Pioneer

BDP-120 Blu-ray Disc PLAYER







Operating Instructions

OPERATING INSTRUCTIONS

Thank you for buying this Pioneer product.

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.

IMPORTANT



The lightning flash with arrowhead symbol, within an equilateral triangle, is intended to alert the user to the presence of uninsulated SHOCK, DO NOT REMOVE COVER (OR "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 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.

D3-4-2-1-1 A1 En

CAUTION

This product is a class 1 laser product, but this product contains a laser diode higher than Class 1. To ensure continued safety, do not remove any covers or attempt to gain access to the inside of the product. Refer all servicing to qualified personnel.

The following caution label appears on your unit. Location: inside of the unit

SA172WJ



CAUTION: CLASS 2 VISIBLE AND INVISIBLE LASER RADIATION WHEN OPEN. DO NOT STARE INTO THE BEAM. ACHTUNG: BEI GEÖFFNETER ABDECKUNG IST SICHTBARE UND UNSICHTBARE LASERSTRAHLUNG DER KLASSE 2 IM GERÄTEINNEREN VORHANDEN, NICHT IN DEN STRAHL SEHEN. ATTENTION : RADIATIONS LASER VISIBLES ET INVISIBLES DE CLASSE 2 OUAND OUVERT. NE PAS REGARDER FIXEMENT LE FAISCEAU.

VARNING: KLASS 2 SYNLIG OCH OSYNLIG LASERSTRÅLNING NÄR DENNA DEL ÄR ÖPPNAD. TITTA INTE IN I STRÅLEN.

HUOMIO: AVATTAESSA OLET ALTTIINA NÄKYVÄLLE JA NÄKYMÄTTÖMÄLLE LUOKAN 2 LASERSÄTEILYLLE. ÄLÄ KATSO SÄTEESEEN ADVARSEL: KLASSE 2 SYNLIG OG USYNLIG LASERSTRÅLING HVIS DENNE DELEN ÅPNES. STIRR IKKE INN I STRÅLEN.

ADVARSEL: KLASSE 2 SYNLIG OG USYNLIG LASERSTRÅLING VED ÅBNING. KIG IKKE IND LSTRÅLEN
注意: ここを聞くとクラス 2 の可規及び不可視レーザ放射が出ます。
し一ば加財なの矛族はませいことがよい。

D3-4-2-1-8*_C_En

DEAR Pioneer CUSTOMER

WARNING

To prevent a fire hazard, do not place any naked flame sources (such as a lighted candle) on the equipment.

D3-4-2-1-7a_A_En

VENTILATION CAUTION

When installing this unit, make sure to leave space around the unit for ventilation to improve heat radiation (at least 10 cm at top, 10 cm at rear, and 10 cm at each side).

WARNING

Slots and openings in the cabinet are provided for ventilation to ensure reliable operation of the product, and to protect it from overheating. To prevent fire hazard, the openings should never be blocked or covered with items (such as newspapers, table-cloths, curtains) or by operating the equipment on thick carpet or a bed.

D3-4-2-1-7b_A_En

If the AC plug of this unit does not match the AC outlet you want to use, the plug must be removed and appropriate one fitted. Replacement and mounting of an AC plug on the power supply cord of this unit should be performed only by qualified service personnel. If connected to an AC outlet, the cut-off plug can cause severe electrical shock. Make sure it is properly disposed of after removal. The equipment should be disconnected by removing the mains plug from the wall socket when left unused for a long period of time (for example, when on vacation).

CAUTION

The & STANDBY/ON switch on this unit will not completely shut off all power from the AC outlet. Since the power cord serves as the main disconnect device for the unit, you will need to unplug it from the AC outlet to shut down all power. Therefore, make sure the unit has been installed so that the power cord can be easily unplugged from the AC outlet in case of an accident. To avoid fire hazard, the power cord should also be unplugged from the AC outlet when left unused for a long period of time (for example, when on vacation).

WARNING

This equipment is not waterproof. To prevent a fire or shock hazard, do not place any container filled with liquid near this equipment (such as a vase or flower pot) or expose it to dripping, splashing, rain or moisture.

WARNING

Before plugging in for the first time, read the following section carefully.

The voltage of the available power supply differs according to country or region. Be sure that the power supply voltage of the area where this unit will be used meets the required voltage (e.g., 230 V or 120 V) written on the rear panel.

D3-4-2-1-4_En

Operating Environment

Operating environment temperature and humidity: +5 °C to +35 °C (+41 °F to +95 °F); less than 80 %RH (cooling vents not blocked)

Do not install this unit in a poorly ventilated area, or in locations exposed to high humidity or direct sunlight (or strong artificial light)

D3-4-2-1-7c*_A1_En

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 such 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. 5002*_En

This product is for general household purposes. Any failure due to use for other than household purposes (such as long-term use for business purposes in a restaurant or use in a car or ship) and which requires repair will be charged for even during the warranty period.

K041_En

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.

Contents

	DVD-RW/-R/BD-RE/-R Playback	27-28
Introduction	Playback by selecting a title	27
What would you like to do with this Player?5	Playback by selecting a chapter	
	Sorting the titles	
About Discs6-7 Blu-ray Disc	Playback by selecting a Playlist	28
Types of Discs that Can Be Used with This Player 6	Playing back the title you stopped while being pla	ayed 28
	Audio CD Playback	29
Discs that Cannot Be Used with This Player6-7	Playback from the beginning	29
About Disc Contents8	Playback by selecting a track	29
BD Video	Operation procedure for the "Functions" menu	J 29
Title, Chapter and Track	Playback Functions	30-32
Icons Used on DVD Video Disc Cases	Fast Forward/Reverse (Search)	
The Icons Used in This Operating Instructions8	Skipping to the Next or the Start of the Current	
Important Information9	Chapter (Track)	30
Disc Precautions	Pause/Frame Advance Playback	30
Copyright9	Slow Playback	30
Getting Started10	Skip Search	30
Major Components11-12	Replay	
Main Unit (Front)	Repeat Playback of a Title or Chapter	
Main Unit (Rear)	(Repeat Playback)	30
HDMI cable holder on the rear of the main unit 11	Partial Repeat Playback	
Remote Control Unit12	(Repeat Playback of a Specified Part)	31
	Displaying the Audio Information	31
	Displaying the Angle Mark	32
Connection	Switching Subtitles	
Introduction to Connections13	Switching the Angle	32
Video Connections14-16	JPEG File Playback	33
Connecting to the HDMI Terminal	Playing back still images in sequence	33
Selecting the priority video output when connecting	Playing back still images in a selected folder	33
HDMI and Component video14	Playing back Slide Show	33
Connecting to the Component Jacks	Setting slide show speed/repeat playback	33
Connecting to the Video Jack	Settings During Playback	34-35
Audio Connections17	Function Control	34
Connecting to the Digital Audio Terminal or Audio Jacks 17	Function control operation procedure	34
Disc Playback	Settings	00.45
-	SETTINGS	
Before Starting Playback19-23	Common operations	
Loading the Batteries in the Remonte Contorol19	Basic Operation for Playback Setting Audio Video Settings	
Approximate operating range of remote control 19	Quick Start	
Connecting the Power Cord	Auto Power Off	
Turning the power on	KURO LINK	
Entering standby	Playback Setting	
Indicators on the Player	Front Display/LED	
Language Setting21	Version	
Changing the on-screen display language	System Reset	
Operating the TV with the player's remote control 21	Communication Setup	
TV Preset code list	The operation procedure for inputting charact	
Turning Off the LCD Backlight and Indications	manually	
Operate using the remote control unit	USB Memory Management	
HOME MENU operation23	Software Update	
About KURO LINK function		
To use the KURO LINK function		
What the KURO LINK function can do	Appendix	
BD/DVD/CD Playback24-29	• •	40.40
Loading a Disc24	Troubleshooting	
BD/DVD Video Playback	To Reset this Player	
Displaying the disc information	On-screen Error Messages	
BD/DVD Menus25	Glossary	
Start playback by selecting a title from the top menu 25	Specifications Licenses	
Using the disc menu	LICENSES	53
Using the pop-up menu25		
Enjoying BONUSVIEW or BD-LIVE26		
Secondary video playback		



BD-LIVE......26

What would you like to do with this Player?



Watching high quality movies on Bluray discs

This Player offers full high-definition Blu-ray disc playback.

BD/DVD/CD Playback (p. 24)



Enjoying different kinds of discs and contents

Use this Player to enjoy various types of optical discs such as DVDs and CDs that contain various multimedia content.

About Discs (pp. 6-7) BD/DVD/CD Playback (p. 24)



Simple connection and operation through HDMI

This Player is equipped with an HDMI terminal. You can connect it to the TV using HDMI and no other cable will be needed to enjoy movies. If your TV is compatible with KURO LINK, you can control both the TV and this Player with simple operations.

Introduction to Connections (p. 13) Video Connections (p. 14)



Enjoying BD-LIVE functions through the internet

This Player is compatible with BD-LIVE. You can enjoy bonus content such as movie trailers through the internet when playing back BD-Video discs compatible with BD-LIVE.

Enjoying BONUSVIEW or BD-LIVE (p. 26)

What to do first:

Refer to "Getting Started" (p. 10) to prepare for watching your discs.

Introduction (pp. 5-12)

Explains the important operation information.

Connection (pp. 13-18)

Shows the connecting options provided by this Player.

Disc Playback (pp. 19-35)

Shows simple playback and useful functions.

Settings (pp. 36-45)

Gives you more options to suit your circumstances.

Appendix (pp. 46-56)

Provides troubleshooting tips and more information.

About Discs

Blu-ray Disc

Blu-ray Disc is the ultimate next generation optical media format, offering the following key features:

- Largest capacity (25 GB single layer 50 GB dual layer) - with over 5 times the amount of content possible with current DVDs, particularly well suited for high definition feature films with extended levels of interactive features
- · Pristine picture quality with the capability for full high definition 1920 x 1080p resolution
- Best audio possible with uncompressed surround sound
- · Hardware products will be backward compatible with DVDs, allowing continued enjoyment of existing DVD libraries.
- Disc Durability new breakthroughs in hard coating technologies gives Blu-ray Discs the strongest resistance to scratches and finger prints.

Types of Discs that Can Be Used with This Player

- The following discs can be played back in this Player. Do not use an 8 cm (3") to 12 cm (5") adapter.
- · Use discs that conform to compatible standards as indicated by the presence of official logos on the disc label. Playback of discs not complying with these standards is not guaranteed. In addition, the image quality or sound quality is not guaranteed even if the discs can be played back.

D	isc Type	Recording Format	Contents	Disc Size
BD video	Region code B/ALL*1 A/ALL*2 (1) (2) (1) (2) (3) (4) (4) (5) (6) (7) (7) (7) (7) (7) (7) (7) (7) (7) (7	_	Audio + Video (Movie)	12 cm (5")
BD-RE DI BD-R DL		BDMV/BDAV format		
DVD Video	Region code 4/ALL*1 3/ALL*2 *1	Video format	Audio + Video (Movie)	12 cm (5") 8 cm (3")
DVD+RW DVD-R DI DVD+R D DVD-RW/	L L	Video/VR/ AVCHD format (finalized disc only)	Audio + Video (Movie)	12 cm (5") 8 cm (3")
Audio CD	*3	Audio CD (CD-DA)	Audio	
CD-RW/C	D-R	Audio CD (CD-DA)	Audio	12 cm (5") 8 cm (3")
		JPEG*4	Still image (JPEG file)	

- *1 Australia and New Zealand models
- *2 Ohters
- *3 This Player has been designed on the premise of playing back Audio CDs that comply with CD (Compact Disc) standards. CDs containing a signal for the purpose of protecting copyrights (copy control signal) may not be able to be played back with this Player.

- · (Australia and New Zealand models)
 - BD/DVD video players and discs have region codes, which dictate the regions in which a disc can be played. This Player's region code is **B** for BD and **4** for DVD. (Discs marked ALL will play in any player.)
- BD/DVD video players and discs have region codes. which dictate the regions in which a disc can be played. This Player's region code is A for BD and 3 for DVD. (Discs marked ALL will play in any player.)
- BD/DVD Video operations and functions may be different from the explanations in this manual and some operations may be prohibited due to disc manufacturer's settings.
- If a menu screen or operating instructions are displayed during playback of a disc, follow the operating procedure displayed.
- The audio component of a DVD video recorded at 96 kHz (Linear PCM) will be output as 48 kHz audio during playback.

NOTE -

- · Playback for some of the discs in the left side column tables may not be possible depending on the disc.
- "Finalize" refers to a recorder processing a recorded disc so that it will play in other DVD players/recorders as well as this player. Only finalized DVD discs will play back in this player. (This player does not have a function to finalize discs.)

Discs that Cannot Be Used with This Player

The following discs cannot be played back or will not play back properly on this Player. If such a disc is mistakenly played back, speaker damage may occur. Never attempt to play back these discs.

CDG, Video CD, Photo CD, CD-ROM, CD-TEXT, SVCD. SACD, PD, CDV, CVD, DVD-RAM, DVD-Audio, BD-RE with the cartridge, CD-MP3, CD-WMA

Discs with unusual shapes cannot be played.

 Discs with unusual shapes (heart-shaped or hexagonal discs, etc.) cannot be used. The use of such discs will cause malfunction.

The following BD/DVD video discs cannot be played.

- A disc is loaded from a region not compatible with those listed in the "Types of Discs that Can Be Used with This Player" table.
- Discs produced illegally.
- · Discs recorded for commercial use.

The following BD-RE/-R, DVD-RW/-R and DVD+RW/+R discs cannot be played.

- · Discs on which data has not been recorded cannot be played back.
- Pioneer cannot guarantee playback compatibility for all self-recorded BD-discs because Blu-ray is a new and evolving format. The playback compatibility will be affected by your choice of BD-recorder, BD-disc and BD-burning software. Please always ensure you are using the latest software versions on all units and contact the individual manufacturers for further help if required. To avoid inconveniences, please check the playback compatibility of your self-recorded disc before you purchase this BD-player. For maximum playback compatibility of self-recorded BD-discs Pioneer recommends that the BDMV/BDAV

About Discs

standards are used. If a playback issue occurs after purchase, please download the latest software version for your BD-player from the Pioneer internet page or ask your Pioneer-Dealer. This BD-player uses the latest technology available at the time of development and cannot guarantee support for future enhancements or changes to the standard.

The following Audio CD discs cannot be played.

- Discs containing a signal for the purpose of protecting copyrights (copy control signal) may not be played back with this Player.
- This Player has been designed on the premise of playing back Audio CDs that comply with CD (Compact Disc) standards. The following CD-RW/-R discs cannot be played.

The following CD-RW/-R discs cannot be played.

- Discs on which data has not been recorded cannot be played back.
- Disc that has not been finalized.
- Discs recorded in a format other than an Audio CD and JPEG file format*4 cannot be played back.
- Discs may not be played back depending on their recording status or the status of the disc itself.
- Discs may not be played back depending on their compatibility with this Player.

*4 About the JPEG file format

JPEG is a type of file format for storing still-image files (photos, illustrations, etc.). The Player lets you play JPEG format still-image files.

File formats that are not compatible.

- Still images in formats other than JPEG (such as TIFF) cannot be played.
- There may be some files that cannot be played even if they are in JPEG format.
- · Progressive JPEG files cannot be played.
- Moving image files and audio files as well as Motion JPEG format files cannot be played, even though they are JPEG files

Other files that cannot be played back.

