Completes the setting of changes to the above items.

To go to the CHAPTER screen

CHAPTER screen:

Use this screen to select and play a chapter (track) within a title.

To go to the AUDIO screen

In the AUDIO screen:

Use this screen to select the language and audio signal type to be output for a disc with several options.

To go to the SUBTITLE screen

In the SUBTITLE screen:

Use this screen to select subtitle settings on discs that include subtitles.

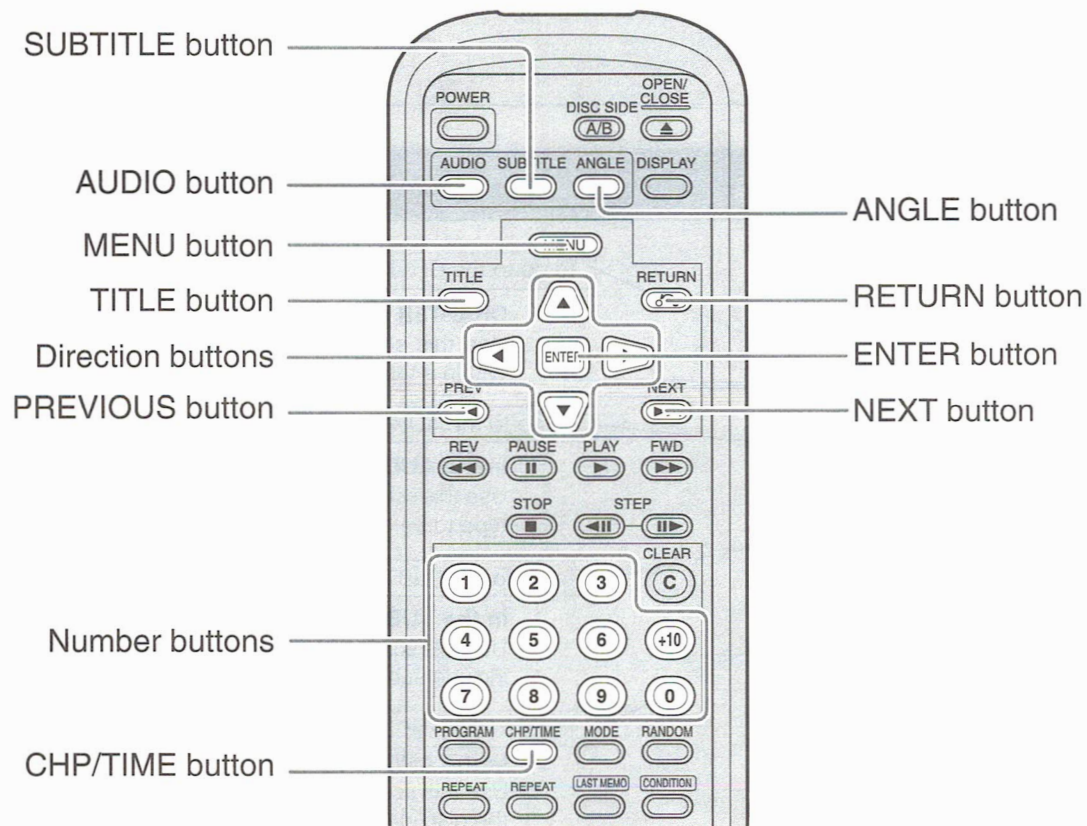
To go to the ANGLE screen

In the ANGLE screen:

Use this screen to select among viewing angles when the disc includes alternative scene recordings.

Button Operation within Each Menu

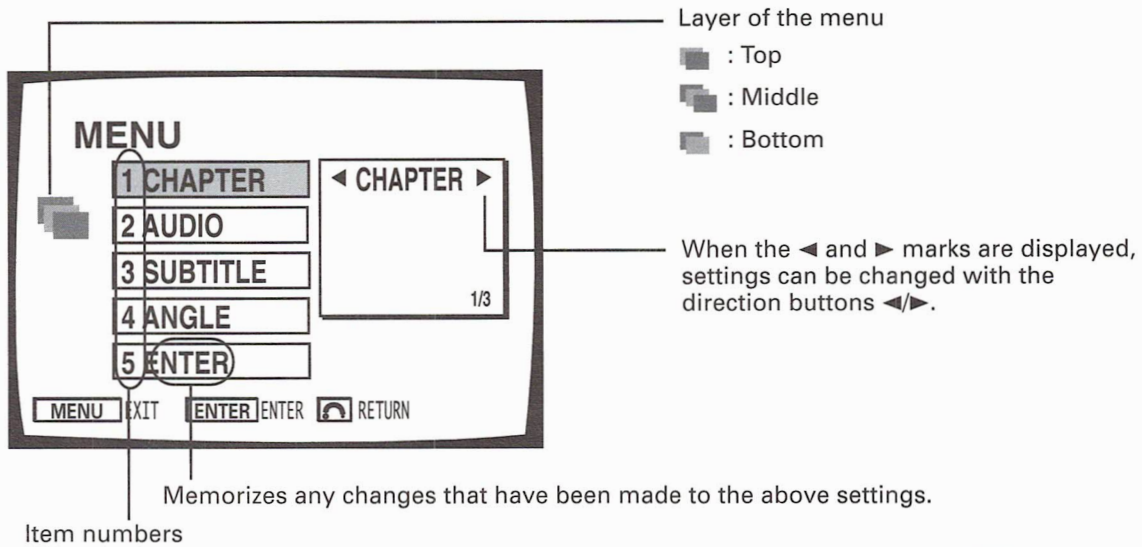
Button name	Button shape	Operation
MENU button		Enters or exits the current menu screen (current settings become invalid)
RETURN button		Returns to previous menu screen (settings will become valid) However, search is not available.
Number buttons		Selects and finalizes. (selection only for certain items in SETUP menu)
Direction buttons		Selects.
ENTER button		Finalizes selection and starts operation (starts playback mode after changing the title or chapter)
PREVIOUS button		Displays the previous menu screen.
NEXT button		Displays the next menu screen.
Direct buttons		Goes directly to the corresponding menu (settings in the current menu screen become invalid)



Example of Screen Displays and Operations

GUI (Graphical User Interface)

Example 1 : Items in MENU screen and buttons used (for DVDs)



Selecting an item number by pressing the **number buttons** or using the **direction buttons** ▲/▼ and then pressing the **ENTER button** will display the menu screen for that item number. Selecting item "5 ENTER" however, will memorize the changed settings and quit the mode.

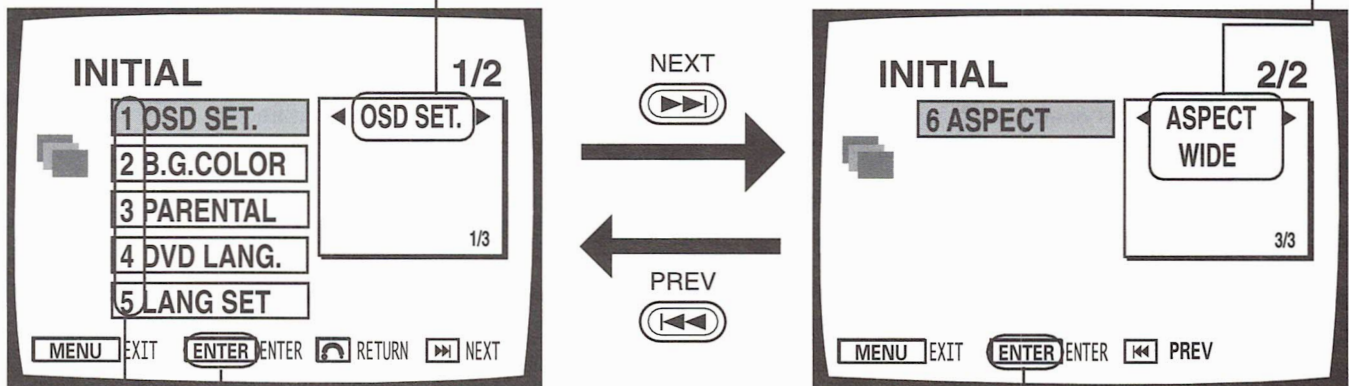
Example 2 : Items in SETUP menu screens and buttons used (for DVDs)

Current set-up condition

Use the direction buttons ▲/▼ to select an item number and the direction buttons ◀/▶ to change a setting.

Current set-up condition

When the ◀ and ▶ marks appear, the direction buttons ◀/▶ can be used to change settings.



Use the number buttons or the direction buttons ▲/▼ to select an item, then press the ENTER button to go to the corresponding menu.

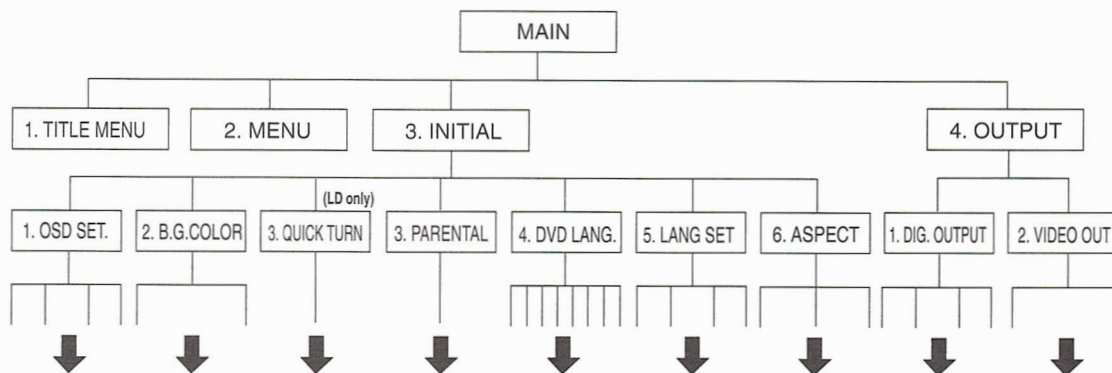
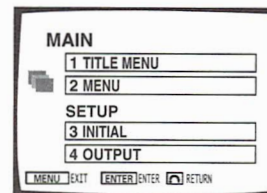
Changing Settings

Load the disc in the disc table and press the MENU button in stop mode.

- The main menu screen will be displayed.
- Only the SETUP menu is displayed when playing a CD or LD.

Use the "INITIAL" and "OUTPUT" menu items to change various settings.

The following briefly illustrates how to navigate these menus.



To restore the factory settings

- To restore the factory settings after making changes, turn off the power. Then, while pressing the STOP button on the player's front panel, press the **⏻** STANDBY/ON switch. This will erase "Picture quality/Tone setup", "Condition Memory", "Last memory", and the code number of "Parental level".

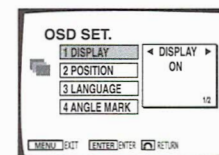
INITIAL menu settings

The settings in the INITIAL menu are On-screen Display (OSD), Quick Turn, Parental Level, DVD language, Subtitles, and Aspect.

- Settings that are marked with an asterisk (*) are factory settings (the original settings in newly purchased products).

1. OSD. SET

- 1. DISPLAY:** Operation displays (play, stop etc.) can be displayed or not displayed by selecting ON or OFF.
Settings: ON* (Operation displays appear.)
OFF (Operation displays do not appear.)
- 2. POSITION:** When viewing normal-size programming on a wide-screen TV, on-screen displays of operations may be shown outside the viewable screen where they cannot be seen. Use this setting to change their position so that they can be seen even on wide-screen TVs.
Settings: NORMAL * (When using a conventional TV {4:3 screen}).
WIDE (When using a wide-screen TV {not compatible with menu display})
- 3. LANGUAGE:** You can select English, French or Spanish as the language used in on-screen displays and menus.
Settings: English*
French
Spanish
- 4. ANGLE MARK:** An angle mark (⏮) is displayed when other recorded angles are available for the current scene (page 40). **(DVD only)**
Settings: ON* (Mark appears during relevant scenes)
OFF (Mark never appears.)



