

Blu-ray Disc™ / DVD Player

Operating Instructions

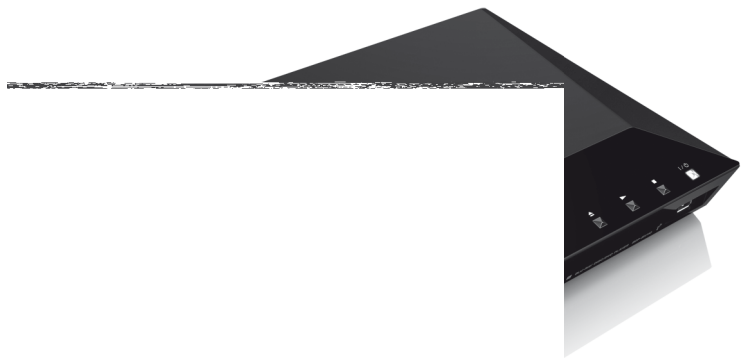
Thank you for your purchase. Before using this player, please read these instruction carefully.

Getting Started

Playback

Settings and Adjustments

Additional Information



WARNING

To reduce the risk of fire or electric shock, do not expose this appliance to dripping or splashing, and do not place objects filled with liquids, such as vases, on the appliance.

To avoid electrical shock, do not open the cabinet. Refer servicing to qualified personnel only.

The mains lead must be changed only at a qualified service shop.

Do not expose batteries or appliances with battery-installed to excessive heat, such as sunshine and fire.

CAUTION

The use of optical instruments with this product will increase eye hazard. As the laser beam used in this Blu-ray Disc/DVD player is harmful to eyes, do not attempt to disassemble the cabinet. Refer servicing to qualified personnel only.



This label is located on the laser protective housing inside the enclosure.

For customers in European countries



This appliance is classified as a CLASS 1 LASER product. The CLASS 1 LASER PRODUCT MARKING is located on the rear exterior.

Notice for customers in the United Kingdom and Republic of Ireland

A molded plug complying with BS1363 is fitted to this equipment for your safety and convenience.

Should the fuse in the plug supplied need to be replaced, a fuse of the same rating as the supplied one and approved by ASTA or BSI to BS1362, (i.e., marked with  or  mark) must be used. If the plug supplied with this equipment has a detachable fuse cover, be sure to attach the fuse cover after you change the fuse. Never use the plug without the fuse cover. If you should lose the fuse cover, please contact your nearest Sony service station.



Disposal of Old Electrical & Electronic Equipment (Applicable in the European Union and other European countries with separate collection systems)

This symbol on the product or on its packaging indicates that this product shall not be treated as household waste. Instead it shall be handed over to the applicable collection point for the recycling of electrical and electronic equipment. By ensuring this product is disposed of correctly, you will help prevent potential negative consequences for the environment and human health, which could otherwise be caused by inappropriate waste handling of this product. The recycling of materials will help to conserve natural resources. For more detailed information about recycling of this product, please contact your local Civic Office, your household waste disposal service or the shop where you purchased the product.

For customers in Australia/New Zealand

The above symbol is applicable in the European Union and other European countries with separate collection systems.



Pb

Disposal of waste batteries (applicable in the European Union and other European countries with separate collection systems)

This symbol on the battery or on the packaging indicates that the battery provided with this product shall not be treated as household waste. On certain batteries this symbol might be used in combination with a chemical symbol. The chemical symbols for mercury (Hg) or lead (Pb) are added if the battery contains more than 0.0005% mercury or 0.004% lead.

By ensuring these batteries are disposed of correctly, you will help prevent potentially negative consequences for the environment and human health which could otherwise be caused by inappropriate waste handling of the battery. The recycling of the materials will help to conserve natural resources.

In case of products that for safety, performance or data integrity reasons require a permanent connection with an incorporated battery, this battery should be replaced by qualified service staff only.

To ensure that the battery will be treated properly, hand over the product at end-of-life to the applicable collection point for the recycling of electrical and electronic equipment.

For all other batteries, please view the section on how to remove the battery from the product safely. Hand the battery over to the applicable collection point for the recycling of waste batteries.

For more detailed information about recycling of this product or battery, please contact your local Civic Office, your household waste disposal service or the shop where you purchased the product.

For customers in European countries

This product has been manufactured by or on behalf of Sony Corporation, 1-7-1 Konan Minato-ku Tokyo, 108-0075 Japan. Inquiries related to product compliance based on European Union legislation shall be addressed to the authorized representative, Sony Deutschland GmbH, Hedelfinger Strasse 61, 70327 Stuttgart, Germany. For any service or guarantee matters, please refer to the addresses provided in the separate service or guarantee documents.

Precautions

- This unit operates on 220 V - 240 V AC, 50/60 Hz. Check that the unit's operating voltage is identical with your local power supply.
- Install this unit so that the mains lead can be unplugged from the wall socket immediately in the event of trouble.

Precautions

This equipment has been tested and found to comply with the limits set out in the EMC Directive using a connection cable shorter than 3 metres.

On placement

- Place the player in a location with adequate ventilation to prevent heat build-up in the player.
- To reduce the risk of fire, do not cover the ventilation opening of the appliance with newspapers, tablecloths, curtains, etc.
- Do not expose the appliance to naked flame sources (for example, lighted candles).
- Do not install this player in a confined space, such as a bookshelf or similar unit.
- Do not place the player outdoors, in vehicles, on ships, or on other vessels.
- If the player is brought directly from a cold to a warm location, or is placed in a very damp room, moisture may condense on the lenses inside the player. Should this occur, the player may not operate properly. In this case, remove the disc and leave the player turned on for about half an hour until the moisture evaporates.
- Do not install the player in an inclined position. It is designed to be operated in a horizontal position only.
- Do not place heavy or unstable objects on the player.
- Do not place any objects other than discs on the disc tray. Doing so may cause damage to the player or the object.