 You may not be able to play some still images which you have created, touched up, copied or otherwise edited on your computer.

You may experience one or more of the following symptoms when playing files.

- It may take some time to play files depending on the number of folders, number of files and volume of data involved.
- EXIF information will not be displayed. EXIF stands for Exchangeable Image File Format, and is a standard for storing interchange information in image files, especially those using JPEG compression. (Refer to http://exif.org for more information.)

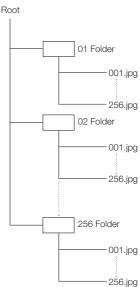
When using the unit to play a CD-RW/-R disc with still images stored (recorded).

- Discs that are not formatted in music CD format, or discs containing mixed media (for example, music, videos, and still photos in jpeg format) may not be playable. You may not be able to play some of these discs at all.
- Multi-session discs cannot be played.
- You may not be able to play some still images you have processed (rotated or saved by overwriting other images) using image processing software or some still images you have imported from the Internet or e-mail.

- The discs which this Player can play back (recognize) are limited to the following properties:
 - Contains EXIF format files
 - Picture resolution: Between 32 × 32 and 7680 × 4320 pixels
 - Maximum number of folders: 256
 - Maximum number of files in each folder: 256
 - File size: 20 MB or less

Structure of still images (JPEG) folders

You can play still images (JPEG) with this unit by making folder on disc as shown below.



About Disc Contents

BD Video

Enjoy BD-specific functions including BONUSVIEW (BD-ROM Profile 1 Version 1.1), such as picture-in-picture, and BD-LIVE

For the BD video discs compatible with BONUSVIEW/BD-LIVE, you can enjoy additional contents by copying the data from the discs or downloading it via the internet. For instance, this function is capable of playing the original movie as the primary video while playing video commentary from the film director on a small screen as a secondary video.

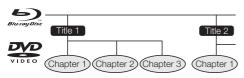
NOTE

. The available functions differ depending on the disc

Title, Chapter and Track

- · Blu-ray discs and DVDs are divided into "Titles" and "Chapters". If the disc has more than one movie on it, each movie would be a separate "Title". "Chapters", on the other hand, are subdivisions of titles. (See Example 1.)
- · Audio CDs are divided into "Tracks". You can think of a "Track" as one tune on an Audio CD. (See Example 2.)

Example 1: Blu-ray disc or DVD

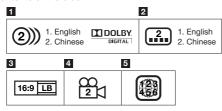


Example 2: Audio CD



Icons Used on DVD Video Disc Cases

The back of the case of a DVD that is commercially available usually contains various information about the contents of the disc.



1 Audio tracks and audio formats

DVD discs can contain up to 8 separate tracks with a different language on each. The first in the list is the original track.

This section also details the audio format of each soundtrack - Dolby Digital, DTS, MPEG etc.

Dolby Digital

A sound system developed by Dolby Laboratories Inc. that gives movie theater ambience to audio output when the Player is connected to a Dolby Digital processor or amplifier.

DTS

DTS is a digital sound system developed by DTS, Inc. for use in cinemas.

Linear PCM

Linear PCM is a signal recording format used for Audio CDs and on some DVD and Blu-ray discs. The sound on Audio CDs is recorded at 44.1 kHz with 16 bits. (Sound is recorded between 48 kHz with 16 bits and 96 kHz with 24 bits on DVD video discs and between 48 kHz with 16 bits and 192 kHz with 24 bits on BD video discs.)

2 Subtitle languages

This indicates the kind of subtitles.

3 Screen aspect ratio

Movies are shot in a variety of screen modes.

4 Camera angle

Recorded onto some DVD discs are scenes which have been simultaneously shot from a number of different angles (the same scene is shot from the front, from the left side, from the right side, etc.).

5 Region code

This indicates the region code (playable region code).

The Icons Used in This Operating Instructions

BD VIDEO |..... Indicates the functions that can be orformed for PD Video disease

	performed for BD video discs.
BD-RE	Indicates the functions that can be
	performed for BD-RE discs.
BD-R	Indicates the functions that can be
	performed for BD-R discs.
DVD VIDEO	Indicates the functions that can be
	performed for DVD Video discs.
DVD-RW	Indicates the functions that can be
	performed for DVD-RW discs.
DVD-R	Indicates the functions that can be
	performed for DVD-R discs.
AUDIO CD	Indicates the functions that can be
	performed for Audio CDs.
CD-R JPFG	Indicates the functions that can be
	performed for CD-R discs in JPEG format.
CD-RW	Indicates the functions that can be
JPEG	performed for CD-RW discs in JPEG format
AVCHD	Indicates the functions that can be
	performed for DVD discs in AVCHD format.

Important Information

Disc Precautions

Be Careful of Scratches and Dust

 BD, DVD and CD discs are sensitive to dust, fingerprints and especially scratches. A scratched disc may not be able to be played back. Handle discs with care and store them in a safe place.

Proper Disc Storage

Place the disc in the center of the disc case and store the case and disc upright.	
Avoid storing discs in locations subject to direct sunlight, close to heating appliances or in locations of high humidity.	
Do not drop discs or subject them to strong vibrations or impacts.	* 0
Avoid storing discs in locations where there are large amounts of dust or moisture.	

Handling Precautions

 If the surface is soiled, wipe gently with a soft, damp (water only) cloth. When wiping discs, always move the cloth from the center hole toward the outer edge.







- Do not use record cleaning sprays, benzene, thinner, static electricity prevention liquids or any other solvent.
- Do not touch the surface.
- · Do not stick paper or adhesive labels to the disc.
- If the playing surface of a disc is soiled or scratched, the Player may decide that the disc is incompatible and eject the disc tray, or it may fail to play the disc correctly. Wipe any dirt off the playing surface with a soft cloth.

Cleaning the Pick Up Lens

- Never use commercially available cleaning discs. The use of these discs can damage the lens.
- Request the nearest service center approved by Pioneer to clean the lens.

Warnings about dew formation

- Condensation may form on pick up lens or disc in the following conditions:
 - Immediately after a heater has been turned on.
 - In a steamy or very humid room.
 - When the Player is suddenly moved from a cold environment to a warm one.

When condensation forms:

 It becomes difficult for the Player to read the signals on the disc and prevents the Player from operating properly.

To remove condensation:

 Take out the disc and leave the Player with the power off until the condensation disappears. Using the Player when there is condensation may cause malfunction.

Copyright

 Audio-visual material may consist of copyrighted works which must not be recorded without the authority of the owner of the copyright. Refer to relevant laws in your country. 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.

U.S. Patent Nos. 6,836,549; 6,381,747; 7,050,698; 6,516,132; and 5,583,936

- Manufactured under license from Dolby Laboratories.
 "Dolby" and the double-D symbol are trademarks of Dolby Laboratories.
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- is a trademark of DVD Format/Logo Licensing Corporation.



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BONUS VIEW™

"BONUSVIEW" is trademark of Blu-ray Disc Association.



 This label indicates playback compatibility with DVD-RW discs recorded in VR format (Video Recording format).
 However, for discs recorded with a record-only-once encrypted program, playback can only be achieved using a CPRM compatible device.

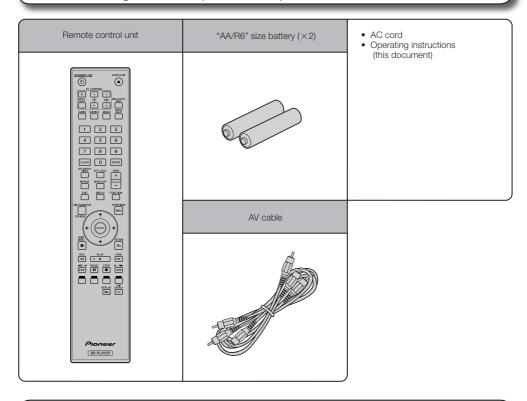


• "AVCHD" and the "AVCHD" logo are trademarks of Panasonic Corporation and Sony Corporation.

Getting Started

Step 1: Unpacking

Make sure the following accessories are provided with the product.



Step 2: Selecting equipment to connect

Connection varies with the equipment used. Refer to Connection. (Pages 13-18) Turn off the devices before connecting.

Step 3: Playing back discs

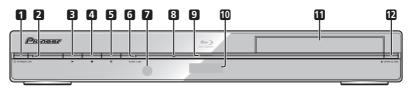
Play back a Blu-ray disc after connecting the Player to your favorite equipment. Refer to Disc Playback. (Pages 19-35)

Step 4: Adjust settings

Adjust settings to enjoy various features and other functions for playing discs. Refer to Settings. (Pages 36-45)

Major Components

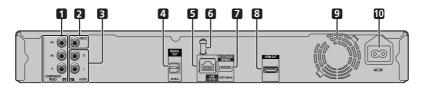
Main Unit (Front)



- 2 STANDBY/ON indicator (p. 20)
- 3 ► PLAY (p. 24)
- 4 STOP (p. 24)
- 5 PAUSE (p. 30)
- 6 KURO LINK indicator (pp. 20, 23)

- 7 Remote control sensor (p. 19)
- 8 BD/DVD/CD disc indicator (p. 20)
- 9 Playback indicator (p. 20)
- 10 Front panel display (p. 20)
- 11 Disc tray (p. 24)
- 12 ▲ OPEN/CLOSE (p. 24)

Main Unit (Rear)



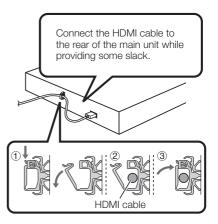
- COMPONENT VIDEO OUTPUT jacks (p. 15)
- 2 VIDEO OUTPUT jack (p. 16)
- 3 AUDIO OUTPUT jacks (p. 17)
- 4 DIGITAL OUT OPTICAL terminal (p. 17)
- 5 LAN terminal (p. 18)
- 6 HDMI cable holder (See below.)
- 7 BD STORAGE/SERVICE terminal BD STORAGE (pp. 26, 43) SERVICE for software (p. 44)
- 8 HDMI OUT terminal (p. 14)
- 9 Cooling fan The cooling fan operates while the power to the Player is on.
- 10 AC IN terminal (p. 19)

HDMI cable holder on the rear of the main unit

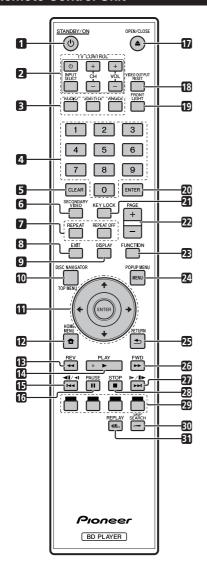
This Player comes with a dedicated cable holder so that the HDMI cable does not place direct weight and stress on the terminal. When connecting the HDMI cable, be sure to pass the cable through the cable holder and secure it.

(M) CAUTION

- Do not pull on the HDMI cable when it is connected to the terminal, as this can damage the terminal or cause a poor connection.
- (1) Press down on the tab and pull it towards you.
- 2 Pass the HDMI cable (commercially available) through the cable holder.
- (3) Press in on the tab until it clicks into position.



Remote Control Unit



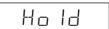
- 1 ₼ STANDBY/ON (p. 20)
- 2 TV CONTROL buttons (p. 21)
- 3 AUDIO (p. 31), SUBTITLE (p. 31), ANGLE (p. 32)
- Number buttons (p. 35)
- 5 CLEAR (p. 35)
- SECONDARY VIDEO (p. 26) 6
- 7 REPEAT (pp. 30, 31), REPEAT OFF (pp. 30, 31)
- EXIT (pp. 20, 36) 8
- 9 DISPLAY (pp. 24, 31)
- 10 TOP MENU/DISC NAVIGATOR (pp. 25, 27)
- **11** Cursor buttons (**↑**/**↓**/**←**/**→**), ENTER (pp. 21, 36)
- 12 HOME MENU (pp. 21, 36)
- 13 ◀◀ REV (p. 30)
- 14 ► PLAY (p. 24)
- **15** I◀◀/◀II/◀I (pp. 27, 30)
- 16 II PAUSE (p. 30)
- 17 ▲ OPEN/CLOSE (p. 24)
- 18 VIDEO OUTPUT RESET (p. 37)
- 19 FRONT LIGHT (p. 23)
- 20 ENTER (pp. 21, 36)
- 21 KEY LOCK (See below.)
- 22 PAGE +/- (p. 27)
- 23 FUNCTION (p. 34)
- 24 POPUP MENU/MENU (p. 25)
- 26 FWD (p. 30)
- 27 ►►I/II►/I► (pp. 27, 30)
- 28 STOP (p. 24)
- 29 RED, GREEN, YELLOW, BLUE (pp. 27, 33)
- 30 → SKIP SEARCH (p. 30)

Keylock function

You can set the keylock to prevent accidental operations. This function allows TVs compatible with KURO LINK to also perform a Key Lock on the player.

Press and hold **KEY LOCK** for more than 5 seconds.

- Each time you perform this operation, the function is activated or deactivated.
- If you try to operate the Player while the keylock function is set, "Hold" blinks on the front display panel to indicate that the keylock function is set.



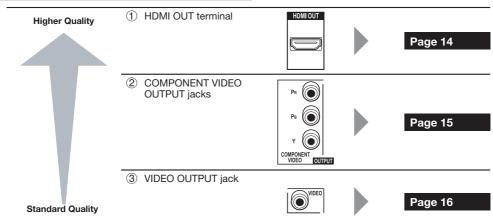
NOTE

• This remote control unit is equipped with two ENTER buttons (11 and 20 listed above).

Introduction to Connections

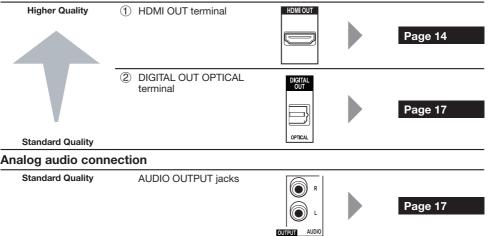
Be sure to turn off the power and unplug the power cord from the power outlet whenever making or changing connections. This Player is equipped with the terminals/jacks listed below. Find the corresponding terminals/jack on your video equipment. Using the supplied cable or commercially available cables, connect the video first. Then connect the audio.

Video terminals/jacks on this Player



Audio terminals/jacks on this Player

Digital audio connection



Broadband Internet connection

LAN terminal





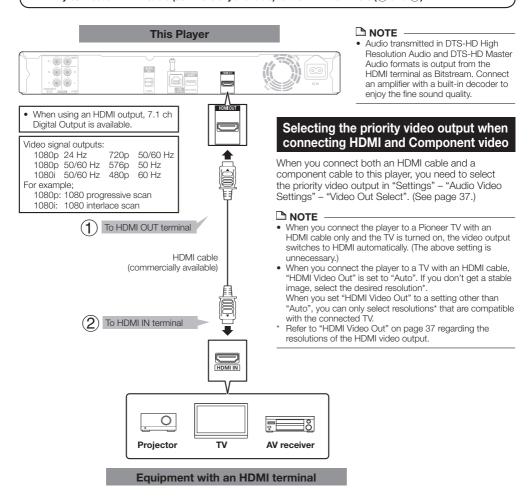
Video Connections

Connecting to the HDMI Terminal

- You can enjoy high quality digital picture and sound through the HDMI terminal.
- See page 45 for information on the output of next generation audio formats.
- Use High Speed HDMI™ cables when using the KÜRO LINK function. The KURO LINK function may not
 operate properly if other HDMI cables are used.