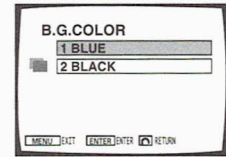
2. B.G.COLOR

You can select from blue or black background colors for the display in stop mode.

Settings: BLUE*
BLACK

Note

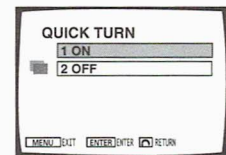
The background color cannot be changed for specific discs.



(3.) QUICK TURN (LD only)

When set to ON, this function speeds up the process of changing sides while playing a double-sided LD.

Settings: ON* (Shortens changing time)
OFF (Does not shorten changing time)



3. PARENTAL (DVD only)

This function lets you set viewing restrictions (i.e., a "parental lock") based on program content. When playing a disc that supports this function, this function skips over scenes that are violent or otherwise inappropriate for children. Read the disc's instructions for details.

Once you have input a 4-digit parental lock code, the viewing level (user restriction level) cannot be changed unless the same code is input.

Be sure not to forget your parental lock code. If you do forget it, reset the player to the initial settings (page 32) and input the parental lock code again.

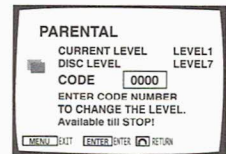
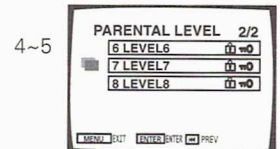
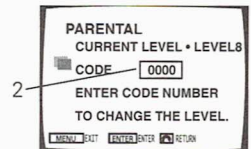
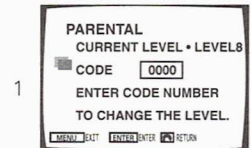
Settings: Level 8* to Level 1

Setup method

1. Press the **ENTER** button.
 - The code number input screen is displayed.
2. Input the code number with the number buttons.
3. Press the **ENTER** button.
4. Select a level between level 1 to 8 with the direction buttons.
5. Press the **ENTER** button.
 - Viewing restrictions are applied to the disc.

When playing a disc for which a view restriction has been set:

- The screen at right appears after pressing the **PLAY** button to start playback.
- Use the number buttons to enter your parental lock code on this screen, press the **ENTER** button to start playback.

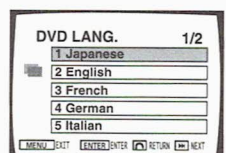


4. DVD LANG. (DVD only)

Some DVDs have versions of disc menus recorded in several languages. Use the DVD language setting to select which language will be displayed in these menus.

Setting: English*

Select the language with the direction buttons and press the **ENTER** button.





Changing Settings

5. LANG SET (DVD only)

1. AUDIO: The audio language that you normally listen to can be selected from the various audio languages on a disc. Even when the audio language is changed during playback, the language selected at this setting will be selected when the disc is replaced.

Settings: English*

Select a language from the 136 different languages.

- Select the desired language with the direction buttons ◀▶ on the remote control.
- Press the **ENTER** button to bring up the code input screen. Use the number buttons on the remote control to enter the HIGH and LOW language code (see page 56) corresponding to the desired language. Use the "+10" button to enter values above 10.

Tips

- With certain discs, the language originally specified on the disc will be used even when you change the LANG SET setting. In this case, use the on-screen menu to select the desired language. (See pages 38 and 39.)

2. SUBTITLE: The subtitle language that you will normally display can be selected from the subtitles on a disc. Even when the subtitle language is changed during playback, the language selected at this setting will be selected when the disc is replaced.

Settings: English*

Select a language from the 136 different languages.

- Select the desired language with the direction buttons ◀▶ on the remote control.
- Press the **ENTER** button to bring up the code input screen. Use the number buttons on the remote control to enter the HIGH and LOW language code (see page 56) corresponding to the desired language. Use the "+10" button to enter values above 10.
- After selecting this display with the remote control's direction buttons ▲/▼, display ON and display OFF can be selected with the remote control's direction buttons ◀▶.

Settings: ON*
OFF

- Some discs provide subtitles offering explanations of scenes for those who are hard of hearing. Switching "ASS. SUBTIT" ON assures these subtitles are displayed from the beginning.

Settings: OFF*
ON

3. AUTO LANG.:

Settings: ON* (for general overseas movies, original audio with your local language subtitles will be selected, and for your domestic movies, original audio with no subtitles will be selected.)

OFF (Only the selected audio and subtitle languages are used.)

- Select ON or OFF with the direction buttons ◀▶ on the remote control.

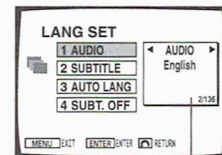
If the selected audio language and the subtitle language are not the same, if the subtitle display is set to OFF, or if the ASS. SUBTIT is set to ON, the AUTO LANG function does not operate.

4. SUBT. OFF: Use this setting to forcibly enable selection of subtitles when the subtitle function has been turned off.

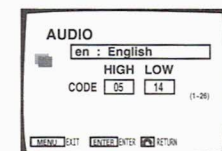
Settings: SEL SUBTL * (Subtitles are shown in the selected language.)

WITH AUDIO (The selected audio language is used for the subtitles.)

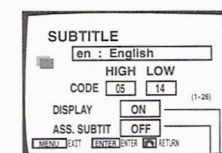
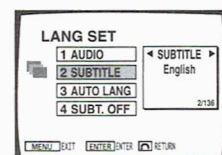
- Select SEL SUBTL or WITH AUDIO with the direction buttons ◀▶ on the remote control.



Basic audio

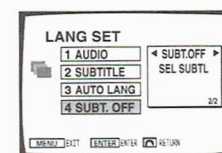
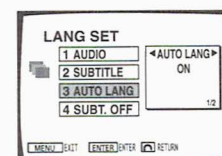


Code setup screen



Assist subtitle

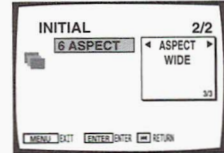
Display



6. ASPECT (DVD only)

When viewing software recorded in the wide mode, the image's height to width ratio can be switched to match the TV being used.

Settings: Wide*
Pan & Scan
Letter box



When the DVD supports multiple aspect ratios, select the one that best suits your TV.

Disc	Aspect selection	Wide TV (16:9)	Regular TV (4:3)
Wide Screen Disc	Wide		
	Pan & Scan		
	Letter box		
Regular Screen Disc			

- Select the aspect with the direction buttons ◀▶ on the remote control.
- Typically, you would select the "Wide" setting when watching a wide-screen TV.
- You would usually select either "Pan & Scan" or "Letterbox" setting when watching a conventional TV.

These selections are shaded in the table above.

- Aspect switching is available only when it is supported by the current disc. Check the disc case for indications of aspect switching support.
- If the current disc does not support aspect switching, make any necessary screen adjustments via the TV.

Tips

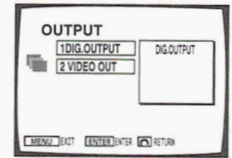
- The width-to-height ratio of conventional TVs is 4:3, while the width-to-height ratio of wide screen and Hi-Vision TVs is 16:9. This width-to-height ratio is called the aspect ratio.



Changing Settings

Output settings

These settings include digital output and video output settings.



- Settings that are marked with an asterisk (*) are factory settings (the original settings in newly purchased products).

1. DIG. OUTPUT (DVD only)

Setting audio output

Select output settings according to the type of connected component.

- Select the Dolby Digital setting on the "DOLBY DIGITAL" screen when connected to an amplifier that includes a Dolby Digital decoder.
- Select the 96 kHz setting on the "LINEAR PCM" screen when connected to an amplifier that supports 96-kHz linear PCM output.
- Select the MPEG setting on the "MPEG" screen when connected to an amplifier that includes an MPEG decoder.
- Select the ON setting on the "DTS" screen when connected to an amplifier that includes a DTS decoder.

Note

Do not change the output settings if you are not sure which system your amplifier is compatible with.

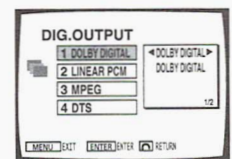
- Select the desired setting with the direction buttons ◀▶ on the remote control.

1. DOLBY DIGITAL:

You can change the type of audio output from the player's digital output jack. Select between Dolby Digital audio (a surround sound system used at cinemas) or linear PCM (the digital audio format used in CDs).

Settings: **DOLBY DIGITAL*** (Dolby Digital signals are output. Select this setting when using an amplifier that has an AC-3 Dolby Digital decoder.)

DOLBY DIGITAL → PCM (Provides Linear PCM signal with both Dolby Digital and Linear PCM sources. Select this setting when using a regular amplifier or a Dolby Pro Logic amplifier.)



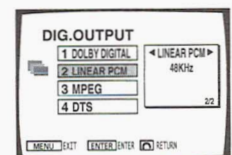
2. LINEAR PCM: **96 kHz:** (This setting ensures high sound quality when using a PCM audio source that has a 96-kHz sampling frequency. In addition, 48-kHz playback is supported when using an audio source that has a 48-kHz sampling frequency.)

48 kHz: (This setting compresses the sampling frequency of 96-kHz discs to 48 kHz. 48-kHz discs are played as they are using a 48-kHz sampling frequency.)

- Select the sampling frequency that suits the type of audio signal recorded on the disc. The analog output and digital output are simultaneously switched to match the selected sampling frequency.
- If you select the 96 kHz setting for a 96-kHz DVD that is copy-protected, no signal is output via the digital output jack.

Settings: **48 kHz***

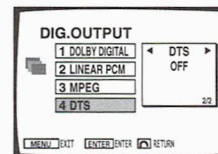
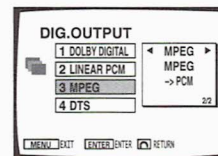
96 kHz





Changing Settings

3. MPEG: The audio signal output from the player's digital output jack can be changed when using an amplifier or decoder that has an MPEG input jack.
Select between two DVD settings: MP3-linear PCM or linear PCM only.
Settings: **MPEG → PCM*** (Both MPEG and linear PCM signals are played in line with the linear PCM standard.)
: **MPEG** (MPEG signals are output as they are.)
4. DTS: Output of DTS signals recorded on DVDs can be set as ON or OFF when using an amplifier that has a DTS input jack.
Settings: **OFF***(DTS signals are not output.)
ON (DTS signals are output.)



2. VIDEO OUT (DVD and video CD only)

Setting video output

Select video output settings according to the type of connected component.

- Select "(S) VIDEO" when using the video input or S video input jack on the connected component.
- Select "COMPONENT" when using the component video input jacks on the connected component.

Select between ordinary video signal output or component output as the video output method.

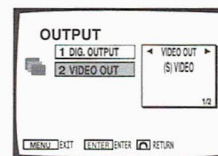
S video signals are included among the ordinary video signals.

If you select component output, the signal from the video output jack and the S-video output jack becomes a monochrome signal.

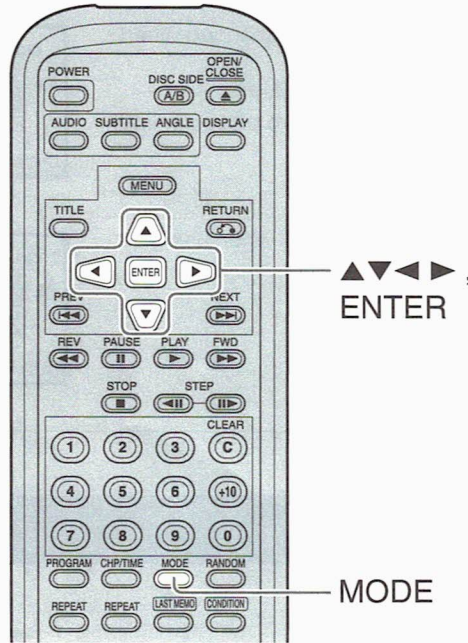
You cannot switch to the component setting when playing video from a LD or a CDV. In such cases, even if you select the component setting, the player automatically switches to the (S) video output mode.

Settings: (S) VIDEO *
COMPONENT

- Select the video output setting with the direction buttons ◀/▶ on the remote control.



Changing Picture and Sound Quality



Changing picture quality (Cinema Mode/Animation Mode)

– DVD, LD and video CD

Select the desired type of picture quality to suit the type of program (movie, cartoon, etc.).

Effect

CINEMA

Picture quality: Provides a clear picture with sharp black and white definition.

ANIMATION (DVD, video CD only)

Provides attractive images with bright colors.

STANDARD

Returns to standard picture and function settings.

The setting changes as shown below each time you press the **MODE** button.

Example: When playing a DVD

[once]



[twice]



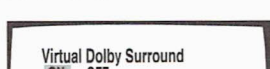
[three times]



[four times]



[five times]



The table below lists setting changes for other types of discs.

Disc	Press	once	twice	three times	four times	five times
DVD		MODE	NR	PAUSE MODE	AUDIO D.R.C.	Virtual Dolby Surround
LD (CAV)		MODE	NR	PAUSE MODE	Virtual Dolby Surround	-
LD (CLV)		MODE	NR	Virtual Dolby Surround	-	-
Video CD		MODE	NR	Virtual Dolby Surround	-	-
CD		Virtual Dolby Surround	-	-	-	-

1 During playback, press **MODE** to select "MODE".

2 Press direction buttons **◀/▶** to select the desired effect.



◆ Poor picture quality may result, depending on the disc and the TV used. In such cases, use STANDARD mode.

Reducing noise (NR : Noise Reduction)

– DVD, LD and video CD

This function reduces noise and color phase irregularity in playback of DVD, LD, and video CD. Select ON to activate this noise reduction function.

1 During playback, press **MODE** to select "NR".

2 Press direction buttons **◀/▶** to select ON or OFF.



◆ Poor noise reduction may result, depending on the disc and the TV used.

Changing the still picture conditions (PAUSE MODE) –DVD and LD (CAV only)

Effect

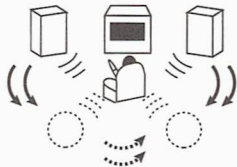
- FIELD :** Picture quality: Improves focus in still picture.
FRAME: Set this mode to enjoy high-quality playback of still images.
AUTO: FIELD mode is automatically selected when DVD images flicker or FRAME mode is automatically selected when they do not flicker.

- 1 During playback, press **MODE** to select "PAUSE MODE".
- 2 Press direction buttons **◀/▶** to select the desired effect.

Switching to a more spacious sound (Virtual Dolby Surround)

Effect


Even when there are only the two front speakers, Virtual Dolby Surround creates a more spacious sound. Select ON to activate this function.



- 1 During playback, press **MODE** to select "Virtual Dolby Surround".
- 2 Press direction buttons **◀/▶** to select ON or OFF.

memo

- ◆ This function affects only audio that is output from the audio output jacks. It does not affect audio output via the digital output jack.
- ◆ The effect is more evident with some discs than with others.
- ◆ If you select Virtual Dolby Surround when playing a Karaoke video CD, the vocal track may be slightly audible even when Karaoke mode has been selected. Turn Virtual Dolby Surround off in such cases.

SRS Labs, Inc.'s TruSurround system  has been adopted as virtual technology.

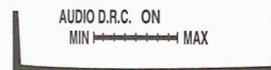
TruSurround is a trademark of SRS Labs, Inc. SRS and the SRS symbol are registered trademarks of SRS Labs, Inc. in the United States and selected foreign countries.

TruSurround is incorporated under license from SRS Labs, Inc. Permission to use TruSurround technology has been registered through SRS Labs, Inc.

Changing sound quality (AUDIO D.R.C.) –DVD only

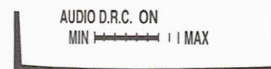
D.R.C. stands for Dynamic Range Compression. On DVDs, sound has a wide dynamic range. Switch AUDIO D.R.C. to ON if you find dialog or other sounds hard to hear when listening on your stereo system or TV.

- 1 During playback, press **MODE** to select "AUDIO D.R.C.".
- 2 Press direction buttons **◀/▶** to select ON.
- 3 Press the **ENTER** button.



- 4 Press direction buttons **◀/▶** to select the compression amount.

- MIN: The dynamic range becomes narrower.
- MAX: The dynamic range becomes wider.



- 5 Press the **ENTER** button.

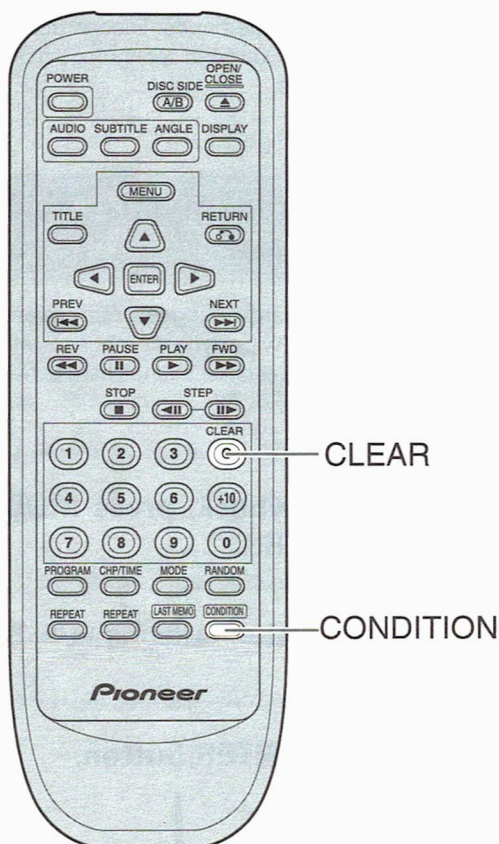
- The setting screen closes.

memo

- ◆ If **▲** button or **▼** button is pressed at step 4, you can set AUDIO D.R.C. to ON or OFF.



Memorizing Settings for Your Favorite DVDs (Condition Memory)



You can store settings for your favorite, often-viewed DVDs in memory. Settings remain in memory even when you remove the disc from the player or switch the player's power off. When you load and play a disc that has condition memory settings, the memorized settings are automatically recalled and used.

The following seven types of settings can be stored in memory. After making settings, activate the Condition Memory function to store them so they will be automatically recalled and used next time.

- Aspect (page 33)
- Cinema mode/Animation mode (page 36)
- Multi Language Audio (page 39)
- Multi Language Subtitles (page 40)
- OSD (on-screen display) position (page 30)
- Angle (page 40)
- Parental level (page 31)

1 Press the **CONDITION button during playback.**

If you insert a disc whose settings have been stored in memory:

"COND. MEM." will appear on the screen, and those settings are recalled and used.

To delete stored settings:

Insert a disc whose settings have been stored in memory. Then, while "COND. MEM." is being displayed, press the **CLEAR** button. This deletes the previously stored settings for the current disc.

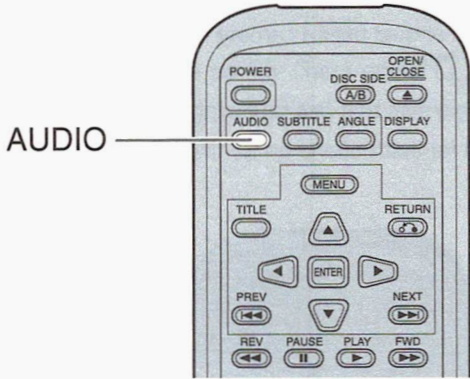


- Once settings have been stored in memory, they can be recalled and used any number of times.
- You can store settings for up to 30 DVDs in memory. If you store settings for more than 30 DVDs, the oldest setting is erased and replaced by the new setting. An old setting becomes the most recent setting when it is recalled and used.
- To revise a stored setting, change one of its setting items (Aspect, Cinema mode/Animation mode, Multi Language Audio, Multi Language Subtitles, OSD (on-screen display) position, Angle, or Parental level), then press the **CONDITION** button.
- Despite this function, Multi Language Audio switching may occur automatically with some discs.



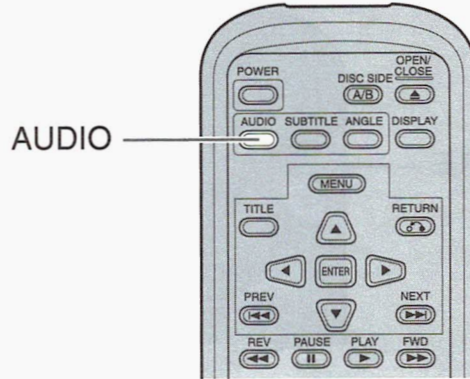
Selecting Languages (Multi-Language)

Some DVD discs are recorded with audio tracks in several languages. Also, various audio modes, such as Dolby Digital and PCM, are used when recording discs. Select the settings for your preferred language and audio mode.



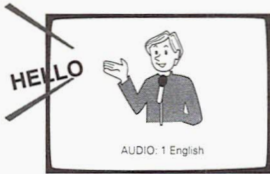
Changing Audio Type

The audio type can be changed between stereo and monaural settings and between digital and analog settings.

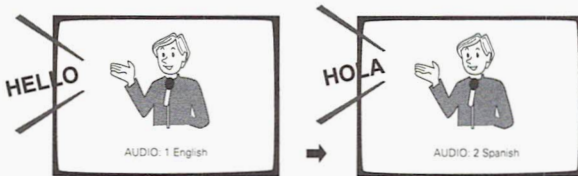


1 Press the AUDIO button during playback.

- The current audio selection is indicated by a flashing on-screen display.




2 Press the AUDIO button again to select the desired audio.



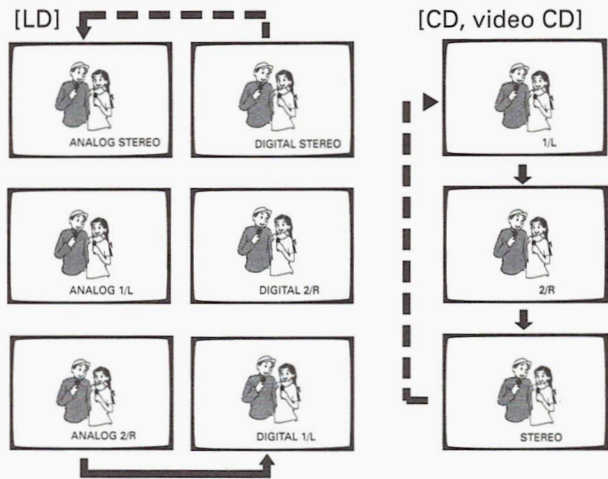
Tips

- ◆ For some discs, selection can be made using the menu. To do this, press the **MENU** button after step 1 to call up the menu screen and then select the desired language.

Note

- ◆ You cannot switch languages if there is only one language recorded on the disc.
- ◆ Some discs may not enable language selection. In such cases, a prohibition mark  is displayed.

1 Press the AUDIO button during playback.



Note

- ◆ You cannot select digital audio if digital audio data has not been recorded on the LD.
- ◆ Some LDs support switching to the CX System. In such cases, perform the above operation to switch.
- ◆ Digital output cannot be used if analog output has been selected for the LD. If the LD is AC-3 compatible, the AC-3 signal is output via the analog right channel, so analog audio output is via the left channel only (monaural).
- ◆ For DTS-LDs, noise will be output from the analog output jack if digital output has been selected. In this case, switch to the analog output with the above operation.

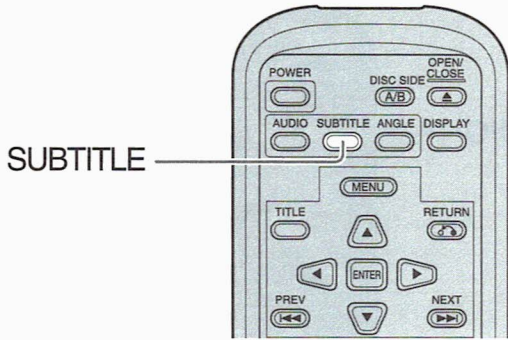


Selecting a Subtitle Language (Multi-Language Subtitles)

Viewing from a Different Camera Angle (Multi-Angle)

You can select a subtitle language when playing a DVD that contains recordings of subtitle data in several languages.