STEPS

- 1 Be sure to turn off this Player and the equipment before making any connections.
- 2 Firmly connect an HDMI cable (commercially available) to the HDMI terminals (1) and 2).



After connecting

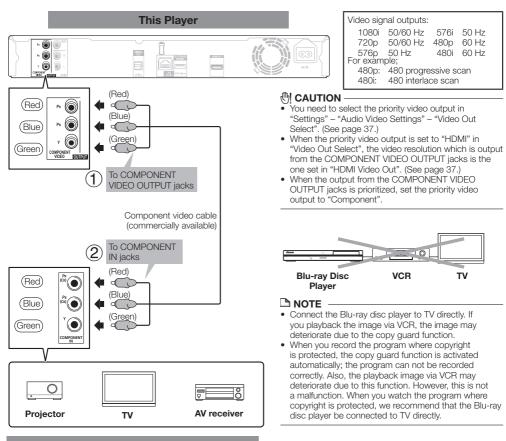
- Secure the HDMI cable to the HDMI cable holder, passing it through the holder. (Page 11)
- If desired, connect audio equipment. (Page 17)
- Load a disc and start playback. (Pages 24-29)
- Refer to KURO LINK function. (Pages 23 and 38)

Connecting to the Component Jacks

You can enjoy accurate color reproduction and high quality images through the component jacks.

STEPS

- 1 Be sure to turn off this Player and the equipment before making any connections.
- 2 Firmly connect a component video cable (commercially available) to the component jacks (1) and 2).



Video equipment with component jacks

After connecting

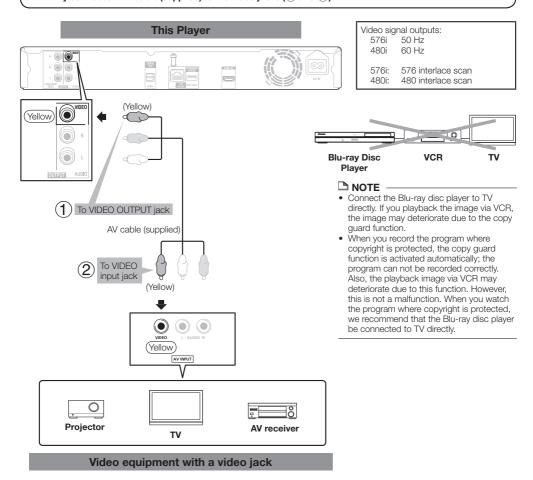
• Connect audio equipment or the audio terminals of the TV. (Page 17)

Connecting to the Video Jack

You can enjoy the images through the video jack.

STEPS

- Be sure to turn off this Player and the equipment before making any connections.
- Firmly connect an AV cable (supplied) to the video jacks (1) and 2).



After connecting

Connect audio equipment or the audio terminals of the TV. (Page 17)

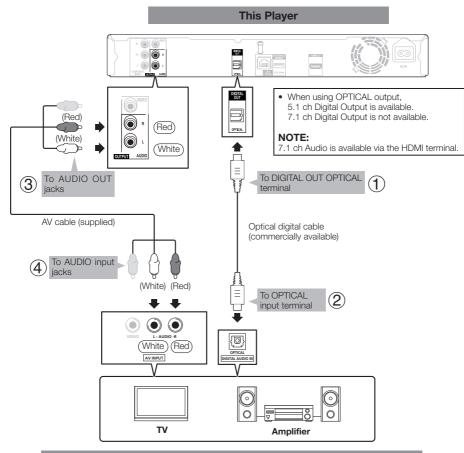
Audio Connections

Connecting to the Digital Audio Terminal or Audio Jacks

- You can connect audio equipment or the TV to the DIGITAL OUT OPTICAL terminal or AUDIO OUTPUT jacks.
- See page 45 for information on the output of next generation audio formats.

STEPS

- 1 Be sure to turn off this Player and the equipment before making any connections.
- 2 Firmly connect an optical digital cable (commercially available) or AV cable (supplied) to the optical digital audio terminals or audio jacks (1) and 2, or 3 and 4).



Audio equipment with a digital audio input terminal

After connecting

• Load a disc and start playback. (Pages 24-29)

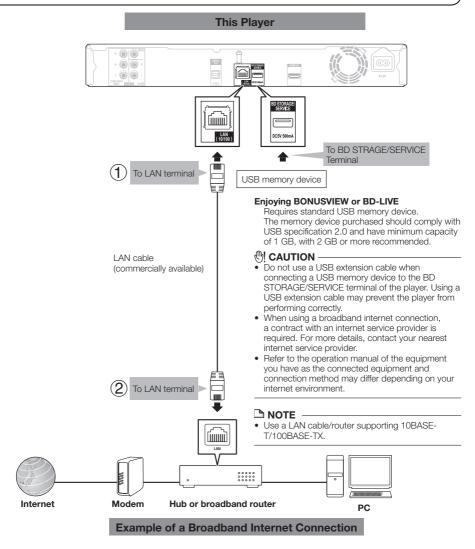
Broadband Internet Connection

Connecting to the LAN terminal

- You can enjoy a variety of contents with interactive functions by connecting to the internet when playing BD-LIVE compatible discs. Refer to pages 26 and 39 regarding further information on BD-LIVE functions.
- When using the internet, a broadband internet connection as shown below is required.

STEPS

- 1 Be sure to turn off this Player and the equipment before making any connections.
- 2 Firmly connect a LAN cable (commercially available) to the LAN terminal (1) and 2).



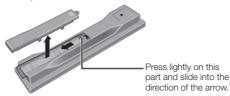
After connecting

- Perform the communication setting. (Pages 40–42)
- Load a BD-LIVE compatible disc and play back the contents. (Pages 24 and 26)

Before Starting Playback

Loading the Batteries in the Remote Control

Open the rear cover.



2 Insert the batteries (AA/R6 x 2). Insert as indicated by the ⊕/⊝ marks into the battery compartment.



3 Close the rear cover. Close securely (a click should be heard).



(M) CAUTION

marks (\oplus and \ominus).

- Do not use any batteries other than the ones specified.
 Also, do not use a new battery together with an old one.
- When loading the batteries into the remote control, set them in the proper direction, as indicated by the polarity
- Do not heat batteries, disassemble them, or throw them into flames or water.
- Batteries may have different voltages, even if they look similar. Do not use different kinds of batteries together.
- To prevent leakage of battery fluid, remove the batteries if you do not plan to use the remote control for a long period of time (1 month or more). If the fluid should leak, wipe it carefully off the inside of the case, then insert new batteries. If a battery should leak and the fluid should get on your skin, flush it off with large quantities of water.
- When disposing of used batteries, please comply with governmental regulations or environmental public institution's rules that apply in your country/area.

WARNING

Do not use or store batteries in direct sunlight or other excessively hot place, such as inside a car or near a heater. This can cause batteries to leak, overheat, explode or catch fire. It can also reduce the life or performance of batteries.

Approximate operating range of remote control

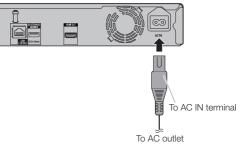
Remote control sensor

7 m

Remote control unit

Connecting the Power Cord

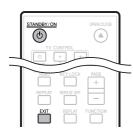
Plug the supplied AC cord into the AC IN terminal on the rear of the Player. Then plug into AC outlet.

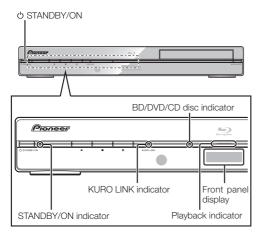


NOTE

- Place the Player close to the AC outlet, and keep the power plug within reach.
- TO PREVENT RISK OF ELECTRIC SHOCK, DO NOT TOUCH THE UN-INSULATED PARTS OF ANY CABLES WHILE THE AC CORD IS CONNECTED.
- The STANDBY/ON indicator blinks while the Player is preparing for starting up. You cannot turn the Player on until the STANDBY/ON indicator stops blinking.
- If you are not going to use this Player for a long period of time, be sure to remove the AC cord from the AC outlet.

Turning the Power On





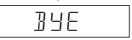
Turning the power on

Press & STANDBY/ON on the remote control or on the Player to turn on the power of the Player.



Entering standby

Press & STANDBY/ON on the remote control or on the Player to enter standby.



• If you press & STANDBY/ON again immediately after entering standby, the Player may not turn on. If this happens, wait for 10 seconds or more and then turn on the power again.

NOTE

· When the STANDBY/ON indicator is blinking (may take some time), the Player cannot be turned on.

Indicators on the Player

STANDBY/ON indicator

Blue on	Power on	
Red blinks	Preparing for standby	
Red on	Standby	

KURO LINK indicator

Output the optimum picture quality for "KURO"
(See page 23.)

BD/DVD/CD disc indicator

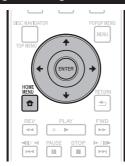
Off	No disc	
White on	Disc stopped	
White blinks	Loading a disc	

Playback indicator

Blue on	Playing back

• When you turn on the power, the Menu screen automatically displays for a while. Press **EXIT** to erase the display.

Language Setting



Changing the on-screen display language

Press HOME MENU to display the Home Menu screen.



Press 1/↓/←/→ to select "On Screen Language", then press ENTER.



Press ↑/↓ to select the language you want to display on the screen, then press ENTER.



		•
English	Nederlands	Česky
Deutsch	Svenska	Magyar
Français	Dansk	Slovensky
Italiano	Norsk	Slovenščina
Español	Suomi	
Português	Polski	

NOTE

To select the DVD disc language, such as subtitle language, etc., see page 25.

Operating the TV with the player's remote control

When the manufacturer code for your brand of TV is set on the player's remote control, the TV can be operated using the player's remote control.

(M) CAUTION

- . For some models it may not be possible to operate the TV with the player's remote control, even for TVs of brands listed on the manufacturer code list.
- · The setting may be restored to the default after the batteries are replaced. If this happens, reset it.



- Input the 2-digit manufacturer code.
 - · Press the number buttons (0 to 9) to input the code while pressing TV CONTROL &

NOTE

- . The factory setting is 00 (PIONEER).
 - If you make a mistake when inputting the code, release TV CONTROL & then start over from the beginning.
 - · When there are multiple codes for a manufacturer, try inputting them in the indicated order until the TV can be operated.
- Check that the TV can be operated.
 - . Operate the TV using TV CONTROL

& - Press to turn the TV's power on and off. INPUT SELECT - Press to switch the TV's input. CH +/- - Press to select the TV channel. VOL +/- - Press to adjust the volume.

TV Preset code list

Manufacturer Code(s)

ACURA 44 **ADMIRAL** 31 **AIWA** 60 AKAI 32, 35, 42 AKURA 41 ALBA 07, 39, 41, 44 AMSTRAD 42, 44, 47 **ANITECH** 44 **ASA** 45 ASUKA 41 AUDIOGONIC 07, 36 BASIC LINE 41, 44

BAUR 31, 07, 42

BEKO 38

PIONEER 00, 31, 32, 07, 36, 42, BEON 07 **BLAUPUNKT** 31 **BLUE SKY 41 BLUE STAR** 18 **BPL** 18 **BRANDT** 36 **BTC** 41 BUSH 07, 41, 42, 44, 47, 56 **CASCADE** 44 CATHAY 07 **CENTURION** 07 **CGB** 42 **CIMLINE** 44 **CLARIVOX** 07 **CLATRONIC** 38 **CONDOR** 38

(Continued on the next page)

Before Starting Playback

CONTEC 44 **CROSLEY** 32 **CROWN** 38, 44 CRYSTAL 42 CYBERTRON 41 **DAEWOO** 07, 44, 56 **DAINICHI** 41 DANSAI 07 **DAYTON** 44 **DECCA** 07, 48 **DIXI** 07, 44 **DUMONT** 53 **ELIN** 07 ELITE 41 ELTA 44 **EMERSON** 42 FRRES 07 **FERGUSON** 07, 36, 51 **FINLANDIA** 35, 43, 54 FINLUX 32, 07, 45, 48, 53, 54 FIRSTLINE 40, 44 FISHER 32, 35, 38, 45 **FORMENTI** 32, 07, 42 FRONTECH 31, 42, 46 FRONTECH/PROTECH 32 **FUJITSU** 48 **FUNAI** 40, 46, 58 GBC 32, 42 GE 00, 01, 08, 07, 10, 11, 17, PHILIPS 31, 07, 34, 56, 68 02, 28, 18 GEC 07, 34, 48 **GELOSO** 32, 44 **GENERAL** 29 GENEXXA 31 41 **GORENJE** 38 **GPM** 41 **GRAETZ** 31, 42

GOLDSTAR 10, 23, 21, 02, 07, 50 R-LINE 07 GOODMANS 07, 39, 47, 48, 56 RADIOLA 07 **GRANADA** 07, 35, 42, 43, 48 GRADIENTE 30, 57 **GRANDIN** 18 **GRUNDIG** 31, 53 HANSEATIC 07, 42 **HCM** 18, 44 HINARI 07, 41, 44 HISAWA 18 HITACHI 31, 33, 34, 36, 42, 43, SAMSUNG 07, 38, 44, 46, 69, 70 54, 06, 10, 24, 25, 18 **HUANYU** 56 HYPSON 07, 18, 46 ICE 46, 47

INGELEN 31 INTERFUNK 31, 32, 07, 42 INTERVISION 46, 49 ISUKAI 41 **ITC** 42 ITT 31, 32, 42 **JEC** 05 JVC 13, 23 **KAISUI** 18, 41, 44 KAPSCH 31 KENDO 42 **KENNEDY** 32, 42

KORPEL 07

IMPERIAL 38, 42

INDIANA 07

KOYODA 44 LEYCO 07, 40, 46, 48 LIESENK&TTER 07 LOEWE 07 LUXOR 32, 42, 43

M-ELECTRONIC 31, 44, 45, 54, TATUNG 07, 48 56, 07, 36, 51 MAGNADYNE 32, 49

MAGNAFON 49 MAGNAVOX 07, 10, 03, 12, 29 **TELETECH** 44 **MANESTH** 39, 46

MARANTZ 07

MARK 07 MATSUI 07, 39, 40, 42, 44, 47, 48 TOMASHI 18 MCMICHAEL 34 MEDIATOR 07 **MEMOREX** 44 METZ 31 MINERVA 31, 53

MULTITECH 44, 49 **NEC** 59 NECKERMANN 31, 07 **NEI** 07, 42 NIKKAI 05, 07, 41, 46, 48

NOBLIKO 49 **NOKIA** 32, 42, 52 NORDMENDE 32, 36, 51, 52

OCEANIC 31, 32, 42 ORION 32, 07, 39, 40 **OSAKI** 41, 46, 48 OSO 41 OSUME 48 OTTO VERSAND 31, 32, 07, 42

PALLADIUM 38

PANAMA 46 PANASONIC 31, 07, 08, 42, 22 **PATHO CINEMA** 42 PAUSA 44 PHILCO 32, 42 PHOENIX 32

PROFEX 42, 44 PROTECH 07, 42, 44, 46, 49 QUELLE 31, 32, 07, 42, 45, 53

PHONOLA 07

RADIOSHACK 10, 23, 21, 02 **RBM** 53 RCA 01, 10, 15, 16, 17, 18, 61,

62,09 **REDIFFUSION** 32, 42

REX 31, 46 **ROADSTAR** 41, 44, 46 **SABA** 31, 36, 42, 51 **SAISHO** 39, 44, 46 **SALORA** 31, 32, 42, 43 SAMBERS 49

SANYO 35, 45, 48, 21, 14, 91 **SBR** 07, 34 **SCHAUB LORENZ** 42

SCHNEIDER 07, 41, 47 **SEG** 42, 46 SEI 32, 40, 49 **SELECO** 31 42 **SHARP** 02, 19, 27, 67, 90 **SIAREM** 32, 49 SIEMENS 31 SINUDYNE 32, 39, 40, 49

SKANTIC 43 SOLAVOX 31 **SONOKO** 07, 44 **SONOLOR** 31, 35 SONTEC 07 SONY 04 **SOUNDWAVE** 07 STANDARD 41, 44

STERN 31 SUSUMU 41 SYSLINE 07 **TANDY** 31, 41, 48 TASHIKO 34 **TEC** 42 **TELEAVIA** 36 **TELEFUNKEN** 36, 37, 52

TENSAI 40, 41 THOMSON 36, 51, 52, 63

THORN 31, 07, 42, 45, 48 TOSHIBA 05, 02, 26, 21, 53 TOWADA 42 **ULTRAVOX** 32, 42, 49 **UNIDEN** 92

UNIVERSUM 31, 07, 38, 42, 45, MITSUBISHI 09, 10, 02, 21, 31 46, 54

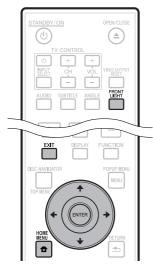
VESTEL 07 VICTOR 13 VOXSON 31 WALTHAM 43 WATSON 07

WATT RADIO 32, 42. 49 WHITE WESTINGHOUSE 07

YOKO 07, 42, 46 **ZENITH** 03, 20

Turning Off the LCD Backlight and Indications

If you feel that the indicators on the Player are too bright when watching movies, you can turn them off except for the STANDBY/ON indicator.