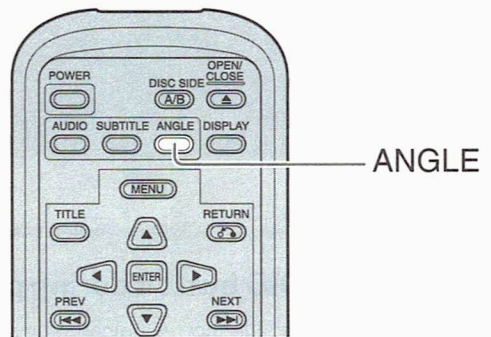
When playing a DVD that contains recordings of scenes shot from various angles, you can select a different viewing angle.



How to check discs for multi-angle recordings

The disc case should bear a camera mark (). Also, the (angle mark) will be shown on your TV screen when playing a disc that has multi-angle recordings.

See page 30 for instructions on turning off the displayed camera mark.

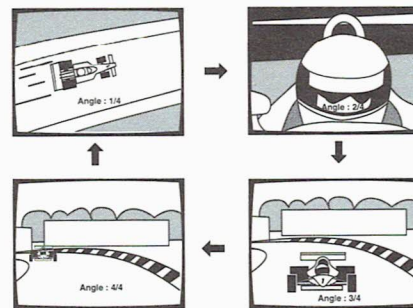


1 Press the **SUBTITLE** button during playback.



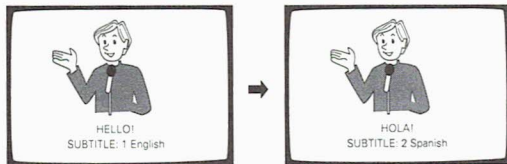
- The current subtitle language number is displayed.

1 Press the **ANGLE** button during playback.



- The camera angle changes each time you press the button.

2 Press the **SUBTITLE** button to select the desired language.



Note

- ◆ You cannot switch subtitle languages when playing a disc that has no recorded subtitle data or has subtitle data in only one language.
- ◆ Some titles may not enable subtitle language switching. In such cases, the prohibition mark is displayed.

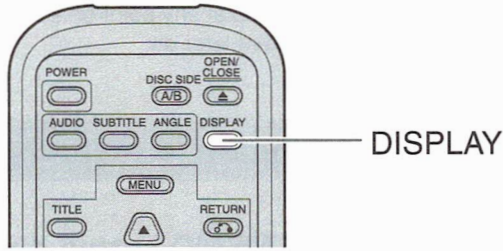
Tips

- To turn off display of subtitles during playback, either press the **SUBTITLE** button several times until the subtitle mode is OFF or press the **SUBTITLE** button, wait until some subtitles are being displayed, then press the **CLEAR** button.
- Subtitles can be cleared by selecting LANG SET from the INITIAL menu, and setting SUBTITLE to "OFF" (refer to page 32).
- For some discs, selection can be made using the menu. In this case press the **MENU** button while the indicator is displayed, call up the menu screen and make your selection.

Tips

- The Multi Angle function can be used only when playing discs that include recordings of images shot from different camera angles.
- The ANGLE indicator on the player lights during Multi Angle playback.
- For some discs, selection can be made using the menu. In this case, press the **MENU** button while the indicator is displayed to call up the menu screen and then make your selection.

Viewing Disc Information



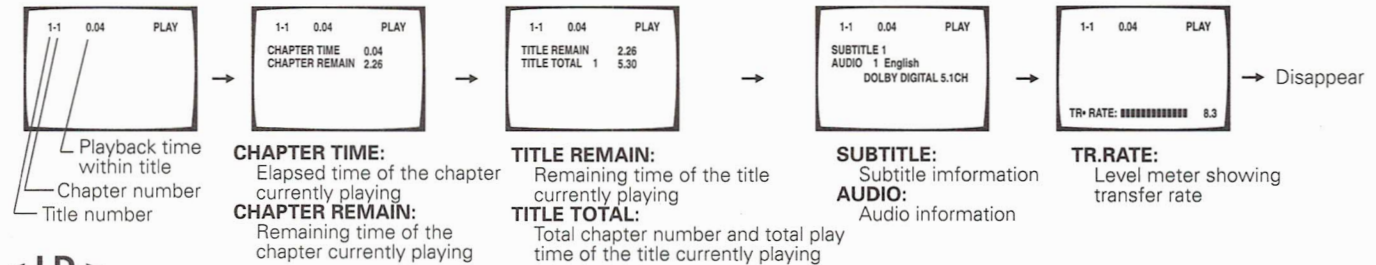
Note

- ◆ This display is not shown if the on-screen display setting was set to OFF (page 30).
- ◆ The display automatically shuts off after about 80 minutes to prevent TV screen burn-in.
- ◆ The ALL REMAIN and DISC TIME displays are not displayed when playing an LD that does not include a TOC (see page 55) or when playback of the LD's Side B is finished. Since the Quick Turn function's factory setting is "ON", no display is made. Set the Quick Turn function to OFF to activate the display.

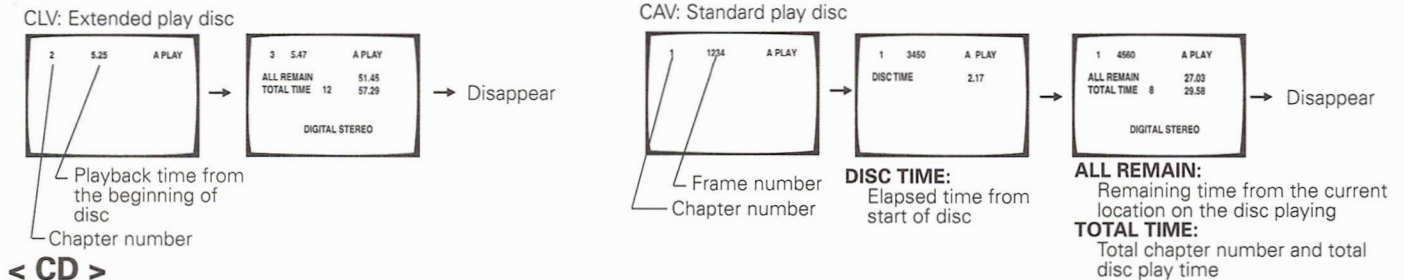
Press the DISPLAY button during playback

- The display will change as follows each time the button is pressed. Some displays may not be displayed depending on the disc.

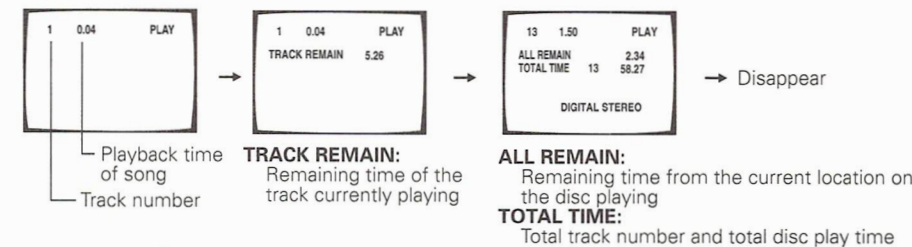
< DVD >



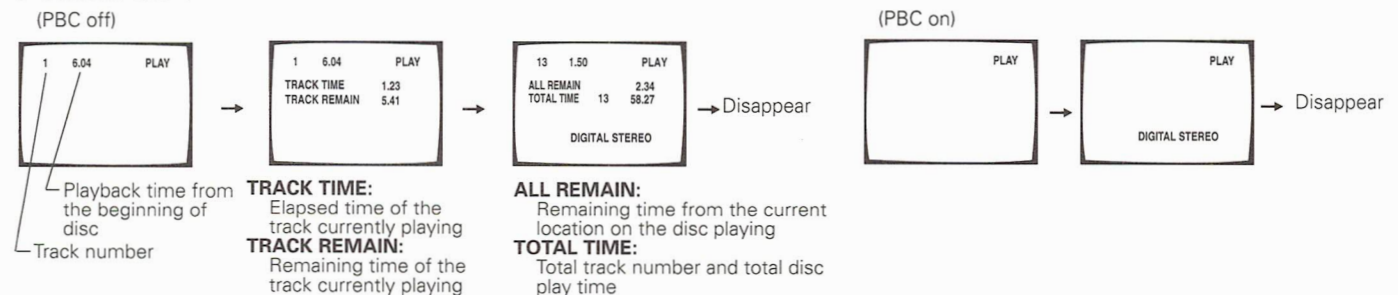
< LD >



< CD >



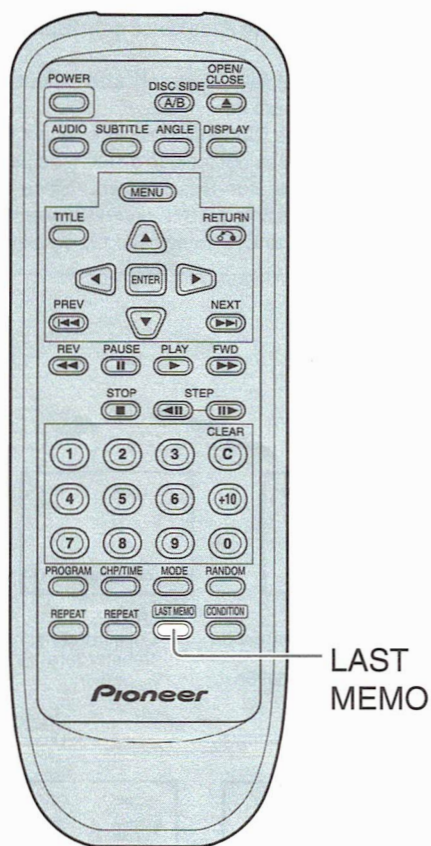
< Video CD >





Resuming Playback After Stopping

This handy function lets you stop at any point on a disc and then resume playback from that point later on.



Storing the stop point in memory

1 Press the LAST MEMO button during playback.

- The LAST MEMORY indicator lights on the player.

2 Press the POWER button to turn the power off, or stop playback with the STOP button.

Once memorized, the memorized point will be remembered even if the power is turned off, or the disc ejected. Points on up to 5 DVDs can be memorized, and those points are recalled the next time any of the discs are played back.

Resuming playback from where you stopped

1 Load a disc whose stop point has been stored in memory.

- Some DVD discs will start playback automatically when loaded.
To use the Last Memory function with a disc that starts playing automatically when loaded, first press the **STOP** button after loading the disc, then press the **LAST MEMO** button.

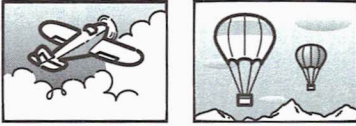
2 Press the LAST MEMO button in stop mode.

- When the power is turned off and a disc is in the player, pressing the **LAST MEMO** button turns the power on and playback starts automatically.

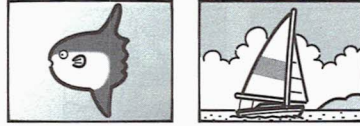


- ◆ The Last Memory function may not operate with certain DVD discs.
- ◆ If you register more than five DVDs, the oldest of the five registered discs (i.e., the first one that was registered) is erased from Last Memory and replaced by the newly registered disc.
- ◆ Even if the disc you are loading has been registered in Last Memory, you can still play it from the beginning by pressing the PLAY button after loading it.
- ◆ Once you resume playback of a disc from the stop point via the Last Memory function, the function is automatically canceled for that disc.
- ◆ This function is not available when playing CDs.
- ◆ Any memorized information from LDs or video CDs is erased when the disc is removed.
- ◆ When playing a video CD that features menu-driven PBC (Playback Control), it may not be possible to resume playback from the stop point. In such cases, turn off the menu display and then start playback. (See page 23.)