Operate using the remote control unit

Press **FRONT LIGHT** to turn the LCD backlight on or off.

HOME MENU operation

- 1 Press HOME MENU to display the Home Menu screen.
- 2 Press ↑/↓/←/→ to select "Settings", then press ENTER.
- 3 Press ↑/↓ to select "Front Display/LED", then press ENTER.

Audio Video Settings
Quick Start
Auto Power Off
KURO LINK
Playback Setting
Communication Setup
Front Display/LED
Version
USB Memory Management
Software Update
System Reset

- 4 Press ←/⇒ to select "On" or "Off", then press ENTER.
- 5 Press HOME MENU or EXIT to exit.

About KURO LINK function

The functions work when a Pioneer KURO LINK-compatible Flat Screen TV or AV system (AV receiver or amplifier, etc.) is connected to the player using an HDMI cable. Also refer to the operating instructions of the Flat Screen TV and AV system(AV receiver or amplifier, etc.).

To use the KURO LINK function

- The KURO LINK function operates only when "Video Out Select" is set to "HDMI".
- The KURO LINK function operates when KURO LINK is set to On for all devices connected with HDMI cables.
- Once connections and the settings of all the devices are finished, be sure to check that the player's picture is output to the Flat Screen TV. (Also check after changing the connected devices and reconnecting HDMI cables.)
 The KURO LINK function may not operate properly if the player's picture is not properly output to the Flat Screen TV.
- Use High Speed HDMI[™] cables when using the KURO LINK function. The KURO LINK function may not operate properly if other HDMI cables are used.
- For some models, the KURO LINK function may be referred to as "HDMI Control".
- The KURO LINK function does not work with devices of other brands, even if connected with an HDMI cable.

What the KURO LINK function can do

 Outputting the optimum picture quality for "KURO" from the player.

When the KURO LINK function is enabled, video signals with the optimum picture quality for "KURO" are output from the player's HDMI terminal.

The KURO LINK indicator on the player lights red.



 Operating the player with the Flat Screen TV's remote control.

Such player operations as starting and stopping playback and displaying the menus can be performed from the Flat Screen TV.

 The player's playback picture is displayed on the Flat Screen TV's screen. (Auto-select function)

The input switches automatically on the Flat Screen TV and AV system (AV receiver or amplifier, etc.) when playback is started on the player or the Home Menu or Disc Navigator is displayed. When the input is switched, the playback picture, the Home Menu or Disc Navigator appears on the Flat Screen TV.

 The power of the Flat Screen TV and the player turns on and off automatically.

(Simultaneous power function)

When playback on the player is started or the Home Menu or Disc Navigator is displayed, if the Flat Screen TV's power was off, its power turns on automatically. When the Flat Screen TV's power is turned off, the player's power automatically turns off.

 The player's on-screen display language switches automatically. (Unified language function)

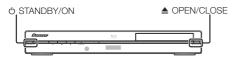
When the language information from a connected Flat Screen TV is received, you can have the player's on-screen display language change automatically to that of the Flat Screen TV. This function is available only when playback is stopped and the menu screen is not displayed.

BD/DVD/CD Playback

This section explains playback of commercially available BD Video and DVD Video discs (like movies), CDs, and recorded BD-RE/-R, DVD-RW/-R discs.

Loading a Disc





- 1 Press & STANDBY/ON to turn on the power.
- 2 Press ▲ OPEN/CLOSE to open the disc trav.
- 3 Load a disc on the disc tray.
 - Insert the disc with the label face up.
 - In case of disc recorded on both sides, face down the side to play back.



4 Press ▲ OPEN/CLOSE to close the disc tray.

BD/DVD Video Playback



This player supports DVD upscaling during DVD playback.



- 1 Load a disc.
 - Playback may begin automatically, depending on the disc.
 - · Playback begins from the first title.
 - The menu may be displayed first, depending on the disc. Perform playback operation by following the directions on the screen.
- 2 Press ► PLAY if playback does not begin automatically or playback is stopped.

NOTE

. The disc load time may vary depending on the disc.

To stop playback

Press **STOP**.

Resume playback function

 If you press ➤ PLAY next, playback will resume from the point where the Player was previously stopped. To playback from the beginning, cancel resume mode by pressing ■ STOP, then press ➤ PLAY. (This may not work depending on the type of disc. In this case, open the disc tray or enter standby.)

NOTE

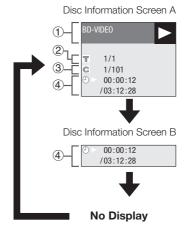
Resume playback may not function depending on the disc.

Displaying the disc information



Press **DISPLAY** during playback.

 Each time you press DISPLAY, the display switches as follows.



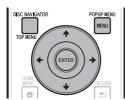
- Type of disc
- (2) Title number being played/Total number of Titles
- ③ Chapter number being played/Total number of Chapters
- 4 Elapsed playback time/Total playback time for the

NOTE

- Disc Information Screen A disappears after about 1 minute elapses without performing any operations.
- For some commercially-released BD VIDEO discs, the total playback time display for the Chapter/Title may not appear.

BD/DVD Menus

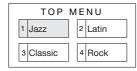
- This section explains how to play back a BD/DVD video disc with a top menu, disc menu or pop-up menu.
- The titles listed in the top menu and a disc guide (for options like subtitles and audio languages) are given in the disc menu.



Start playback by selecting a title from the top menu

BD VIDEO | DVD VIDEO |

- 1 Press TOP MENU/DISC NAVIGATOR.
 - The top menu screen is displayed if present on the BD/DVD video disc.



- 2 Press ↑/↓/←/→ to select the title, then press ENTER.
 - The selected title is played back.

NOTE

 The procedure explained on this page is the basic operation procedure. Procedures vary depending on the BD/DVD video disc, so you may need to follow the instructions in the BD/DVD video disc manual or the instructions displayed on the screen.

Top menu

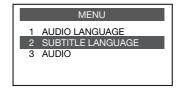
- With some BD/DVD discs, the top menu may be referred to as the "Title Menu". Use TOP MENU/DISC NAVIGATOR on the remote control when the instructions refer to "Title Menu".
- If no top menu is available, the TOP MENU/DISC NAVIGATOR button will have no effect.

Using the disc menu

DVD VIDEO

Example: Select "SUBTITLE LANGUAGE".

- 1 Press TOP MENU/DISC NAVIGATOR.
 - The disc menu screen is displayed if present on the DVD video disc.
- 2 Press ↑/↓ to select "SUBTITLE LANGUAGE", then press ENTER.
 - The screen for selecting the subtitle language is displayed.



- 3 Press ↑/↓ to select the subtitle language, then press ENTER.
- 4 Press TOP MENU/DISC NAVIGATOR to exit.

Using the pop-up menu

BD VIDEO

- 1 Press POPUP MENU/MENU during playback.
 - The pop up menu screen is displayed.
 - The menu contents displayed vary depending on the disc. For details on how to see and operate the popup menu, refer to the manual for the disc.



- 2 Press ↑/↓/←/→ to select the desired item, then press ENTER.
- 3 Press POPUP MENU/MENU to exit.
 - The pop-up menu will automatically disappear for some discs.

Enjoying BONUSVIEW or BD-LIVE

BD VIDEO

This Player is compatible with additional functions of BD-Video, BONUSVIEW (BD-ROM Profile 1 Version 1.1) and BD-LIVE.

When using BD-Video discs compatible with BONUSVIEW, you can enjoy such functions as secondary video (picture in picture) and secondary audio, as well as subtitles and previews. When playing discs supporting BD-LIVE, special video images and other data can be downloaded from the Internet

Data recorded on BD video and downloaded from BD-LIVE is stored on the USB memory device (external memory). To enjoy these functions, connect a USB memory device (minimum 1 GB capacity (2 GB or more recommended)) supporting USB 2.0 High Speed (480 Mbit/s) to the BD STORAGE/SERVICE terminal (page 11) on the back of this player.

- To recall data stored in the USB memory device, first insert the disc media that was being used at the time the data was downloaded (if a different disc is loaded, the data stored on the USB memory device cannot be played).
- If a USB memory device containing other data (previously recorded) is used, the video and audio may not play back properly.
- If the USB memory device is disconnected from this player during playback, playback of the disc will stop. Do not disconnect the USB memory device while playback is in
- Some time may be required for the data to load (read/ write).

(M) CAUTION

. It may not be possible to use the BD-LIVE functions if there is insufficient space on the USB memory device. In this case, refer to "USB Memory Management" on page 43 for erasing the Virtual Package data and the BD-LIVE data in the USB memory device.

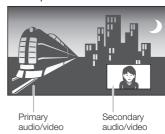
NOTE -

- · Operation of USB memory devices is not guaranteed.
- · Playback of BD-LIVE function data differs depending on the disc used. For details, consult the user instructions supplied with the disc. (pages 18 and 40.)
- To enjoy the BD-LIVE function, a network connection and settings are required (pages 19 and 40).
- For conditions and restrictions regarding Internet connections using the BD-LIVE function, see the section "BD Internet Access" (page 39).
- . BD-LIVE is a function that provides for automatic connection to the Internet. Discs supporting the BD-LIVE function may send ID codes identifying this player and the disc to the contents provider via the Internet.
- The unit can be set to prevent automatic connection to the Internet. For instructions on this setting, see the section "BD Internet Access" (page 39).

Secondary video playback

BD-Video that includes secondary audio and video compatible with Picture in Picture can be played back with secondary audio and video simultaneously as a small video in the corner.

Press SECONDARY VIDEO during playback to show the 2-picture screen.



To remove the secondary video, press SECONDARY VIDEO again.

NOTE

- To listen to secondary audio, make sure that "Secondary Audio" is set to "On". (See page 37.)
- The secondary audio and video for Picture In Picture may automatically play back and be removed depending on the content. Also, playable areas may be restricted.

Virtual Package

For BD-Video discs compatible with Virtual Package, data is copied from the discs or internet to local storage. It is automatically copied to the local storage prior to playback. You can enjoy a variety of additional functions including secondary video, secondary audio, subtitles, movie trailers, etc.

• The playback methods vary depending on the disc. For details, refer to the disc manual.

BD-LIVE

In this Player, a variety of contents with interactive functions are available through BD-LIVE compatible Blu-ray discs by connecting to the internet. You can enjoy the download of bonus features such as latest movie trailers to the USB memory device, communication compatible BD-J interactive games. etc

• The available functions differ depending on the disc.

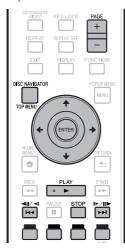
NOTE

- · Regarding playback method of BD-LIVE contents, etc., perform the operations in accordance with the instructions in the BD disc manual.
- . To enjoy BD-LIVE functions, perform the broadband internet connection (page 18) and communication settings (pages 40-42).
- · Refer to page 39 regarding the setup to restrict access to BD-LIVE contents.

BD-RE/-R/DVD-RW/-R Playback

BD-RE BD-R DVD-RW DVD-R

You can play back a recorded disc (DVD: VR format finalized disc only / BD: BDAV format disc only).

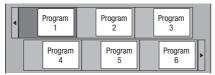


□ NOTE

 "Finalize" refers to a recorder processing a recorded disc so that it will play in other DVD players/recorders as well as this player. Only finalized DVD-RW/-R discs will play back in this player. (This player does not have a function to finalize discs.)

Playback by selecting a title

- 1 Load a recorded disc.
 - The Disc Navigator screen is displayed.



- When loading a BD disc with usage restrictions placed by a BD recorder, the PIN code input screen appears. Then, input your PIN code.
 - If you input a wrong PIN code three times, the disc tray will open. Close the disc tray, and then input a correct PIN code.
- If the Disc Navigator screen is not displayed, press TOP MENU/DISC NAVIGATOR.
- 2 Press ↑/↓/←/→ to select the desired title, then press ENTER.
 - When seven or more titles are displayed, switch pages by pressing PAGE +/-. The same operation can be performed by pressing I◄◄/◄II/◄I or ▶►I/II►/I►.
 - Playback of the selected title will begin.
 You can playback by pressing PLAY instead of pressing ENTER.
- 3 Press STOP to stop playback.

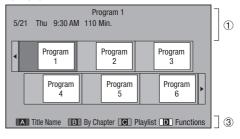
NOTE

 The Disc Navigator screen also can be displayed by pressing TOP MENU/DISC NAVIGATOR when playback is stopped or by pressing ENTER after choosing "Disc Navigator" in Home Menu when playback is stopped.

About Disc Navigator

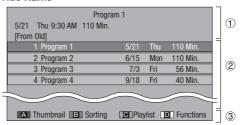
- The Disc Navigator can be displayed in two types, Thumbnail and Title Name.
- Each time you press RED, the screen changes between Thumbnail and Title Name.

Thumbnail





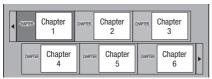
Title Name



- 1 Information of selected title
- Title Name
 Recording Date
 Recording Duration
- ③ Caption for RED, GREEN, YELLOW, BLUE buttons
- When seven or more titles are displayed, switch pages by pressing PAGE +/-.The same operation can be performed by pressing I◄◄/◄II/◄I or ►►I/II►/I►.

Playback by selecting a chapter

- Press GREEN while the Thumbnail screen is displayed.
 - The chapter screen is displayed.



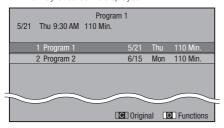
- When seven or more chapters are displayed, switch pages by pressing PAGE +/-. The same operation can be performed by pressing I◄◄/◄II/◄II or ►►I/ II►/II
- To return to the Thumbnail screen, press GREEN.
- 2 Press ↑/↓/←/→ to select the desired chapter, then press ENTER.
 - Playback of the selected chapter will begin.
 You can playback by pressing PLAY instead of pressing ENTER.
- 3 Press STOP to stop playback.

Sorting the titles

Each time you press **GREEN**, while the Title Name screen is displayed, the Title Name display changes between displaying the newest title first and the oldest title first.

Playback by selecting a Playlist

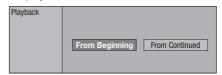
- Press YELLOW while the Thumbnail screen is displayed.
 - The Playlist screen is displayed.



- 2 Press ↑/↓ to select the title, then press ENTER.
 - · Playback of the selected title will begin.
- 3 Press STOP to stop playback.

Playing back the title you stopped while being played

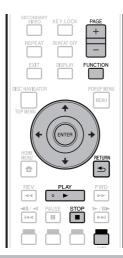
 Press BLUE while the Disc Navigator screen is displayed.



- 2 Press ←/→ to select the type of Playback, then press ENTER.
 - Playback of the title will begin.
- 3 Press STOP to stop playback.

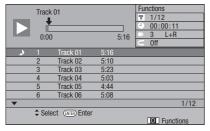
Audio CD Playback

AUDIO CD



Playback from the beginning

- 1 Load an audio CD.
 - The CD screen is displayed. (The CD screen is displayed only when a compact disc recorded in the CD-DA format is inserted.)
 - Playback may begin automatically, depending on the disc.



- 2 Press ➤ PLAY if playback does not begin automatically or playback is stopped.
- **3** Press **STOP** to stop playback.

Resume playback function

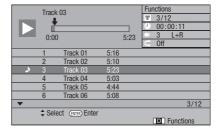
 If you press ▶ PLAY next, playback will resume from the point where the Player was previously stopped. To playback from the beginning, cancel resume mode by pressing ■ STOP, then press ▶ PLAY. (This may not work depending on the type of disc. In this case, open the disc tray or enter standby.)

NOTE

Resume playback may not function depending on the disc.

Playback by selecting a track

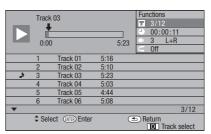
- Press ↑/↓ to select the track, then press ENTER during playback or when playback is stopped.
 - Playback of the selected track will begin.
 - When seven or more tracks are displayed, switch pages by pressing PAGE +/-.



2 Press STOP to stop playback.

Operation procedure for the "Functions" menu

- Press BLUE (Functions) when the CD screen is displayed.
 - The "Functions" menu is activated.



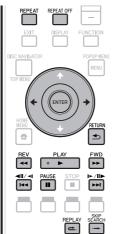
- Press ↑/↓ to select the desired setting, then press ENTER.
 - When playback is stopped, only "Track" can be selected.
 - For a description of each setting, see "Functions which can be set" (Page 35).
- 3 Press ↑/↓/←/→ to set, then press ENTER.
 - Operations vary depending on the setting. Follow the operation instructions on the screen.
- 4 Press **⇒ RETURN** or **BLUE** to exit the "Functions" menu.

NOTE

The displayed items vary depending on the disc.

Playback Functions





NOTE

 Some operations in the following playback functions cannot be performed depending on the specifications of the disc.

Fast Forward/Reverse (Search)

Fast Forward/Reverse functions when ◀◀ REV or ►► FWD is pressed during playback.

Example: When **>> FWD** is pressed

 The search speed will change each time you press the button.

Skipping to the Next or the Start of the Current Chapter (Track)

Skipping (to the beginning of a chapter or track) functions when I◄◄/◄II/◄I or ►►I/II►/I► is pressed during playback.

Pause/Frame Advance Playback

Pause functions when **II PAUSE** is pressed during playback. (If you are playing back an audio CD, the CD will also pause.)

Frame Advance Playback functions when ▶►I/II►/I► is pressed during Pause.

 Frame Advance Playback may not function properly with discs other than DVD-RW (VR format).

□ NOTE

- Some BD/DVD Video discs are not compatible with Pause/ Frame Advance Playback.
- Frame Advance/Reverse Playback can be performed for DVD discs by pressing ►►I/II►/I► or I◄◄/◄II/◀I during pause (Frame Reverse Playback cannot be performed BD video discs).

Slow Playback

Slow Playback functions when ▶►I/II►/I► or I◄◄/◀II/

- ◀ is pressed for more than 2 seconds during pause.
- Press > PLAY to return to normal playback.

NOTE

- · This doesn't work for audio CDs.
- Reverse Slow Playback cannot be performed for BD video and DVD discs in AVCHD format.

Skip Search

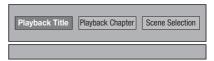
Playback skips 30 seconds ahead when → **SKIP SEARCH** is pressed during playback.

Replay

Playback jumps back 10 seconds when **c. REPLAY** is pressed during playback.

Repeat Playback of a Title or Chapter (Repeat Playback)

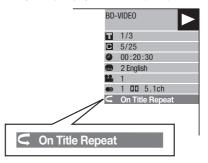
- 1 Play back the title or chapter you want to repeat.
- 2 Press REPEAT.
- 3 Press ←/→ to select the type of Repeat Playback.
 - Playback Title: Repeats the title currently being played back
 - Playback Chapter: Repeats the chapter currently being played back.
 - Scene Selection: Repeats the specified scene of title or chapter.



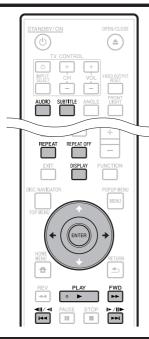
- Press
 RETURN to cancel without setting the type of Repeat Playback.
- For Audio CD, you can select "Playing Disc", "Playing Track" and "Specify The Part" as Repeat Playback options.

4 Press ENTER.

Example: Repeat playback of a title (TITLE)



5 Press REPEAT OFF or REPEAT to return to normal playback.

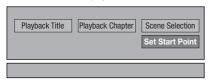


Partial Repeat Playback (Repeat Playback of a Specified Part)

DVD VIDEO DVD-RW DVD-R AUDIO CD

NOTE

- Some operations in the following playback function cannot be performed depending on the specifications of the disc.
- 1 Press REPEAT during playback.
- 2 Press ←/→ to select "Scene Selection", then press ENTER.
 - "Set Start Point" displays.



- 3 Press ENTER at the scene where you want to set the start point.
 - · "Set End Point" displays.
- 4 Press ENTER at the scene where you want to set the end point.
 - You can press > FWD to fast forward to the scene where you want to set the end point. When you reach the desired scene, simply press > PLAY and then ENTER to set the end point. To cancel Repeat Playback, press REPEAT OFF or REPEAT.

□ NOTE

- Press ►►I/II►/I►, the Repeat Playback is cancelled and the next chapter (track) being play back.
- Press I◄◄/◄II/◄I once, the Repeat Playback is cancelled and the player returns to the start of current chapter (track).
- If you press I◄◄/◄II/◄I again (within about 5 seconds) the player will skip to the beginning of the previous chapter (track).
- For Partial Repeat Playback, set the start and end points within the same title.
- Repeat Playback may be forbidden depending on the disc.
- During BD video, the same scene cannot be played repeatedly.
- Partial Repeat Playback may not work in multi-angle scenes.
- If you press **DISPLAY**, you can confirm the Repeat Playback status.

Displaying the Audio Information

You can display the audio information on the disc currently being played back by pressing **AUDIO**.

• The displayed contents vary depending on the disc.

BD VIDEO DVD VIDEO

The audio track currently being played back will be displayed.

If multiple audio channels are recorded, you can switch the audio channel by pressing **AUDIO**.

BD-RE BD-R DVD-RW DVD-R

In the event bilingual (multiplex) broadcasts are recorded:

 The display will show "MAIN", "SUB" or "MAIN SUB"

When a recorded broadcast with stereo or monaural audio is played back:

"Stereo" is displayed. (Audio cannot be switched.)

AUDIO CD

Each time **AUDIO** is pressed, the audio change as below.

NOTE

- When you play a program recorded in stereo or monaural, and if you are listening to the Bitstream sound via the digital output jack, you cannot select the audio channel. Set "Audio Out" to "PCM" (Page 38), or if you want to change the audio channel, listen via the analog output jacks.
- Settig for audio can be changed also in Function Control Screen (Page 34).
- Some discs allow changing of the audio channel via a menu. For details, see the manual for the disc.
- The display for audio automatiocally disappear after 5 seconds.

Switching Subtitles

If subtitles are provided in multiple languages, you can switch between them.

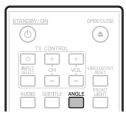
Press SUBTITLE during playback.

- The display indicates the subtitle number currently being played back, and the subtitles appear.
- Each time SUBTITLE is pressed, the subtitles change.
- "-" is displayed if a disc has no subtitles.
- · You can also select "Off".

NOTE

- Settig for subtitles can be changed also in Function Control Screen (Page 34).
- Some discs allow changing of the subtitles channel via a menu. For details, see the manual for the disc.
- The display for subtitles automatiocally disappear after 5 seconds.

Switching the Angle



If multiple angles are recorded, you can switch between them.

1 Press **ANGLE** during playback.

- The display indicates the angle number currently being played back. Each time you press ANGLE, the angle switches.
- "-" is displayed if a disc is recorded with only one angle.



To return to the previous angle, press **ANGLE** to cycle through the angles until you return to the original angle.

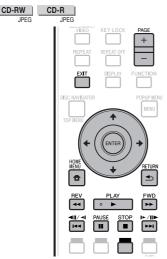
Displaying the Angle Mark

You can change settings so that Angle Mark appears in the right bottom part of the screen when multiple angles are recorded. (The Angle Mark is displayed for BD/DVD video.) The settings can be changed in "Settings" - "Playback Setting" - "Angle Mark Display" (Page 39).

NOTE

- Settig for angles can be changed also in Function Control Screen (Page 34).
- Some discs allow changing of the angle channel via a menu. For details, see the manual for the disc.
- The display for angles automatiocally disappear after 5 seconds.

JPEG File Playback



NOTE

- This Player can play still images (JPEG files) that have been recorded on CD-RW/-R discs. For details on the still images that you can play using this player, refer to "About the JPEG file format" on page 7.
- During "Normal play", still images are played one by one while during "Slide show", they are automatically replaced one after another.
- JPEG files cannot be played back from a USB memory device with this player.

Playing back still images in sequence

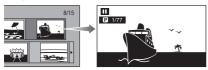
- 1 Load the disc containing the still images, and press > PLAY.
 - The first still image appears on the screen.
 - Press I◄◄/◄॥/◄। or ►►I/II►/I► to proceed to the next or previous still image.
 The same operation can be performed by pressing

the same operation can be performed by pressing ←/→ or ← REV/▶ FWD.

To stop the still image playback at any time, press STOP.

Playing back still images in a selected folder

- 1 Load the disc containing still images, then press **HOME MENU**.
- 2 Press ↑/↓/←/→ to select "Photos", then press ENTER.
- 3 Use ↑/↓/←/→ to select the folder whose still images are to be played, then press ENTER.



 When seven or more folders are displayed, switch pages by pressing PAGE +/-. The same operation

- can be performed by pressing $\mathbb{I} \mathbb{I} / \mathbb{I} / \mathbb{I}$ or $\mathbb{I} \mathbb{I} / \mathbb{I}$
- 4 Press I◄◄/◄II/◄I or ►►I/II►/I► to replace one image with another.
 - The same operation can be performed by pressing
 ←/⇒ or ◀◀ REV/▶➤ FWD.
 - Press

 RETURN if you wish to return to the folder selection screen.
- To stop the still image playback at any time, press STOP.

Playing back Slide Show

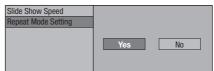
- 1 In Step 2 of the left side "Playing back still images in a selected folder", press ▶ PLAY (Slide Show).
 - The still images inside the selected folder are played as a slide show.
- 2 To pause the playback at any time, press **PAUSE**.
 - Press ➤ PLAY to resume playback.
- **3** To stop the play at any time, press **STOP**.
 - Press PRETURN to play a slide show of still images in another folder.

Setting slide show speed/repeat playback

- 1 Press YELLOW (Slide Show Menu) during the folder selection screen.
 - The setting screen for "Slide Show Speed"/"Repeat Mode Setting" appears.
- 2 Press ↑/↓ to select "Slide Show Speed", then press ENTER.



- The slide show speed may be selected from "Fast", "Normal", "Slow1" and "Slow2".
- 3 Press ↑/↓ to select the desired speed, then press ENTER.
- 4 Press ↑/↓ to select "Repeat Mode Setting", then press ENTER.



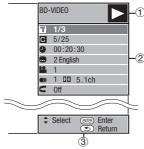
- 5 Press ←/→ to select the desired item, then press ENTER.
- 6 Press EXIT to exit.

Settings During Playback

Function Control

This allows you to adjust various settings at once, like subtitles, audio and angle settings and the title selection for Direct Playback. The operations are the same for BD and DVD.

Function control screen



1 Playback status display

Shows the operation status and the disc type.

2 Setting items

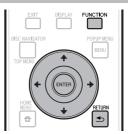
Selects a title (or track) or chapter for playback, or performs subtitile, audio and angle settings.

- Title/Track Number (Direct Title/Track Skip)
- · Chapter Number (Direct Chapter Skip)
- Playback Elapsed Time (Direct Time Skip)
- Subtitle Language
- Angle Number
- Audio
- Repeat

(3) Operation guide display

Provides help on remote control button operations.

Function control operation procedure



- 1 Press FUNCTION during playback.
 - The Function Control screen is displayed on the TV.
- 2 Press ↑/↓ to select the desired setting, then press ENTER.
 - For a description of each setting, see "Functions which can be set" (Page 35).



- **3** Press $\uparrow/\downarrow/\leftarrow/\Rightarrow$ to set, then press **ENTER**.
 - Operations vary depending on the setting. Follow the operation instructions on the screen.
- 4 Press

 → RETURN or FUNCTION to close the Function Control screen.

□ NOTE

- If "--" is displayed for an option like title number or subtitles, the disc has no titles or subtitles which can be selected.
- The displayed items vary depending on the disc.
- If you access the Function Control screen, it may be impossible to operate the BD/DVD video playback. In cases like this, close the Function Control screen.

Functions which can be set

Title/Track Number (Direct Title/Track Skip)

- Shows the title number being played back (or track number when playing back an audio CD). You can skip to the start of the title (or track).
- To skip to the start of a selected title (or track), press the number buttons (0 to 9) to
 enter the title (or track) number when this option is highlighted.

Chapter Number (Direct Chapter Skip)

- Shows the chapter number being played back. You can skip to the start of the chapter.

 To this to the start of the chapter.
- To skip to the start of a selected chapter, press the number buttons (0 to 9) to enter the chapter number when this option is highlighted.

Playback Elapsed Time (Direct Time Skip)

- Shows the time elapsed from the beginning of the current disc title (or track). This lets
 you skip to a specific time.
- Press ←/→ to select the Hour, Minute or Second, then press ↑/↓ or the number buttons (0 to 9) to set the time. Press ENTER to start playback at the set time.

NOTE

- ENTER button: Enters the input number.
- CLEAR button: Clears the input number.