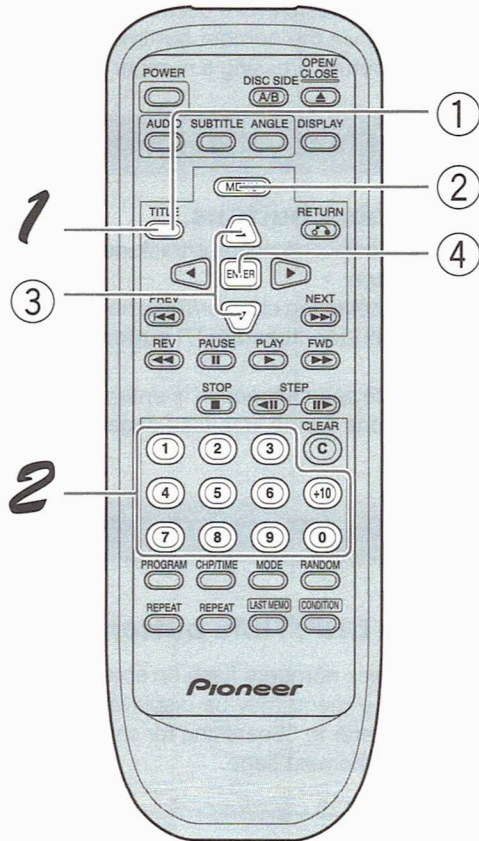
Title 1



Title 2



Searching for a Desired Scene (Title Search)

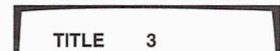


Direct search with title numbers

1 Press the **TITLE** button.
(In stop mode, go to step 2 without pressing the **TITLE** button.)

2 Press the number buttons.

- To select title number 3, press the "3" button.



- When selecting title number 10, press the "+10" button then "0" button.

- When the title number is flashing, press and hold the **TITLE** button to advance one by one. When you reach the desired number, press the **PLAY** button to select it.

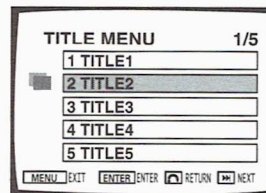
Searching with the menu

1 Press the **TITLE** button.

- In stop mode, go to step 3 without pressing the **TITLE** button.

2 Press the **MENU** button.

3 Select a title number using the direction buttons **▲/▼**.



4 Press **ENTER** button.

- Playback of the selected title begins.

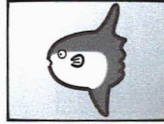
memo

- For some discs, selection can be made using the menu. In this case, press the **MENU** button while the indicator is displayed to call up the menu screen and make your selection.

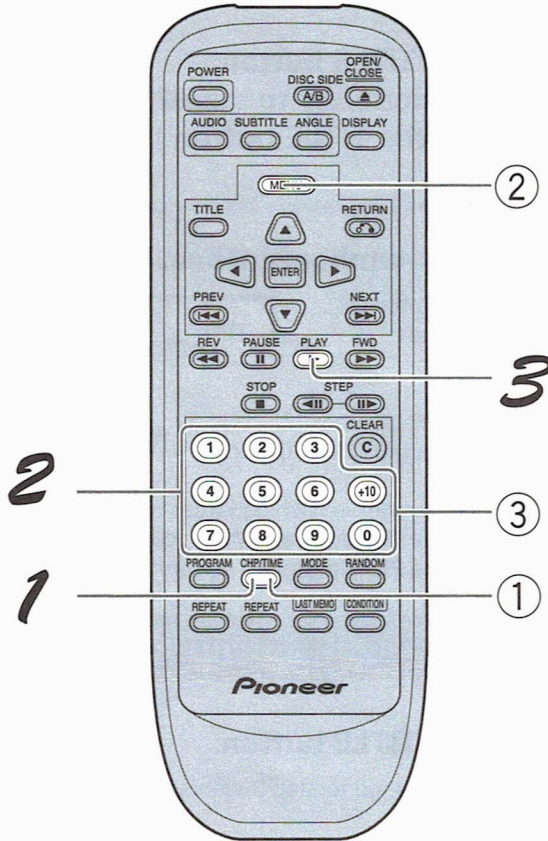
Note

- You cannot play back successive titles.
- To play back multiple successive titles, program the titles and then perform programmed playback (page 46).
- Search functions are not supported by some DVDs. In this case, the mark is displayed.
- Menus may not be displayed on some discs.

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Searching for a Desired Scene/Audio Track



There are two ways to search for a desired scene or audio track: by searching directly via the number buttons or by pressing the **CHP/TIME** button before pressing a number button.

Searching directly via number buttons

Press the number buttons.

Example 1: When selecting chapter/track number 3, press the "3" button.

Example 2: When selecting chapter/track number 17, press the "+10" button, then the "7" button.

- For DVDs, the title search function is entered when you press the number buttons during stop (see page 43).

Searching via the CHP/TIME button

1 Press the **CHP/TIME** button.

- Chapter/track numbers flash on screen.
- On DVDs, a menu may be displayed in stop mode. In this case, refer to "Searching for chapter numbers via a menu" on the next page.

2 Select chapter numbers directly with the number buttons.

Example 1: When selecting chapter/track number 31, press the "3" button then the "1" button.

Example 2: When selecting chapter/track number 187, press the "1" button, "8" button and "7" button in this order.

3 Press the **PLAY** button.

- Playback of the selected chapter/track starts.

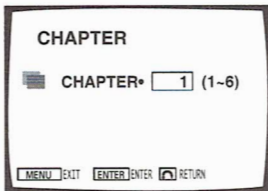


- To clear Title, Chapter, and Time indications when they are flashing, press the **CLEAR** button twice.
- For some discs, selection can be made using the menu. In this case, press the **MENU** button while the indicator is displayed to call up the menu screen and then make your selection.

(Chapter/Track/Time/Frame Search)

Searching for chapter numbers via a menu – DVD only

- ① **Press the CHP/TIME button.**
 - In stop mode, go to step 3 without pressing the **CHP/TIME** button.
- ② **Press the MENU button.**
 - Chapter menu is displayed.
- ③ **Select the chapter by number.**
 - Depending on the title, the menu may not be displayed. In this case, refer to the description on the previous page.



Searching by time value/frame number – DVD, LD and video CD

- ① **Press the CHP/TIME button twice.**

CHP 0 → TIME 0.00

 - With DVDs that do not have chapters, pressing the button once will display the time.
- ② **Select the desired time/frame number with the number buttons.**

Example 1: To select 21 minutes 43 seconds, press the number buttons as follows:
"2" → "1" → "4" → "3"

Example 2 : To select frame number 423, press the number buttons as follows:
"4" → "2" → "3"

 - You cannot search for chapters that overlap titles. You can only search for chapters within the same title.

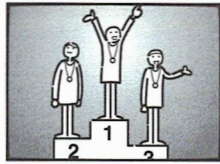
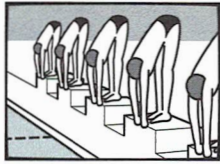
③ **Press the PLAY button.**

- Playback starts from the selected time/frame number.

Note

- ◆ Time search is not possible with CDs.
- ◆ With DVDs, Time search may not be possible with certain discs. In this case, the mark is displayed.
- ◆ When performing Time Search on DVDs or video CDs, playback may start from a slightly different time than that specified.
- ◆ On DVDs, Time search is not possible in stop mode.
- ◆ Search using the above operation is not possible during PBC playback of Video CDs. To search, perform the above operation from the playback mode without using any menus (see page 23).

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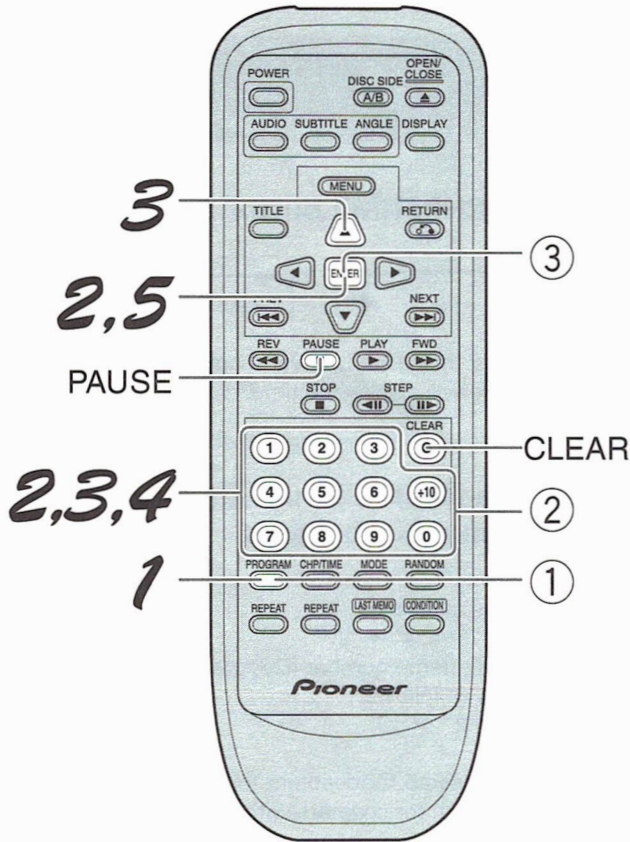


Playback in a Desired Order (Programmed Play)

For DVDs....

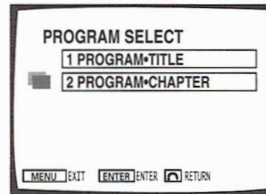
Programming

Up to 24 steps can be programmed.



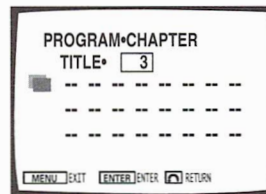
1 During playback or in stop mode, press the **PROGRAM** button.

2 Select the program type with the number buttons and press the **ENTER** button.



- If you have selected "PROGRAM TITLE", go to step 4.
- If you have selected "PROGRAM CHAPTER", go to step 3.

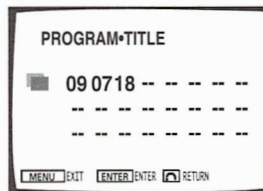
3 Press the direction button **▲** to move to **TITLE**, then use the number buttons to select the title that contains the chapter to be programmed.



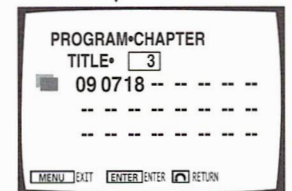
4 Use the number buttons to select titles or chapters on the DVD.

Example : To program titles (or chapters) 9, 7 and 18 in this order, press "9", "7", "+10" then "8".

DVD title



DVD chapter



5 Press the **ENTER** button.

- Playback starts in the set order.
- To stop the programmed play, press the **STOP** button.

For CDs, LDs and Video CDs...

Programming

Up to 24 steps can be programmed.

① **During playback or in stop mode, press the PROGRAM button.**

② **Use the number buttons to select tracks on the disc.**

Example: To program tracks 9, 7 and 18 in this order, press "9", "7", "+10" then "8".

- When using a double-sided LD, program the disc side with each specified track number. For example, to specify track 9 on Side B, press "DISC SIDE", "DISC SIDE", and "9".

③ **Press ENTER button.**

- Playback starts in the specified track order.
- To stop the program play, press the STOP button.

Note

- ◆ You cannot program when playing a Video CD using menu selections (during PBC). To program, perform the above operation from the playback mode without using any menus (see page 23).

Programming a pause


Press the PAUSE button instead of a number button.

- **||** appears on the screen and the pause can be programmed.
- When a programmed pause occurs during programmed playback, press the **PLAY** button to go to the next programmed track.

What if you press the wrong number button?

Press the CLEAR button, and press the correct number button.

Note

- ◆ When moving chapters, chapters not programmed may appear on the screen, but this is not a malfunction.
- ◆ Programming may not be possible with certain DVD discs. On these types of discs, the  mark will appear on the screen when programming is attempted.
- ◆ Only chapters within the same title can be programmed during chapter programming.
- ◆ The programmed play function cannot be used with discs that do not have recorded chapter numbers.
- ◆ Pressing the **CLEAR** button in stop mode will clear all programs.
- ◆ The complete program will be deleted if the disc table is open.

Checking, adding to, or canceling programs

Checking

Press the PROGRAM button.

- Programs can now be confirmed on a CD or Video CD disc.

On a DVD, select the program type with the direction buttons $\blacktriangle/\blacktriangledown$ and press the ENTER button.

- Select either "PROGRAM TITLE", or "PROGRAM CHAPTER".

Adding to a program

1 **Press the PROGRAM button.**

- On a DVD, select then the program type and press the ENTER button.

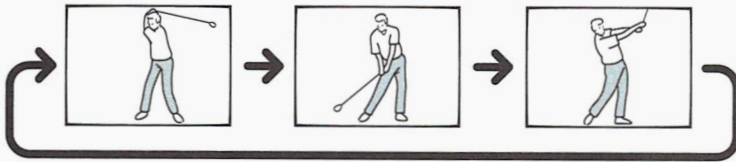
2 **Press a number button, then press the PROGRAM button.**

Canceling a program

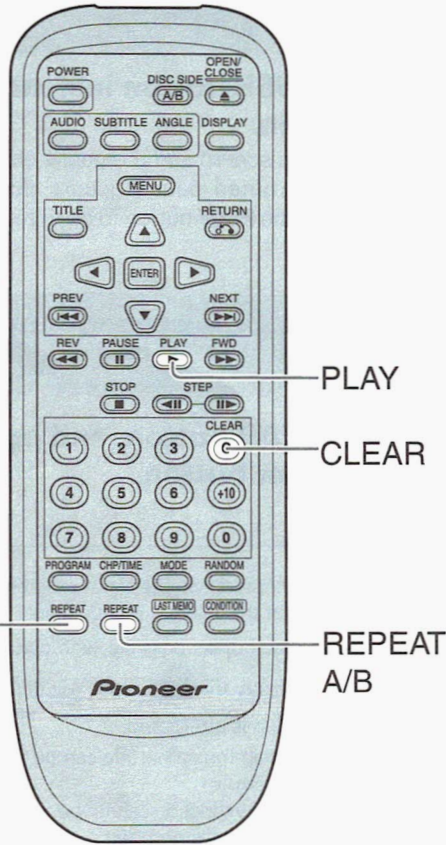
1 **Press the PROGRAM button.**

- On a DVD, select then the program type and press the ENTER button.

2 **Select the program with the direction buttons $\blacktriangleleft/\blacktriangleright$, then press the CLEAR button.**



Repeat Play



Repeat play of a chapter/track

Press the **REPEAT** button once during playback of the chapter or track you want to repeat.

Repeat play of a title

Press the **REPEAT** button twice during playback of the title you want to repeat.

- With DVDs, the title continues playing until the end, and then playback starts once more from the beginning of that title.
- With CDs and Video CDs, a disc is title, so the entire disc is repeated.

Repeat play of double-sided LDs

Press the **REPEAT** button three times.

- Both sides are repeated, starting on side A.

Repeat play of a specified section


Press the **REPEAT A-B** button at the beginning and end of the section you want to repeat.

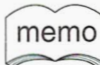
- Press the **CLEAR** button to clear the repeat play

Return to a specified location

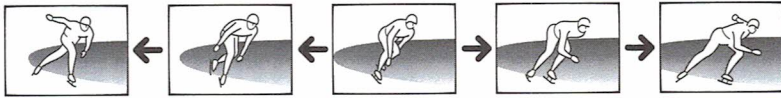
- 1 Press the **REPEAT A-B** button at the desired location.
- 2 When you want to return, press **PLAY** button.
 - Press the **CLEAR** button to clear a specified location.

Note

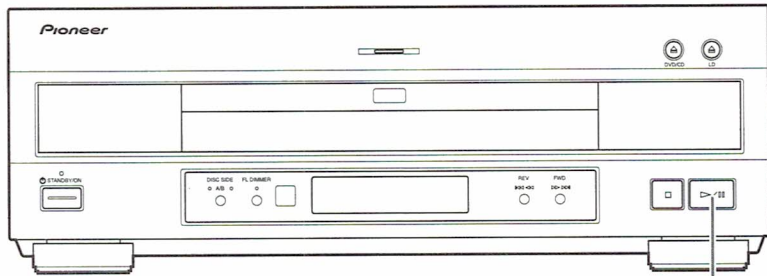
- ◆ Repeat play mode is not supported by some DVD titles. In this case, the  mark will appear on the screen.
- ◆ With Video CDs, repeat play is not possible during playback with the menu displayed (PBC playback). To perform repeat play, start playback without displaying a menu (refer to page 23), and press the **REPEAT** button.



- Press the **REPEAT** button during programmed playback to repeat playback of the program.
- To cancel repeat play mode, either press the **CLEAR** button or press the **REPEAT** button several times until OFF is displayed. Repeat play mode is canceled but playback continues.
- With DVDs, repeat playback between titles is not possible.



Still/Slow/Step Playback



▶/|| button

Viewing a still frame

Press the PAUSE button.

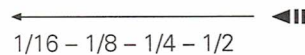
- Press the ▶/|| button on the front of the player.
- If a still image is out of focus, perform the "PAUSE MODE" settings to select the "FIELD" mode (page 37).

Slow playback

Press and hold the STEP ◀|| or ||▶ button during playback.

In forward direction

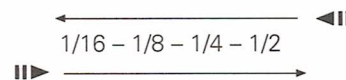
- ▶▶ : Slow playback will be engaged.
- During slow playback, the slow playback speed can be selected with the ◀|| and ||▶ buttons.



In reverse direction (DVD and LD only)

- Press and hold the ◀|| button during playback.
- For DVD: Slow playback in the reverse direction will be engaged. The playback speed cannot be changed.
- For LD: Slow playback will be engaged.

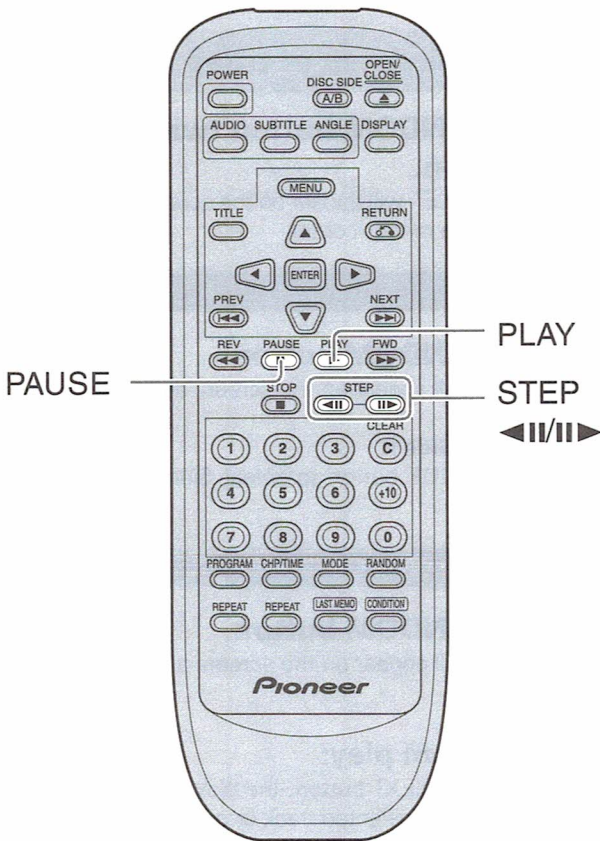
- During slow playback, the slow playback speed can be selected with the ◀|| and ||▶ buttons.



Step playback

Press the ◀|| or ||▶ button during playback or in still picture mode.


- ▶▶ : The picture will be advanced by one frame each time the button is pressed.
- ◀◀ : (for DVD and LD only)
 - For DVD: The picture will be backed up little by little each time the button is pressed.
 - For LD: The picture will be backed up frame by frame each time the button is pressed.



memo

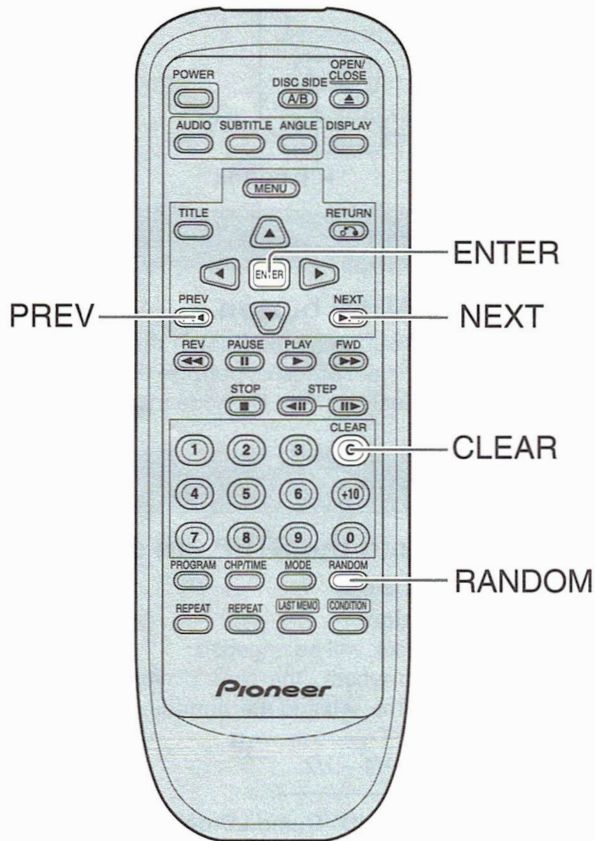
- To return to normal playback, press the **PLAY** button (or the ▶/|| button on the player).

Note

- ◆ There is no sound when viewing still frames or slow playback, or when advancing one frame at a time.
- ◆ Still frame, slow play, or frame advance playback may not be possible with certain titles. In this case, the  mark is displayed.

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Random Play



For DVDs

Random playback of chapters within one title

Press the **RANDOM** button once, then press **ENTER** button.

- "RANDOM CHP" will appear on the screen, and chapters within the title will be played back in a random order.

Random playback of titles

Press the **RANDOM** button twice, then press **ENTER** button.

- "RANDOM TITLE" will appear on the screen, and titles will be played back in a random order.

For LDs

Press the **RANDOM** button.

- "RANDOM" will appear on the screen, and random playback will begin.

Random play of Side B

Press the **DISC SIDE** button to select Side B, then press the **RANDOM** button.

For CDs, Video CDs

Press the **RANDOM** button.

- "RANDOM" will appear on the screen, and random playback will begin.

During Random play:

- If you press the **NEXT** button, the player starts playing from the next randomly selected track or other location.
- If you press the **PREV** button, the player starts playing the current track again from the beginning.

Stopping random play

Press the **CLEAR** button.





- This returns you to normal playback of chapters/tracks in order from the chapter/track currently playing.

Note

- ◆ With Video CDs, random play is not possible during playback with the menu displayed (PBC playback). To perform random play, start playback without displaying a menu (refer to page 23), and press **RANDOM** button.
- ◆ Random play of programmed chapters/tracks is not possible.
- ◆ In the case of DVDs, random play may not be possible with some discs.
- ◆ Repeat playback of random playback is not possible.
- ◆ The random play function cannot be used with discs that do not have recorded chapter numbers.

Troubleshooting

Incorrect operations are often mistaken for trouble and malfunctions. If you think that there is something wrong with this component, check the points below. Sometimes the trouble may lie in another component. Inspect the other components and electrical appliances being used. If the trouble cannot be rectified even after exercising the checks listed below, ask your nearest PIONEER authorized service center or your dealer to carry out repair work.