Subtitle Language

 Shows the currently selected subtitle language. If subtitles are provided in other languages, you can switch to your preferred language.

Angle Number

 Shows the currently selected angle number. If the video is recorded with multiple angles, you can switch the angle.

Audio

• Shows the currently selected type of audio. You can select the desired type of audio.

Repeat

 The current Title (or Chapter) or partial segments can be repeatedly played back. Repeat Playback is also possible with the REPEAT button on the remote control.

□ NOTE

· These functions may not work with all discs.

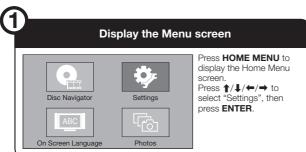


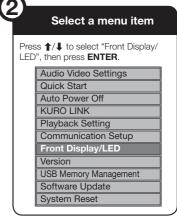
SETTINGS

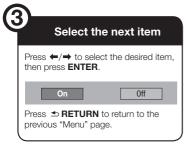
Common operations

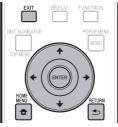
The "Menu" enables various audio/visual settings and adjustments on the functions using the remote control unit. You need to call up the OSD to perform settings for this player. The following is the explanation for the basic operations of the "Menu".

Example: Setting "Front Display/LED"











Basic Operation for Playback Setting

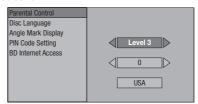
Example: Setting "Parental Control" under "Playback Setting"

- 1 Press HOME MENU to display the Home Menu screen
- 2 Press ↑/↓/←/→ to select "Settings", then press ENTER.
- 3 Press ↑/↓ to select "Playback Setting", then press ENTER.
- 4 Press ↑/↓ to select "Parental Control", then press ENTER.
 - When you operate this Player for the first time, the PIN code setting screen will be displayed. See "When setting the PIN code for the first time" below.
- 5 Press the number buttons (0 to 9) to enter your 4-digit PIN code.
 - You cannot move to the next setting screen until you can input the correct PIN code.



When setting the PIN code for the first time

- ① To set the PIN code for the first time, press ←/→ to select "Yes" to enter the PIN code setting menu, then press ENTER.
- ② Press the numbber buttons (0 to 9) to enter a 4-digit number for the PIN code, then the same 4-digit number for confirmation.
- ③ Press ENTER to complete the PIN code setting procedure and move to the next setting screen.
- 6 Press ←/→ to select the parental control level for DVD VIDEO, BD-ROM, and then select the country code. Press ENTER after making each selection.



7 Press HOME MENU or EXIT to exit.

Audio Video Settings

NOTE

Characters in **bold** type are the default settings at time of purchase.

TV Aspect Ratio

You can set the screen aspect ratio of the connected TV, and adjust the video output.

If you switch your TV (i.e. because you have bought a new one) and the screen aspect ratio of the connected TV changes, you will have to change the "TV Aspect Ratio" setting.

Item

Wide 16:9 : Select this when connecting to a TV with a

16:9 screen aspect ratio.

Normal 4:3 :Select this when connecting to a TV with a 4:3 screen aspect ratio.

<When selecting Normal 4:3>

Item

Letter Box: If you connect to a TV with a screen aspect

ratio of 4:3 and playback a DVD with 16:9 video, the video will be played back with black bands at the top and bottom while maintaining the 16:9 ratio.

Pan Scan : If you connect to a TV with a screen aspect ratio of 4:3 and playback a DVD with 16:9 video, the video will be played back with the left and right sides of the image cut off to display in 4:3 screen aspect ratio. (This function works if the disc is labelled for

Component Video Out

4:3PS.)

This sets the resolution of the component video output.

Some TV are not fully compatible with the Blu-ray disc player, which may cause the image distortion. In this case, press VIDEO OUTPUT RESET on the remote control for five seconds. "Component Video Out" will be reset to "576/480i" (factory preset value).

Item

1080i, 720p, 576/480p, **576/480i**

HDMI Video Out

This sets the resolution of the HDMI video output. Some TV are not fully compatible with the Blu-ray disc player, which may cause the image distortion. In this case, press VIDEO OUTPUT RESET on the remote control for five seconds. "HDMI Video Out" will be reset to "Auto" (factory preset value).

Auto, 1080p, 1080i, 720p, 576/480p

NOTE

 When the BD player is connected to a 1080p 24 Hz compatible TV and the "HDMI Video Out" is set to "Auto", 1080p 24 Hz will automatically be displayed when compatible discs are played back.

At 1080p 24 Hz/1080p 50 Hz/1080p 60 Hz, there is no output from the COMPONENT VIDEO OUTPUT jacks and VIDEO OUTPUT jack.

Video Out Select

Dual video output is possible simultaneously from the COMPONENT VIDEO OUTPUT lacks and the HDMI OUT terminal with the following settings. Select the video output which you want to have priority according to the following chart.

NOTE

• 1080p and KURO LINK are only available in HDMI.

Video Out Select	Dual Output	HDMI Video Out	Component Out Resolution in Dual Mode
	Yes*1	Auto	*1
НОМІ	No	1080p	No
	Yes	1080i	1080i
	Yes	720p	720p
	Yes	576/480p	576/480p
	*1 Depends on TV specifications and source signal. 1080p is not supported.		

HDMI Out Component **Dual Output** Resolution in Video Out **Dual Mode** Yes 1080i 1080i Component Yes 720p 720p

Yes 576/480p 576/480p Yes 576/480i 576/480i

Item

HDMI, Component

- When the priority video output is selected, video is output from the other video terminal with the resolution of the selected video output.
- There is no output from the COMPONENT VIDEO OUTPUT iacks and VIDEO OUTPUT jack when video is output at 1080p resolution and the priority video output is selected to "HDMI"
- If the video equipment connected to each of the terminals is not compatible with the resolution of the priority video output, abnormalities in images on the screen may appear.

Secondary Audio

This toggles the clicking sound on the menu and audio with secondary video in picture in picture mode for BD-Video.

· Select "Off" when enjoying the high quality sounds of BD-Video. (Bitstream can be selected with HDMI output.) Item

On*1, Off

- *1 When set to "On"
- Audio in 6.1ch or greater format will be output as 5.1ch audio.
- · "HDMI Output" is set on "PCM".

Audio Out

You can set the audio output when connecting to SURROUND equipment.

This sets the audio output connected to SURROUND equipment.

Item

HDMI Output:

Select this when you connect using

HDMI OUT terminal.

Digital Output:

Select this when you connect using DIGITAL OUT OPTICAL terminal. 2ch Audio Output: Select this when you do not use

SURROUND sound equipment.

- 2 You can set the audio output mode for each output terminal.
- (1) This sets the audio output mode for HDMI OUT terminal when selecting "HDMI Output".

NOTE

• When the secondary audio is set to "On", PCM is automatically selected as the audio output mode.

Item

Bitstream:

- Select this when connecting to HDMI equipment with a built-in decoder for DOLBY DIGITAL, etc.
- · Setting to Bitstream will output each audio signal by Bitstream.

PCM (Surround):

- · Select this when connecting to multi-channel HDMI equipment.
- · Setting to PCM (Surround) will output by LINEAR PCM by decoding audio signals recorded in each audio output mode such as DOLBY DIGITAL, DTS.
- This sets the audio output mode for DIGITAL OUT OPTICAL terminal when selecting "Digital Output".

Item 1

Bitstream:

- · Select this when connecting to SURROUND equipment with a built-in decoder for DOLBY DIGITAL, etc.
- · Setting to Bitstream will output each audio signal by Bitstream.

PCM:

- Select this when connecting to 2 channel stereo audio equipment.
- · Setting to PCM will output by converting each audio signal into PCM 2 channel audio signal.

NOTE

- See page 45 for information on output of next generation audio formats.
- MPEG Audio is only output as PCM (Stereo) 48 kHz.

Dynamic Range Control

This lets you adjust the range between the loudest and softest sounds (dynamic range) for playback at average volume. Use this when it is hard to hear dialog.

Item

Normal: The same audio output range is played as the original recorded audio output range.

Shift*: When Dolby Digital audio is played back, the dynamic range of the audio is adjusted so that the dialog portion can be heard easily. (If the audio sounds abnormal, set to "Normal".)

Auto: When you play back audio in the Dolby TrueHD format, the dynamic range is automatically adjusted.

Lower the audio volume before setting. If you do not do so, the speakers may emit a loud sound or excessive output may be applied to the speakers.

Quick Start

This turns the Quick Start function on and off. When the Quick Start function is on:

- . The startup time of the Player is reduced.
- · However, power consumption will increase to about 11 W. When the Quick Start function is off:
- The player will enter the low power consumption mode when in standby condition.

Item

Yes, No

NOTE

When "Quick Start" is set to "Yes", the Player requires some time to turn off.

Auto Power Off

This sets the Player so that power is automatically shut off if playback is stopped for about 10 minutes.

Item

Yes. No

KURO LINK

This sets the Player to be controlled from the Flat Screen TV via the HDMI cable.

Item Yes, No

NOTE

- For details, refer to "About KURO LINK function" on page
- · If "Component" is selected from the "Video Out Select" menu, KURO LINK is not available. Select "HDMI" if you want to use KURO LINK features.

Playback Setting

Parental Control

This lets you set the Parental Control depending on the disc content. The available Parental Control Levels are shown below.

The 4-digit PIN code number needs to be entered before the Parental Control Levels and the Country Code are set. The Parental Control Levels and the Country Code cannot be set if a PIN code has not been created or the PIN code is not entered.

Item (For DVD-VIDEO)

8 and **Off**: All DVD-video can be played. 1-7: Prohibits play of DVD-video with

corresponding ratings recorded on them.

Item (For BD-ROM)

No Limit: All BD-video can be played. 0-99 year(s): Prohibits play of BD-video with

corresponding ratings recorded on them.

Item (Country code)

Sets the country code. Refer to the Country Code List (page 45) because the ratings differ according to the country.

NOTE

 Refer to "Basic Operation for Playback Setting" on page 36 for details.

Disc Language (Disc Priority Language)

This lets you select the language for subtitles, audio and menus displayed on the screen.

Item (Subtitle)

Refer to the Language List. (Page 45)

Item (Audio)

Refer to the Language List. (Page 45)

Item (Menu)

Refer to the Language List and Language Code List. (Page 45)

Angle Mark Display

This lets you turn the Angle Mark Display on or off when BD/DVD video recorded with multiple angles is played back. (The Angle Mark is displayed in the lower right screen.)

Item

Yes, No

PIN Code Setting

This sets the PIN code for setting or changing the Parental Control Level.

Item

Yes: Enter the 4-digit number.

No

NOTE

- When you forget PIN code, you can reset the current PIN code using "System Reset" under "Settings". (See this page.)
- · You can also set the new PIN code if desired.

BD Internet Access

This allows you to set access restriction to BD-LIVE contents.

Item

Permit: Allow all BD-LIVE discs.

Limit: Allow only discs with owner certification.

Prohibit: Prohibit all BD-LIVE discs.

NOTE

- The available functions differ depending on the disc.
- Regarding playback method of BD-LIVE contents, etc., perform the operations in accordance with the instructions in the BD disc manual.
- To enjoy BD-LIVE functions, perform the broadband internet connection (page 18) and communication settings (pages 40–42).

Front Display/LED

If you feel that the indicators on the Player are too bright when watching movies, you can turn them off except for the STANDBY/ON indicator.

Item

On, Off

Version

When you select "Version", the system software version is displayed.

Please refer to our website for information regarding software updates.

IN Australia and New Zealand:

http://www.pioneer.com.au/

IN Hong Kong:

http://www.pioneerhongkong.com.hk/

IN Singapore:

http://www.pioneer.com.sg/firmwaredownload

System Reset

You can reset all settings to the factory presets.

Item

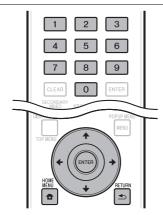
Reset. Not Reset

Communication Setup

This allows you to perform and/or change the communication setting. This setting is required to use BD-LIVE functions that connect to the internet.

NOTE

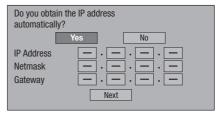
- Make sure that the LAN cable is connected to this Player. (See page 18.)
- For manually performing the setting, the following information of the connected router or modern is required.
 Confirm the information prior to the setting.
 IP address, netmask, gateway, DNS IP address
- Besides, if specifying a proxy server, the following information specified from your internet service provider is also required. Confirm the information prior to the setting.
 IP address and port number of the proxy server



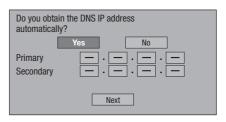
- Press HOME MENU to display the Home Menu screen.
- 2 Press ↑/↓/←/→ to select "Settings", then press ENTER.
- 3 Press ↑/↓ to select "Communication Setup", then press ENTER.
- 4 Press ←/→ to select "Change", then press ENTER.



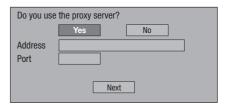
 For initializing the current setting, select "Initialize", then press ENTER. 5 For setting the IP address, press ←/→ to select "Yes" or "No", then press ENTER.



- If selecting "Yes": The IP address is automatically obtained.
- If selecting "No": The IP address, netmask and gateway are manually entered using the screen for inputting characters. (See page 42.)
 Regarding each of the setup values, confirm the specifications of your broadband router.
- 6 Select "Next", then press ENTER.
- 7 For setting the DNS IP address, press ←/→ to select "Yes" or "No", then press ENTER.



- If selecting "Yes": The DNS IP address is automatically obtained. (The DHCP server function of the router or modem is used for the automatic acquisition.)
- If selecting "No": The primary and secondary IP addresses are entered using the screen for inputting characters. (See page 42.)
 Regarding each of the setup values, confirm the specifications of your broadband router.
- 8 Select "Next", then press ENTER.
- 9 For setting the proxy server, press ←/→ to select "Yes" or "No", then press ENTER.



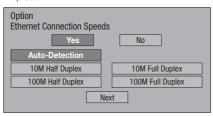
- If selecting "Yes": The IP address or proxy server name and port number for the proxy server specified from your internet service provider are entered using the screen for inputting characters. (See page 42.)
- If selecting "No": Go to the next step.

- 10 Select "Next", then press ENTER.
- 11 For the advanced setting (the setting of the Ethernet connection speeds), press ←/→ to select "Yes" or "No", then press ENTER.

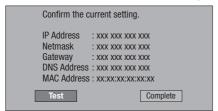
 Normally select "No", then press ENTER.

 - The Ethernet connection speeds can be set when you select "Yes", then press ENTER.
 - · As automatic detection is made (factory preset mode), this setting is not normally necessary. If a situation occurs in which the Ethernet connection fails, etc., change the setting and confirm if the Ethernet connection successfully works.

When the connection speed is set, select "Next", then press ENTER.



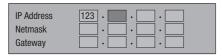
- 12 For testing the connection to the internet, after confirming the settings, press ←/→ to select "Test", then press ENTER.
 - . "Test" is available only when setting to obtain the IP address automatically. "Test" cannot be selected if the IP address has not been obtained automatically.



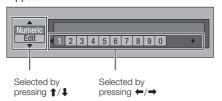
- · As a result of the test, if the internet connection fails, enter the setup values manually.
- **13** Press ←/→ to select "Complete", then press ENTER.