	Symptom	Possible causes	Reference page	
Operation	1. The disc comes back out even when the disc table is closed.	<ul style="list-style-type: none"> ● The disc is dirty or warped. ● The disc is not placed properly on the disc table. ● Region No. does not conform with this unit. ● There is condensation inside the unit. 	p.53 p.22, 24 p.55 p.52	
	2. Playback is not possible.	<ul style="list-style-type: none"> ● PAL or SECAM system discs cannot be played. ● The disc has been loaded upside down. 	p.5	
Picture	3.  mark appears on screen.	<ul style="list-style-type: none"> ● The selected function does not operate for that disc. 		
	4.  mark appears on screen.	<ul style="list-style-type: none"> ● The operation is prohibited by the unit. 		
	5. Picture playback stops and the operation button can not be used.	<ul style="list-style-type: none"> ● First stop the disc (press the  button), then start playback again. 		
	6. Settings are canceled.	<ul style="list-style-type: none"> ● When the power is turned off by power failure or unplugging of the power cord, settings will be canceled. When unplugging the power cord, first press the  STANDBY/ON switch on the main unit or the POWER button on the remote control and wait until the "-OFF-" indication goes off. 		
	7. No picture.	<ul style="list-style-type: none"> ● Connection is incorrect. ● Operation (settings) of TV or AV amplifier is not appropriate. ● The aspect setting is not appropriate. 	p.12-17 p.33	
	8. The screen image is stretched vertically and/or horizontally or aspect does not change.			
	9. Picture disturbance during playback or dark.	<ul style="list-style-type: none"> ● This unit is compatible with analog copy protect technology copy guard. Some discs include a copy prevention signal, and when this type of disc is played back, stripes etc., may appear on some sections of the picture depending on the TV. (This is not a malfunction.) ● This unit is compatible with analog copy protect technology copy guard. Some discs include a copy prevention signal and the copy guard system will prevent proper playback of recorded pictures. 		
	10. When recorded on a VCR there is disturbance in the playback picture.			
	11. The screen display is in black-and-white.	<ul style="list-style-type: none"> ● This unit is set for Component Video Output but the TV either does not have a corresponding component input jack or it has not been set correctly for component input. ● Component input is selected on the TV side when playing an LD. 	p.35	
	Remote control	12. Remote control operation is not possible.	<ul style="list-style-type: none"> ● The CONTROL IN jack on the rear of the unit is being used. ● The remote control is too far from the unit, or the angle with the remote sensor is too sharp. ● The batteries are exhausted. 	p.12
		13. Improper operation of TV set, etc., occurs.	<ul style="list-style-type: none"> ● Some TVs that have wireless remote control functions may not operate properly with this remote control. 	
Audio	14. Audio is not output or is distorted.	<ul style="list-style-type: none"> ● The DIGITAL OUTPUT's Linear PCM setting is set to 96KHz. Digital output is prohibited on some discs. ● The disc is dirty. ● The connection plugs are not inserted fully into the terminals or are not connected. ● The connection plug or terminal is dirty. ● Audio cable connection is wrong. ● Connection is made to the stereo amplifier's PHONO input terminal. ● The pause mode is engaged. ● Stereo amplifier operation is wrong. (Check input (CD, AUX etc.) selector) 	p.34 p.12	
	15. Noticeable difference in DVD and CD volume.	<ul style="list-style-type: none"> ● The DVD, LD or CD playing is recorded in DTS audio. ● Although you may notice a difference in volume between CDs and DVDs, this is a the result of a difference in disc recording methods. 		
	16. Noise in playback audio.	<ul style="list-style-type: none"> ● The LD playing is recorded in DTS audio. Switch to the analog audio. 	p.39	

Caution

Static electricity or other external influence may cause malfunctioning of this unit. In this case, unplugging the power cord and then re-plugging it in will usually reset the unit for proper operation. If this does not correct the problem, please consult your the nearest PIONEER service center.


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For Proper and Long Use

■ DO NOT MOVE THE UNIT DURING PLAYBACK

During playback, the disc rotates at high speed. Do NOT lift or move the unit during playback. Doing so may damage the disc.

■ WHEN MOVING THE UNIT

When changing places of installation or packing the unit for moving, be sure to remove the disc and return the disc table to its original position in the unit. Then, press the  STANDBY/ON switch to turn the unit to the power standby mode. **Check that the “-OFF-” indication on the display goes off**, then disconnect the power cord. Moving this unit with the disc loaded may result in damage to this unit.

■ INSTALLATION

- Select a stable place to the side of a TV set or stereo system to be connected to the unit.
- When using the unit with a stereo system, install the speakers a little bit away from the TV.
- Do NOT install the unit on top of a TV or color monitor. Install the unit away from equipment that may be affected by magnetism, such as a cassette deck.

■ AVOID INSTALLING IN A PLACE THAT IS:

- Exposed to direct sunlight
- Exposed to humidity or where ventilation is poor
- Extremely hot or cold
- Exposed to vibration
- Exposed to dust
- Exposed to oily smoke, steam or heat (for example, a kitchen)

■ DO NOT PLACE AN OBJECT ON TOP

Do NOT place an object on the unit.

■ DO NOT BLOCK VENTS

Do NOT use the unit on top of a long-fibered carpet, bed or sofa, and do not cover it with a cloth etc. This will prevent heat radiation and could result in damage.

■ AVOID HEAT

Do NOT place the unit on equipment generating heat, such as an amplifier.

When installing the unit in a rack, place it on the lowest shelf possible (however, not where it is exposed to dust) and separated from the amplifier to avoid the heat generated by the amplifier or other audio equipment.

■ CAUTION: WHEN PLACING THE UNIT IN A STEREO RACK WITH GLASS DOORS

Be sure there is ample space between the unit and the glass doors when opening the disc table using the remote control. If the disc table opens against strong resistance, **such as a closed glass door**, damage to the unit may result.

■ CONDENSATION

Moisture will form in the operating section of the unit if the unit is brought from cool surroundings into a warm room or if the temperature of the room rises suddenly. When this happens, player's performance will be impaired.

To prevent this, let the player stand in its new surroundings for about an hour before switching it on, or make sure that the room temperature rises gradually.

Condensation may also form during the summer if the unit is exposed to the breeze from an air conditioner. In such cases, change the location of the unit.



■ SWITCH POWER OFF WHEN NOT USING THE UNIT

Depending on the strength of the TV or radio broadcast signal, having the TV or radio ON while power to the unit is ON may result in stripes on the TV screen or noise. However, this is not a malfunction of this unit or the TV or radio. In such a case, switch the power of the unit OFF.



POWER-CORD CAUTION

Handle the power cord by the plug. Do not pull out the plug by tugging the cord and never touch the power cord when your hands are wet as this could cause a short circuit or electric shock. Do not place the unit, a piece of furniture, etc., on the power cord, or pinch the cord. Never make a knot in the cord or tie it with other cords. The power cords should be routed in such a way that they are not likely to be stepped on. A damaged power cord can cause a fire or give you an electrical shock. Check the power cord once in a while. When you find it damaged, ask your nearest PIONEER authorized service center or your dealer for a replacement.

CARE OF DISCS

How to hold discs

When loading or removing discs, try not to touch their playing surfaces.



Cleaning

Fingerprints or other dirt on the disc may affect sound and picture quality.

To clean your discs, use a soft clean cloth to wipe them. If necessary, moisten a soft cloth with diluted neutral detergent to remove heavy dirt or fingerprints.



Do not wipe in a circular direction
(Concentric scratches in the disc groove tend to cause noise.)



Gently wipe from the inside toward the outer edge.

Discs must not be cleaned with record cleaning sprays, or static prevention sprays, etc. Also do not use volatile liquids such as benzene, or thinner, etc.

NEVER PLAY CRACKED OR WARPED DISCS.

■ The disc revolves in the player at high speed when it is played. Never play a cracked, scratched or warped disc. This may damage the player or cause it to malfunction.



Never use CD's with special shapes.

CD's with special shapes (heart-shaped CDs, octagonal CDs, etc.) cannot be played on this set.

Attempting to do so may damage the set. Do not use such CDs.



After using discs, store them upright

After playing a disc, always remove it from the player and return it to its jacket. Then store it standing upright away from heat and humidity.

- Store discs carefully. If you store discs at an angle, or stacked on top of each other, discs may become warped even when in their jackets.
- Do not leave discs in locations such as the seat of a car, which may become excessively hot.

CAUTION WHEN USING THE DISC

All rights reserved.

Unauthorized public performance, broadcasting or copying is a violation of applicable laws.

CLEANING CARE

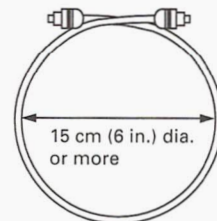
Use a soft, dry cloth for cleaning. For stubborn dirt, soak the cloth in a weak detergent solution; wring well first and wipe. Use a dry cloth to wipe it dry. Do not use any volatile agents such as benzene or paint thinner, as they may damage the surface of the player.

LD/CD lens cleaner

The player's pickup lens should not become dirty in normal use, but if for some reason it should malfunction due to soiling, contact your nearest PIONEER authorized service center. Lens cleaners for LD/CD players are commercially available, but special care should be exercised in their use since some may cause damage to the lens.

Notes on using the optional optical cable

- Do not route cords around sharp angles. When storing, wind the cords so that they have a diameter of at least 15 cm (6 in.).
- When connecting, push all the way into the terminal.
- Do not use cords with a length of over 3m (10 feet).
- If moisture or dust has collected on the plug, wipe it with a soft cloth before connecting.



Glossary

Aspect

Aspect ratio refers to the length to height ratio of TV screens. The ratio of a normal TV is 4:3, while the ratio of a Hi-vision TV or wide TV is 16:9. This allows you to enjoy a picture with a wider perspective.

CAV

CAV disc cases or labels are marked with "Standard play disc/CAV" or "Standard Play".

Chapter number

Chapter numbers are the numbers assigned to sections of a title on the disc, similar to chapters in a book. If the disc includes these numbers, you can locate the section you want very quickly using chapter search and other functions.

CLV

CLV disc cases or labels are marked with "Extended play disc/CLV" or "Extended Play".

Component (color difference) video output

The color signal of the TV is divided into the luminance (Y) signal and the color (C_B and C_R) signals and then output. In this way mutual interference of each signal is avoided. On a TV with component input jacks, these signals are synthesized to produce the picture.

Condition memory

"Condition" refers to the various mode settings etc. On this player, various conditions, such as those set during playback etc. can be memorized. This function allows you to play back the same disc at any time without having to reset the condition settings.

Dolby Digital (AC-3)*

The maximum 5.1 channels of audio used in the surround system (Surround Digital) for movie theaters is digital data compressed by AC-3.



In order to enjoy Dolby Digital (AC-3) discs, this unit's digital output jack (either coaxial or optical) must be connected to the digital input jack of a Dolby Digital (AC-3) amplifier or processor.

DTS

DTS is a surround system different to the Dolby Digital (AC-3) system. In order to enjoy the benefits of DTS discs, the digital output jack (either coaxial or optical) of this player needs to be connected to the DTS input jack of an amplifier or processor.

Dynamic range

Dynamic range refers to the difference between the maximum conversion level for transmission/conversion of distortion free signals and noise and/or the minimum level limited by the equipment's characteristics. Decibel units (dB) are used.

Frame number

This is the number recorded in each frame on a CAV disc. You can use frame numbers for such operations as Frame Search for a desired frame.

High-resolution images

If the high-resolution still images are recorded in the Video CD, you can enjoy viewing them with four times the resolution of moving images.

Laserdiscs with digital audio

These type of discs are recorded with digital audio signals in addition to the analog audio signals. This allows you to enjoy high quality digital sound along with the laser disc's high quality picture.



LD (Laserdisc)

Depending on the signal recording method used, there are two types of Laserdiscs; Standard play discs (CAV) and Extended play discs (CLV).

MPEG

Short for Moving Picture Experts Group. This is an international standard for compression of moving images. On some DVDs digital audio has been compressed and recorded in this format.