The operation procedure for inputting characters manually

NOTE



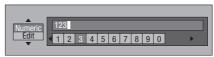
 Press ENTER at the boxes in which characters are to be entered, and the input screen will appear.



2 Press ↑/↓ to select the desired input mode.

- 3 Press the number buttons (0 to 9) or ←/→ to select a number/character, then press ENTER.
- 4 Repeat the step 3 to display all of the desired characters/numbers in the input field.

Example: The screen for inputting numeric characters



NOTE

- **5** Press **BLUE** (Complete) to fix the numbers which have been input.



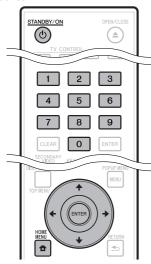
6 Repeat step 1 to 5 to finish inputting all the required characters.

Input character list

Numeric		12345678	90				
Edit	Cancel	Left	Righ		Complete	Del.Char.	
	* The same operation as the RED, GREEN, YELLOW, BLUE buttons and ♣ RETURN can be performed by selecting each of the items and pressing ENTER. "Del.Char." stands for deleting characters.						

USB Memory Management

The following instructions explain how to delete data downloaded from BD-LIVE and recorded on the USB memory device.



Before using the USB memory device

CAUTION:

- Do not remove the USB memory device or unplug the AC cord while the operations for "USB Memory Management" or "Software Update" are being performed.
- Do not use a USB extension cable when connecting a USB memory device to the BD STORAGE/SERVICE terminal of the player.
 - Using a USB extension cable may prevent the player from performing correctly.

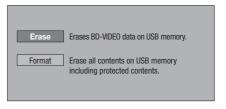
NOTE:

• Operation of USB memory devices is not guaranteed.

- 1 Insert the USB memory device into the BD STORAGE/SERVICE terminal on rear of this player.
- 2 Press HOME MENU to display the Home Menu screen.
- 3 Press ↑/↓/←/→ to select "Settings", then press ENTER.
- 4 Press ↑/↓ to select "USB Memory Management", then press ENTER.
 - "No USB Memory" appears when no USB memory is inserted
- 5 Press ↑/↓, select "Erase" or "Format", then press ENTER.

Erase: Deletes only BD-VIDEO data written on the USB memory device such as BD-LIVE data.

Format: Be aware that all data including BD-VIDEO data will be deleted.



NOTE

- Data which has been saved to the player's internal memory (game score, etc.) will also be deleted.
- 6 Press ←/→, select "Yes", and press ENTER.



- **7** Start the process.
 - The screen for the current operation will display.



8 Press ENTER

Software Update

This function allows software updates by inserting a USB memory device with the update file into the BD STORAGE/SERVICE terminal on this player. (To update software, use a USB memory device complying with USB specification 2.0.)

To check for the availability of a software update, visit below.

IN Australia and New Zealand:

http://www.pioneer.com.au/ IN Hong Kong:

http://www.pioneerhongkong.com.hk/ IN Singapore:

http://www.pioneer.com.sg/firmwaredownload

- Insert the USB memory device with the update file into the BD STORAGE/SERVICE terminal on rear of this player.
- 2 Press HOME MENU to display the Home Menu screen.
- 3 Press ↑/↓/←/→ to select "Settings", then press ENTER.
- 4 Press ↑/↓ to select "Software Update", then ENTER.
 - $\bullet\,$ If you have not yet set the PIN code, go to step 6.
- **5** Enter the 4-digit number using 0-9.



6 Press ENTER to start checking data in the USB memory device.



- · The screen message appears during data checking.
- The current version of this unit software and the version of the update file on the USB memory device are displayed. To update this player software with update file, select "Yes", and press ENTER.

Software update file is detected in the USB memory device.
Start update?

Current Ver.: **1234567
Update Ver.: **2345678

Yes No

 If the USB memory device is not properly installed or the correct update file cannot be found on the USB memory device, an error message is displayed. Check the file on the USB memory device, and then reinsert the USB memory device correctly.

Software update file is not detected in the USB memory device.

Confirm that you have transferred the file to the USB memory device and retry software update.

Confirm that you have inserted the USB memory device into the correct device.

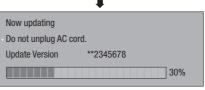
There is more than one software file in the USB memory device.

Confirm that only the software update file is in the USB memory device.

- 7 Press ENTER to start updating.
 - The screen becomes dark for a while until the update screen can be displayed. Please wait for the update screen to appear. Do not unplug the AC cord.

The picture will temporarily go dark until the software update display appears.

Wait several minutes and do not unplug the AC cord.



- 8 When the software is successfully updated, a screen is displayed indicating that the update process is completed.
 - If the update has failed, check the file in the USB device and try Software Update again.
- 9 Press & STANDBY/ON to turn off the player.
- 10 Remove the USB memory device.

NOTE

- When updating software, remove any disc loaded in the disc tray.
- The USB memory device used for updating the software should contain no files other than those necessary for the software update.
- The USB memory device should contain only a single version (the most recent) of the update software.

Country Code List

USA / CANADA / JAPAN / GERMANY / FRANCE / UK / ITALY / SPAIN / SWISS / SWEDEN / HOLLAND / NORWAY / DENMARK / FINLAND / BELGIUM / HONG KONG / SINGAPORE / THAILAND / MALAYSIA / INDONESIA / TAIWAN / PHILIPPINE / AUSTRALIA / RUSSIA / CHINA

Language List

English / Français / Deutsch / Italiano / Español / Japanese / Svenska / Nederlands

Language Code List

AA Afar / AB Abkhazian / AF Afrikaans / AM Ameharic / AR Arabic / AS Assamese / AY Aymara / AZ Azerbaijani / BA Bashkir / BE Byelorussian / BG Bulgarian / BH Bihari / BI Bislama / BN Bengali, Bangla / BO Tibetan / BR Breton / CA Catalan / CO Corsican / CS Czech / CY Welsh / DA Danish / DE German / DZ Bhutani / EL Greek / EN English / EO Esperanto / ES Spanish / ET Estonian / EU Basque / FA Persian / FI Finnish / FJ Fiji / FO Faroese / FR French / FY Frisian / GA Irish / GD Scots Gaelic / GL Galician / GN Guarani / GU Gujarati / HA Hausa / HI Hindi / HR Croatian / HU Hungarian / HY Armenian / IA Interlingua / IE Interlingua / IK Inupiak / IN Indonesian / IS Icelandic/ IT Italian / IW Hebrew / JA Japanese / JI Yiddish / JW Javanese / KA Georgian / KK Kazakh / KL Greenlandic / KM Cambodian / KN Kannada / KO Korean / KS Kashmiri / KU Kurdish / KY Kirghiz / LA Latin / LN Lingala / LO Laothian / LT Lithuanian / LV Latvian, Lettish / MG Malagasy / MI Maori / MK Macedonian / ML Malayalam / MN Mongolian / MO Moldavian / MR Marathi / MS Malay / MT Maltese / MY Burmese / NA Nauru / NE Nepali / NL Dutch / NO Norwegian / OC Occitan / OM Afan (Oromo) / OR Oriya / PA Panjabi / PL Polish / PS Pashto, Pushto / PT Portuguese/ QU Quechua / RM Rhaeto-Romance / RN Kirundi / RO Romanian / RU Russian / RW Kinyarwanda / SA Sanskrit / SD Sindhi / SG Sangho / SH Serbo-Croatian / SI Singhalese / SK Slovak / SL Slovenian / SM Samoan / SN Shona / SO Somali / SQ Albanian / SR Serbian / SS Siswat / ST Sesotho / SU Sundanese / SV Swedish / SW Swahili / TA Tamil / TE Telugu / TG Tajik / TH Thai / TI Tigrinya / TK Turkmen / TL Tagalog / TN Setswana / TO Tonga / TR Turkish / TS Tsonga / TT Tatar / TW Twi / UK Ukrainian / UR Urdu / UZ Uzbek / VI Vietnamese / VO Volapük / WO Wolof / XH Xhosa / YO Yoruba / ZH Chinese / ZU Zulu

About Output of Next Generation Audio Formats

Next generation	Maximum number of	HD	MI	DIGITAL OUT	
audio formats	channels	PCM	Bitstream	РСМ	Bitstream
Dolby TrueHD	7.1ch (48 kHz/96 kHz)	7.1ch *3	7.1ch *4	2ch *2	5.1ch *1/*3
	5.1ch (192 kHz)	5.1ch *3	5.1ch *4	2ch *2	5.1ch *1/*3
Dolby Digital PLUS	7.1ch (48 kHz)	7.1ch *3	7.1ch *4	2ch *2	5.1ch *1/*3
DTS-HD Master Audio	7.1ch (48 kHz/96 kHz)	7.1ch *3	7.1ch *4	2ch *2	5.1ch *1/*3
	5.1ch (192 kHz)	5.1ch *3/*5	5.1ch *4	2ch *2	5.1ch *1/*3
DTS-HD High Resolution Audio	7.1ch (48 kHz/96 kHz)	7.1ch *3	7.1ch *4	2ch *2	5.1ch *1/*3
LPCM	7.1ch (48 kHz/96 kHz)	7.1ch *3	_	2ch *2	_
	5.1ch (192 kHz)	5.1ch *3	_	2ch *2	_

^{*1} Core only

^{*2} Down mixed

 $^{^{\}star3}$ When "Secondary Audio" is set to "On", the audio is output as 48 kHz.

^{*4} When "Secondary Audio" is set to "On", the audio is output as PCM.

^{*5} When 5.1ch (192 kHz), the audio output is downsampled to 96 kHz. When 2ch. the audio is output as 192 kHz.

Troubleshooting

The following problems do not always suggest a defect or malfunction of this Player. Refer to the problems and lists of possible solutions below before calling for service.

Power

Problem	Possible causes and solutions		
The Player power cannot be turned on.	Is the power cord firmly plugged into the AC outlet? (Page 19) When the power cord is plugged into an AC outlet, press and hold ♂ STANDBY/ ON on the Player until "□ ⊆ ⊆ E" appears on the front panel display. Then, after the STANDBY/ON indicator is lit, turn on the power. (Page 48) Press ♂ STANDBY/ON after the STANDBY/ON indicator turns on. (Page 20)		
The Player power is turned on automatically.	When "Settings" – "KURO LINK" is set to "Yes" on the player, the player's power may turn on when the connected TV is operated. (Page 38)		
The Player power is turned off automatically.	Is "Auto Power Off" set to "Yes"? When "Auto Power Off" is set to "Yes", the power will be automatically turned off after 10 continuous minutes of inactivity (no playback). (Page 38) When "Settings" – "KURO LINK" is set to "Yes" on the player, the player's power may turn off when the power of the connected TV is turned off. (Page 38)		

Basic Operation

Problem	Possible causes and solutions
The remote control does not work.	Use the remote control within its operating range. (Page 19) Replace the batteries. (Page 19)
Cannot operate the Player.	Are you operating the Player within the specified operating temperature range? (Page 52)

Disc Playback

Problem	Possible causes and solutions
The Player cannot play a disc.	Take out the disc and clean it. (Page 9) Make sure that the disc is loaded properly (aligned in disc tray and label-side up). (Page 24) Make sure that region code on the disc matches that of this Player. (Page 6) Allow any condensation in or near the Player to dry. (Page 9) Check that the disc is recorded in the compatible TV system (PAL or NTSC). The Player cannot play back video which was not recorded normally. (Page 6) Proper playback may be impossible due to the state of the disc recording, a scratched, warped or dirty disc, the state of the pick-up, or compatibility issues between this Player and the disc being used. (Pages 6, 9) When the recorded time of a disc is unusually short, playback may not be possible. BD-RE/-R discs recorded in a format other than BDMV/AVCHD cannot be played back. (Page 6)
The disc is automatically ejected after closing the disc tray.	Make sure that the disc is loaded properly (aligned in disc tray and label-side up). (Page 24) Take out the disc and clean it. (Page 9) Make sure that region code on the disc matches that of this Player. (Page 6) Make sure that the disc is playable. (Page 6)
Video stops.	Has the Player been subjected to shock or impact? Are you using it in an unstable location? The Player will stop if it senses shock or vibration.
The Player makes a snapping sound when starting playback or loading a disc.	The player may sometimes make a snapping sound when starting playback if it has not been operated in a while. These sounds are not malfunctions of the player but are normal operating conditions.

Troubleshooting

Picture

Problem	Possible causes and solutions
No picture.	Make sure that the cables are connected correctly. (Pages 14–16) Make sure that the connected TV or the AV receiver is set to the correct input. (Pages 14–16) Take out the disc and clean it. (Page 9) Make sure that region code on the disc matches that of this Player. (Page 6) There is no picture from the HDMI output. Are the settings performed correctly? Please check the settings. (Page 37) There is no picture from the component video output. Are the settings performed correctly? Please check the settings. (Page 37)
Screen freezes and operation buttons do not work.	 Press STOP, then restart playback. Turn off the power and turn on the power again. If the power is not turned off, perform a reset. (Page 48) Is the disc damaged or dirty? Check the condition of the disc. (Page 9)
There is just audio with no video.	Is the connection cable for video output connected properly? (Pages 14–16)
Widescreen video appears vertically stretched, or black bands appear at the top and bottom of the screen.	Is "TV Aspect Ratio" set to match the connected TV? (Page 37) If you are using a widescreen TV, is the "TV Aspect Ratio" set to "Wide"? (Page 37)
Square noise (mosaic) appears on the screen.	Blocks in images may be visible in scenes with rapid movement due to the characteristics of digital image compression technology.
The playback screen will be disturbed if DVD video is recorded to a VCR, or played back through a VCR.	This Player complies with analog copy protection. Some discs contain a copy prohibiting signal. If you try to play back such discs through a VCR, or record to a VCR and play back the signal, the copy protection will prevent normal playback. (Pages 15–16)
Audio is not output, or images are not played back properly.	The audio may not be output or the images may not be played back properly for some discs in which copyright-protected contents are recorded.

Sound

Problem	Possible causes and solutions
No sound, or sound is distorted.	If the volume of the TV or amplifier is set to minimum, turn the volume up. There is no sound during still mode, slow motion playback, fast forward and fast reverse. (Page 30) DVD audio recorded in DTS is only output from the DIGITAL OUT OPTICAL terminal. Connect a DTS compatible digital amplifier or decoder to the DIGITAL OUT OPTICAL terminal on this Player. (Page 17) Check that the audio cable is connected correctly. (Page 17) Check that the cable plugs are clean. Take out the disc and clean it. (Page 9) Audio may not be output depending on the audio recording status, such as when audio other than an audio signal or non-standard audio is recorded for the audio content of the disc. (Page 6)
Left and right channels of audio are reversed, or sound comes out of only one side.	Are left and right audio cables connected to the opposite terminal, or is one side disconnected? (Page 17)
Audio is not output, or images are not played back properly.	The audio may not be output or the images may not be played back properly for some discs in which copyright-protected contents are recorded.