Multi-angle

When you watch regular TV programs you are watching the image filmed through the TV camera. Because of this the picture is displayed on your TV from the view point of the TV camera's position. In a TV studio the image is filmed by many cameras at the same time, and one of those images is selected by the program director and transmitted to your TV. If all the filmed images were transmitted to your TV you would be able to select the camera image you want. Some DVD discs are recorded with the angles of all camera's used for filming and these can be selected using this player. These types of discs are called multi-angle discs.

Multi audio discs with digital sound

These type of discs are recorded with different types of digital audio and analog audio content.



* Manufactured under license from Dolby Laboratories. "Dolby", "AC-3" and the double-D symbol are trademarks of Dolby Laboratories. Confidential Unpublished Works, © 1992-1997 Dolby Laboratories, Inc. All rights reserved.

Optical digital output

Normally, audio is converted to an electric signal and transmitted through an electric wire from the player to the amplifier etc.. Changing this signal to a digital signal and transmitting it through an optical fibre cable is called optical digital output. (Optical digital input is the side receiving the signal from external units such as the amplifier etc..)

Parental level

This function was suggested by parents. Parental level restrictions are restrictions incorporated into titles which include scenes that parents do not wish their children to view.

PCM

PCM stands for Pulse Code Modulation and is digital audio. The digital audio of CD or DVD discs is PCM.

Playback Control (PBC)

This refers to signals recorded on a Video CD (Version 2.0) enabling playback control.

You can use menus recorded on discs with PBC for easy, interactive search for desired scenes, and playback.

You can also enjoy viewing high-resolution/standard resolution still images.

Regional restriction codes (region number)

Regional restriction codes are built-in to DVD players and DVD discs for each sales region. If the regional code of the DVD player does not match one of the regional codes of the DVD disc, playback will not be possible.

The region number is described on the rear panel.

Subtitle

Subtitles are language titles superimposed on movies etc. Up to 32 different subtitle languages can be recorded on a DVD disc. The subtitle function can be used to select the language of your choice.

Title number

Title numbers refer to titles of movies etc. As DVD discs have a large capacity, many movies can be recorded on one disc. For example, when 3 different movies are recorded on a disc, they are divided into TITLE 1, TITLE 2 and TITLE 3. Playback can be operated by selecting the title number.

Time number


The time number is the playback lapse time of a title in the disc from its beginning. The scene you want to locate can be searched for with the time number using the time number function etc..

TOC


TOC (Table Of Contents) information is data other than audio signal data, recorded at the beginning of a disc. As the name implies, it's like the list of contents in a book, with information such as the number of songs and playback time.

Video CDs

These discs provide MD quality sound, and VHS quality video images. Thanks to MPEG1, the digital signal compression system, a single disc provides up to 74 minutes of continuous digital audio and video. There are also Video CDs with Playback Control (PBC) that let you select playback of desired scenes using menus, and view still images.

Virtual Dolby Surround 

Sound can be enjoyed virtually when a 2 channel audio system is used. To virtualize the audio output, refer to "Switching to a more spacious sound" on page 37.

SRS Labs, Inc.'s TruSurround system  has been adopted as virtual technology.

TruSurround is a trademark of SRS Labs, Inc. SRS and the SRS symbol are registered trademarks of SRS Labs, Inc. in the United States and selected foreign countries.

TruSurround is incorporated under license from SRS Labs, Inc.

Permission to use TruSurround technology has been registered through SRS Labs, Inc.

Language Code List

• See page 32.

Language	Language-code	Input-code (high-order)	Input-code (low-order)
Japanese	ja	10	01
English	en	05	14
French	fr	06	18
German	de	04	05
Italian	it	09	20
Spanish	es	05	19
Dutch	nl	14	12
Russian	ru	18	21
Chinese	zh	26	08
Korean	ko	11	15
Greek	el	05	12
Afar	aa	01	01
Abkhazian	ab	01	02
Afrikaans	af	01	06
Amharic	am	01	13
Arabic	ar	01	18
Assamese	as	01	19
Aymara	ay	01	25
Azerbaijani	az	01	26
Bashkir	ba	02	01
Belorussian	be	02	05
Bulgarian	bg	02	07
Bihari	bh	02	08
Bislama	bi	02	09
Bengali, Bangla	bn	02	14
Tibetan	bo	02	15
Breton	br	02	18
Catalan	ca	03	01
Corsican	co	03	15
Czech	cs	03	19
Welsh	cy	03	25
Danish	da	04	01
Bhutani	dz	04	26
Esperanto	eo	05	15
Estonian	et	05	20
Basque	eu	05	21
Persian	fa	06	01
Finnish	fi	06	09
Fiji	fj	06	10
Faroese	fo	06	15
Frisian	fy	06	25
Irish	ga	07	01
Scottish Gaelic	gd	07	04
Galician	gl	07	12
Guarani	gn	07	14
Gujarati	gu	07	21
Hausa	ha	08	01

Language	Language-code	Input-code (high-order)	Input-code (low-order)
Hindi	hi	08	09
Croatian	hr	08	18
Hungarian	hu	08	21
Armenian	hy	08	25
Interlingua	ia	09	01
Interlingue	ie	09	05
Inupiak	ik	09	11
Indonesian	in	09	14
Icelandic	is	09	19
Hebrew	iw	09	23
Yiddish	ji	10	09
Javanese	jw	10	23
Georgian	ka	11	01
Kazakh	kk	11	11
Greenlandic	kl	11	12
Cambodian	km	11	13
Kannada	kn	11	14
Kashmiri	ks	11	19
Kurdish	ku	11	21
Kirghiz	ky	11	25
Latin	la	12	01
Lingala	ln	12	14
Laothian	lo	12	05
Lithuanian	lt	12	20
Latvian, Lettish	lv	12	22
Malagasy	mg	13	07
Maori	mi	13	09
Macedonian	mk	13	11
Malayalam	ml	13	12
Mongolian	mn	13	14
Moldavian	mo	13	15
Marathi	mr	13	18
Malay	ms	13	19
Maltese	mt	13	20
Burmese	my	13	25
Nauru	na	14	01
Nepali	ne	14	05
Norwegian	no	14	15
Occitan	oc	15	03
(Afan) Oromo	om	15	13
Oriya	or	15	18
Panjabi	pa	16	01
Polish	pl	16	12
Pashto, Pushto	ps	16	19
Portuguese	pt	16	20
Quechua	qu	17	21
Rhaeto-Romance	rm	18	13

Language Code List

Language	Language-code	Input-code (high-order)	Input-code (low-order)
Kirundi	rn	18	14
Romanian	ro	18	15
Kinyarwanda	rw	18	23
Sanskrit	sa	19	01
Sindhi	sd	19	04
Sangho	sg	19	07
Serbo-Croatian	sh	19	08
Singhalese	si	19	09
Slovak	sk	19	11
Slovenian	sl	19	12
Samoaan	sm	19	13
Shona	sn	19	14
Somali	so	19	15
Albanian	sq	19	17
Serbian	sr	19	18
Siswati	ss	19	19
Sesotho	st	19	20
Sundanese	su	19	21
Swedish	sv	19	22
Swahili	sw	19	23
Tamil	ta	20	01
Telugu	te	20	05
Tajik	tg	20	07
Thai	th	20	08
Tigrinya	ti	20	09
Turkmen	tk	20	11
Tagalog	tl	20	12
Setswana	tn	20	14
Tonga	to	20	15
Turkish	tr	20	18
Tsonga	ts	20	19
Tatar	tt	20	20
Twi	tw	20	23
Ukrainian	uk	21	11
Urdu	ur	21	18
Uzbek	uz	21	26
Vietnamese	vi	22	09
Volapük	vo	22	15
Wolof	wo	23	15
Xhosa	xh	24	08
Yoruba	yo	25	15
Zulu	zu	26	21

Preparation

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Specifications

General

System	DVD system, LaserVision Disc system and Compact Disc digital audio system
Power requirements	AC 120 V, 60 Hz
Power consumption	48 W
Power consumption in standby mode	5.1 W
Weight	8.4 kg (18 lb 9 oz)
Dimensions	420 (W) x 462 (D) x 146 (H) mm (16 ³ / ₁₆ x 18 ³ / ₁₆ x 5 ³ / ₄ in.) (Not including protruding cables, etc.)
Operating temperature	+5°C to +35°C (+36°F to +96°F)
Operating humidity	5% to 85% (no condensation)

S-Video Output (2 pairs)

Y (luminance) - Output level	1 Vp-p (75 Ω)
C (color) - Output level	286 mVp-p (75 Ω)
Jacks	S-VIDEO jack

Video Output (2 pairs)

Output level	1 Vp-p (75 Ω)
Jacks	RCA jacks

Component Video Output

(Y, C _B , C _R)	
Output level	Y: 1.0 Vp-p (75 Ω) C _B , C _R : 0.7 Vp-p (75 Ω)
Jacks	RCA jacks

Audio Output (2 pairs)

Output level	
During audio output	200 mVrms (1 kHz, -20 dB)
Number of channels	2
Jacks	RCA jacks

Digital audio characteristics (DVD fs=96kHz/24 bit)

Frequency response	4 Hz to 44 kHz (DVD fs: 96 kHz) 4 Hz to 20 kHz (LD, CD)
S/N ratio	115 dB
Dynamic range	103 dB
Total harmonic distortion	0.002 %
Wow and flutter	Limit of measurement (±0.001% W. PEAK) or lower

Other Terminals

Optical digital output (AC-3/PCM)	Optical digital jack
Coaxial digital output (AC-3/PCM)	RCA jack
Coaxial digital output (PCM)	RCA jack
AC-3 RF output (for LD)	RCA jack
CONTROL IN	Minijack (3.5Ø)
CONTROL OUT	Minijack (3.5Ø)

Accessories

Remote control unit	1
AA (R6P) dry cell batteries	2
Audio cord	1
Video cord	1
Power cord	1
Operating Instructions	1
Warranty card	1

NOTE:

The specifications and design of this product are subject to change without notice, due to improvement.



We Want You Listening For A Lifetime

Used wisely, your new sound equipment will provide a lifetime of fun and enjoyment. Since hearing damage from loud noise is often undetectable until it is too late, this manufacturer and the Electronic Industries Association's Consumer Electronics Group recommend you avoid prolonged exposure to excessive noise. This list of sound levels is included for your protection.

Decibel

Level	Example
30	Quiet library, soft whispers
40	Living room, refrigerator, bedroom away from traffic
50	Light traffic, normal conversation, quiet office
60	Air conditioner at 20 feet, sewing machine
70	Vacuum cleaner, hair dryer, noisy restaurant
80	Average city traffic, garbage disposals, alarm clock at two feet.

THE FOLLOWING NOISES CAN BE DANGEROUS UNDER CONSTANT EXPOSURE

90	Subway, motorcycle, truck traffic, lawn mower
100	Garbage truck, chain saw, pneumatic drill
120	Rock band concert in front of speakers, thunderclap
140	Gunshot blast, jet plane
180	Rocket launching pad

Information courtesy of the Deafness Research Foundation.



Dear Customer:

Selecting fine audio equipment such as the unit you've just purchased is only the start of your musical enjoyment. Now it's time to consider how you can maximize the fun and excitement your equipment offers. This manufacturer and the Electronic Industries Association's Consumer Electronics Group want you to get the most out of your equipment by playing it at a safe level. One that lets the sound come through loud and clear without annoying blaring or distortion-and, most importantly, without affecting your sensitive hearing.

Sound can be deceiving. Over time your hearing "comfort level" adapts to higher volumes of sound. So what sounds "normal" can actually be loud and harmful to your hearing. Guard against this by setting your equipment at a safe level BEFORE your hearing adapts.

To establish a safe level:

- Start your volume control at a low setting.
- Slowly increase the sound until you can hear it comfortably and clearly, and without distortion.

Once you have established a comfortable sound level:

- Set the dial and leave it there.

Taking a minute to do this now will help to prevent hearing damage or loss in the future. After all, we want you listening for a lifetime.

Preparation

Basic Operations

Settings

Detailed Operations

Other

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