Network

Problem	Possible causes and solutions
Cannot connect to the Internet.	Is the LAN cable connected properly? Is the wrong cable such as a modular cable used? Connect a LAN cable to the LAN terminal. (Page 18) Is the power for the connected equipment, such as broadband router or modern turned on? Is the broadband router and/or modern properly connected? Is the proper value(s) set in the network setting? Check "Communication Setup". (Pages 40–42)

Troubleshooting

Network (Continued)

Problem	Possible causes and solutions
Cannot download BD-LIVE contents.	Is the LAN cable connected properly? (Page 18) Is the USB memory device properly connected? Check that the USB memory device is connected to the BD STORAGE/SERVICE terminal of this Player. (Page 18) Check if the BD disc supports BD-LIVE. Check the setting for "BD Internet Access". (Page 39)

KURO LINK

Problem	Possible causes and solutions
KURO LINK function does not work.	Connect the HDMI cable properly. (Page 14) Use High Speed HDMI™ cables when using the KURO LINK function. The KURO LINK function may not operate properly if other HDMI cables are used. Set "Settings" – "KURO LINK" on the player to "Yes". (Page 38) The KURO LINK function does not work with devices of other brands, even if connected using an HDMI cable. The KURO LINK function will not work if devices that do not support the KURO LINK function or devices of other brands are connected between the KURO LINK function or devices of other brands are connected between the KURO LINK-compatible device and the player. It may also not work with certain Flat Screen TVs. Set KURO LINK to On on the connected device. The KURO LINK function works when KURO LINK is set to On for all devices connected by HDMI cable. Once connections and the settings of all the devices are finished, be sure to check that the player's picture is output to the Flat Screen TV. (Also check after changing the connected devices and reconnecting HDMI cables.) The KURO LINK function may not operate properly if the player's picture is not properly output to the Flat Screen TV. The KURO LINK function may not work if three or more players, including this player, are connected. Also refer to the operating instructions of the connected device.
KURO LINK indicator does not light.	Connect to a KURO LINK-compatible Pioneer Flat Screen TV using an HDMI cable. Set KURO LINK to On on the Flat Screen TV. Set "Settings" – "KURO LINK" on the player to "Yes". (Page 38) Check that the player's picture is being output to the Flat Screen TV.

Other

Problem	Possible causes and solutions
The TV operates incorrectly.	Some TVs with wireless remote control capability may operate incorrectly when using the remote control of this Player. Use such TVs away from this Player.
The Player heats up during use.	When using this Player, the console cabinet may heat up depending on the usage environment. This is not a malfunction.
Input of connected TV and AV system switches automatically.	When "Settings" – "KURO LINK" is set to "Yes" on the player, the input on the connected TV and AV system (AV receiver or amplifier, etc.) may switch automatically. (Page 38)
STANDBY/ON indicator will remain lit.	When the AC cord is removed from the outlet, the STANDBY/ON indicator will remain lit for a short period. This is normal and is not a malfunction.
The display panel shows " H _ I _ I _ ", and operations are disabled.	KEY LOCK is in effect. Depress the remote control unit's KEY LOCK button for five seconds or more to cancel the KEY LOCK function.

To Reset this Player

- If this Player receives strong interference from a source such as excessive static electricity, strong external noise, malfunction of power supply, or voltage caused by lightning during use or a wrong operation is sent to the Player, errors like the Player not accepting an operation may occur. Press and hold & STANDBY/ON on the Player until "RESEE" appears on the front panel display when the Player does not operate properly even after the power has been turned off. Then, after the STANDBY/ON indicator is lit, turn on the power.
- When a reset is performed while the power is on, the Player will turn off. Turn the power on again. At this point, it may take
 a few moments for the system processing to finish before the Player is ready for use. During the system processing, the
 BD/DVD/CD disc indicator on the front panel display of the Player will blink. Once the system processing has finished, the
 indicators will finish blinking and then light up normally. You can operate the Player when the BD/DVD/CD disc indicator is lit.
- Since all settings including the language setting stored in memory are also reset when a reset has been performed, they must be set again.
- When the problem persists even after performing a reset, unplug the AC cord and plug it in again. If this does not solve the
 problem, contact the nearest service center approved by Pioneer.

On-screen Error Messages

Messages Relating to BD disc and DVD disc

The following messages appear on the TV screen in case the disc you tried to playback is not appropriate or the
operation is not correct.

Error message	Possible Error	Suggested Solution
Cannot play.	The disc cannot be played back with this Player.	Check the disc, and load it correctly.
Incompatible disc.	If you load a disc which cannot be played with this Player (i.e. a scratched disc), or if you load a disc upside down, this message will appear, and the disc tray will automatically pop out.	
	Occurs if the loaded disc cannot be played because it is a non-standard disc or scratched, etc.	Remove the disc.
Cannot operate.	Occurs if an operation is incorrect.	
This USB memory is not formatted properly. Please format the memory in USB memory management.	Occurs if there is a formatting error.	Format the USB memory again.
The Connected USB Memory cannot be used. It should be compliant with USB 2.0.	Occurs if USB memory not compliant with USB 2.0 High Speed (480Mbit/s) is used (i.e. USB 1.0/USB 1.1).	Connect USB 2.0 High Speed (480Mbit/s) compliant USB memory.

Glossary

AVCHD (Advanced Video Codec High Definition)

The AVCHD is a high definition (HD) digital video camera recorder format recording high-definition onto certain media by using highly efficient codec technologies.

BDAV (Page 6)

BDAV (Blu-ray Disc Audio/Visual, BD-AV) refers to one of the application formats used for writable Blu-ray discs such as BD-R, BD-RE, etc. BDAV is a recording format equivalent to DVD-VR (VR mode) of the DVD specifications.

BD-J application

The BD-ROM format supports Java for interactive functions. "BD-J" offers content providers almost unlimited functionality when creating interactive BD-ROM titles.

BD-LIVE (page 26)

A variety of interactive content is available from BD-LIVE compatible Blu-ray discs via the internet.

BDMV (page 6)

BDMV (Blu-ray Disc Movie, BD-MV) refers to one of the application formats used for BD-ROM which is one of the Blu-ray Disc specifications. BDMV is a recording format equivalent to DVD-video of the DVD specification.

BD-R (pages 6, 24)

A BD-R (Blu-ray Disc Recordable) is a recordable, write-once Blu-ray Disc. Since contents can be recorded and cannot be overwritten, a BD-R can be used to archive data or for storing and distributing video material.

BD-RE (pages 6, 24)

A BD-RE (Blu-ray Disc Rewritable) is a recordable and rewritable Blu-ray Disc.

BD-ROM

BD-ROMs (Blu-ray Disc Read-Only Memory) are commercially produced discs. Other than conventional movie and video contents, these discs have enhanced features such as interactive content, menu operations using pop-up menus, selection of subtitle display, and slide shows. Although a BD-ROM may contain any form of data, most BD-ROM discs will contain movies in High Definition format for playback on Blu-ray Disc players.

Blu-ray Disc (BD) (page 6)

A disc format developed for recording/playing high-definition (HD) video (for HDTV, etc.), and for storing large amounts of data. A single layer Blu-ray Disc holds up to 25 GB, and a dual-layer Blu-ray Disc holds up to 50 GB of data.

Chapter number (pages 34, 35)

Sections of a movie or a music feature that are smaller than titles. A title is composed of several chapters. Some discs may only be comprised of a single chapter.

Copy guard

This function prevents copying. You cannot copy discs marked by the copyright holder with a signal which prevents copying.

Disc menu (page 25)

This lets you select things like the subtitle language or audio format using a menu stored on the DVD video disc.

Dolby Digital

A sound system developed by Dolby Laboratories Inc. that gives movie theater ambience to audio output when the product is connected to a Dolby Digital processor or amplifier.

Dolby Digital Plus

A sound system developed as an extension to Dolby Digital. This audio coding technology supports 7.1 multi-channel surround sound.

Dolby TrueHD

Dolby TrueHD is a lossless coding technology that supports up to 8 channels of multi-channel surround sound for the next generation optical discs. The reproduced sound is true to the original source bit-for-bit.

DTS

This is a digital sound system developed by DTS, Inc. for use in cinemas.

DTS-HD High Resolution Audio

DTS-HD High Resolution Audio is a new technology developed for the next generation high definition optical disc format.

DTS-HD Master Audio

DTS-HD Master Audio is a lossless audio compression technology developed for the next generation high definition optical disc format.

DTS-HD Master Audio | Essential

DTS-HD Master Audio | Essential is a lossless audio compression technology developed for the next generation high definition optical disc format.

DVD upscaling (page 24)

Upscaling (upconverting) refers to a function of various players and devices that enlarge the image size to fit the size of the screen of video equipments such as a TV.

DVD video (pages 6, 24)

A disc format that contains up to eight hours of moving pictures on a disc the same diameter as a CD. A single-layer single sided DVD holds up to 4.7 GB; a double layer single-sided DVD, 8.5 GB; a single layer double-sided DVD, 9.4 GB; double-layer double-sided DVD, 17 GB. The MPEG 2 format was adopted for efficient video data compression. It is a variable rate technology that encodes the data to according to the status of the video for reproducing high-quality images. Audio information is recorded in a multi-channel format such as Dolby Digital, allowing for a realistic audio presence.

DVD+/-R (pages 6, 24)

A DVD+/-R is a recordable, write-once DVD. Since contents can be recorded and cannot be overwritten, a DVD+/-R can be used to archive data or for storing and distributing video material. The DVD+/-R has two different formats: VR format and Video format. DVDs created in Video format have the same format as a DVD video, while discs created in VR (Video Recording) format allow the contents to be programed or edited.

DVD+/-RW (pages 6, 24)

A DVD+/-RW is a recordable and rewritable DVD. The rerecordable feature makes editing possible. The DVD+/-RW has two different formats: VR format and Video format. DVDs created in Video format have the same format as a DVD video, while discs created in VR (Video Recording) format allow the contents to be programed or edited.

Glossary

HDMI (page 14)

HDMI (High-Definition Multimedia Interface) is an interface that supports both video and audio on a single digital connection. The HDMI connection carries standard to high definition video signals and multi-channel audio signals to AV components such as HDMI equipped TVs, in digital form without degradation.

Interlace format

Interlace format shows every other line of an image as a single "field" and is the standard method for displaying images on television. The even numbered field shows the even numbered lines of an image, and the odd numbered field shows the odd numbered lines of an image.

JPEG (pages 6, 7, 33)

JPEG (Joint Photographic Experts Group) is a still image data compression format and is used in most of digital cameras.

Letter Box (LB 4:3) (page 37)

A screen size with black bars on the top and bottom of the image to allow viewing of wide-screen (16:9) material on a connected 4:3 TV.

Linear PCM Sound

Linear PCM is a signal recording format used for Audio CDs and on some DVD and Blu-ray discs. The sound on Audio CDs is recorded at 44.1 kHz with 16 bits. (Sound is recorded between 48 kHz with 16 bits and 96 kHz with 24 bits on DVD video discs and between 48 kHz with 16 bits and 192 kHz with 24 bits on BD video discs.)

MPEG-2

MPEG-2 (Moving Picture Experts Group phase 2) is one of the video data compression schemes, which is adopted for DVD videos and digital broadcasts worldwide. Some Blu-ray Discs also use high bitrate MPEG-2.

Multi Angle (pages 32, 34, 35)

This is a feature of DVD and BD video discs. In some discs, the same scene is shot from different angles, and these are stored in a single disc so you can enjoy playback from each angle. (This function can be enjoyed if the disc is recorded with multiple angles.)

Multi Audio

This is a feature of DVD and BD video discs. This function makes it possible to record different audio tracks for the same video, so you can enhance your enjoyment by switching the audio. (You can enjoy this function with discs recorded with multiple audio tracks.)

Pan Scan (PS 4:3) (page 37)

A screen size that cuts off the sides of the image to allow viewing of wide-screen (16:9) material on a connected 4:3 TV.

Parental control (page 39)

In some digital broadcasts and BD/DVD video discs, a control level for disc viewing is set depending on the age of the viewer. With this Player, you can set the control level for viewing such broadcasts and discs.

Pop-up menu (page 25)

An enhanced menu operation available on BD video discs. The pop-up menu appears when **POPUP MENU/MENU** is pressed during playback, and can be operated while playback is in progress.

Progressive format

Compared to the Interlace format that alternately shows every other line of an image (field) to create one frame, the Progressive format shows the entire image at once as a single frame. This means that while the Interlace format can show 30 frames/60 fields in one second, the Progressive format can show 60 frames in one second. The overall picture quality increases and still images, text, and horizontal lines appear sharper.

Region code (page 6)

Code identifying a geographic region of compatibility for a BD/DVD.

Resume playback (pages 24, 29)

If you stop playback while it is in progress, the Player stores the stop position in memory, and this function lets you playback from that point.

Skip (page 30)

This returns to the start of the chapter (or track) being played, or skips to the next chapter (or track).

Subtitles (pages 31, 34, 35)

These are the lines of text appearing at the bottom of the screen which translate or transcribe the dialog. They are recorded on many DVD and BD video discs.

Time number

This indicates the play time which has elapsed from the start of a disc or a title. It can be used to find a specific scene quickly. (It may not work with some discs.)

Title number (pages 34, 35)

These numbers are recorded on DVD and Blu-ray discs. When a disc contains two or more movies, these movies are numbered as title 1. title 2. etc.

Top menu (page 25)

In a BD/DVD video, this is the menu for selecting things like the chapter to be played back and the subtitle language. In some DVD videos, the top menu may be called the "Title Menu".

Track number (pages 34, 35)

These numbers are assigned to the tracks which are recorded on audio CDs. They enable specific tracks to be located quickly.

x.v.Color

x.v.Color reproduces a greater range of color than before, showing almost all of the colors that the human eye can detect. (Applicable for JPEG files only with this system)

Specifications

General

Power supply	AC 100-240 V, 50/60 Hz
Power consumption (Normal)	20 W Power is automatically shut off if playback is stopped for about 10 minutes. (When "Auto Power Off" is set to "Yes")
Power consumption (Standby)	0.6 W (When "Quick Start" is set to "No") 11 W (When "Quick Start" is set to "Yes")
Dimensions	420 mm \times 58 mm \times 268 mm (W \times H \times D)
Weight	2.7 kg
Operating temperature	5 °C to 35 °C
Storage temperature	−20 °C to 55 °C
Operating humidity	10 % to 80 % (no condensation)
TV systems	PAL system/NTSC system (The system recorded on the disc is output.)

Playback

Playable discs	BD-ROM, BD-RE Dual Layer, BD-R Dual Layer, DVD Video, DVD+RW/+R/-RW/-R Dual Layer (Video/VR/AVCHD format), Audio CD (CD-DA), CD-RW/-R (CD-DA, JPEG file format)
Region code	Australia and New Zealand models: B or ALL for BD, 4 or ALL for DVD Others: A or All for BD, 3 or ALL for DVD

Input/Output

HDMI OUT	HDMI 19-pin standard connector (1080 p 24 Hz output) HDMI™ (V.1.3 with Deep Color, x.v.Color™, Dolby TrueHD, DTS-HD Master Audio)
COMPONENT VIDEO OUTPUT	Output level: Y: 1 Vp-p (75 ohms) P _B , P _R : 0.7 Vp-p (75 ohms) Jacks: RCA jack
VIDEO OUTPUT	Output level: 1 Vp-p (75 ohms) Jack: RCA-pin jack
DIGITAL OUT OPTICAL	Terminal: Square Optical terminal
AUDIO OUTPUT	Output level: 2 V rms (Output impedance: 1 k ohms) Jacks: RCA jack
BD STORAGE/SERVICE	USB 2.0 High Speed (480 Mbit/s) correspondence (for Local storage/Software update)
LAN	10BASE-T/100BASE-TX

Specifications are subject to change without notice.

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