- Take out any discs from the tray when you move the player. If you don't, the disc may be damaged.
- Disconnect the AC power cord (mains lead) and all other cables from the player when you move the player.

On power sources

- The player is not disconnected from the AC power source (mains) as long as it is connected to the wall outlet, even if the player itself has been turned off.
- Disconnect the player from the wall outlet if you are not going to use the player for a long time. To disconnect the AC power cord (mains lead), grasp the plug itself; never pull the cord.
- Observe following points to prevent the AC power cord (mains lead) being damaged. Do not use the AC power cord (mains lead) if it is damaged, as doing so may result in an electric shock or fire.
 - Do not pinch the AC power cord (mains lead) between the player and wall, shelf, etc.
 - Do not put anything heavy on the AC power cord (mains lead) or pull on the AC power cord (mains lead) itself.

On adjusting volume

Do not turn up the volume while listening to a section with very low level inputs or no audio signals. Your ears and the speakers may be damaged when the sound level reaches the peak.

On cleaning

Clean the cabinet, panel, and controls with a soft cloth. Do not use any type of abrasive pad, scouring powder or solvent such as alcohol or benzene.

On cleaning discs, disc/lens cleaners

Do not use cleaning discs or disc/lens cleaners (including wet or spray types). These may cause the apparatus to malfunction.

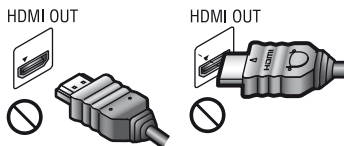
On replacement of parts

In the events that this player is repaired, repaired parts may be collected for reuse or recycling purposes.

On connecting to the HDMI OUT jack

Observe the following as improper handling may damage the HDMI OUT jack and the connector.

- Carefully align the HDMI OUT jack on the rear of the player and the HDMI connector by checking their shapes. Make sure the connector is not upside down or tilted.



- Be sure to disconnect the HDMI cable when moving the player.



- Hold the HDMI connector straight when connecting or disconnecting the HDMI cable. Do not twist or force the HDMI connector into the HDMI OUT jack.

IMPORTANT NOTICE

Caution: This player is capable of holding a still video image or on-screen display image on your television screen indefinitely. If you leave the still video image or on-screen display image displayed on your TV for an extended period of time you risk permanent damage to your television screen. Plasma display panel televisions and projection televisions are susceptible to this.

If you have any questions or problems concerning your player, please consult your nearest Sony dealer.

Copy Protection

Please be advised of the advanced content protection systems used in both Blu-ray Disc™ and DVD media. These systems, called AACs (Advanced Access Content System) and CSS (Content Scramble System), may contain some restrictions on playback, analogue output, and other similar features. The operation of this product and the restrictions placed may vary depending on the date of purchase, as the governing board of the AACs may adopt or change its restriction rules after the time of purchase.

Cinavia Notice

This product uses Cinavia technology to limit the use of unauthorized copies of some commercially-produced film and videos and their soundtracks. When a prohibited use of an unauthorized copy is detected, a message will be displayed and playback or copying will be interrupted.

More information about Cinavia technology is provided at the Cinavia Online Consumer Information Center at <http://www.cinavia.com>. To request additional information about Cinavia by mail, send a postcard with your mailing address to: Cinavia Consumer Information Center, P.O. Box 86851, San Diego, CA, 92138, USA.

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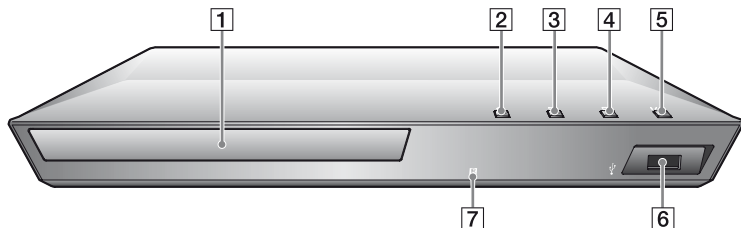
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Guide to Parts and Controls

Front panel



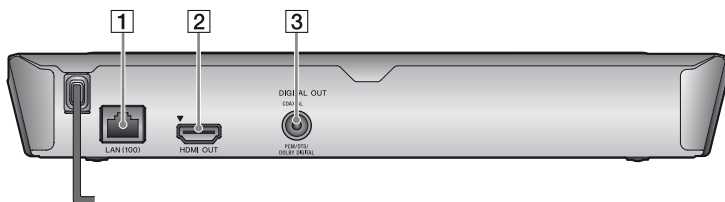
The ► button has a tactile dot. Use the tactile dot as a reference when operating the player.

- 1 Disc tray**
- 2 ▲ (open/close)**
- 3 ► (play)**
- 4 ■ (stop)**
- 5 I/⏻ (on/standby) / Power indicator**
Turns on the player, or sets to standby mode.
- 6 USB (USB) jack**
Connect a USB device to this jack.
- 7 Remote sensor**

To lock the disc tray (Child Lock)

You can lock the disc tray to avoid accidental opening of the tray. While the player is turned on, hold down the ► button on the player for more than 10 seconds to lock or unlock the tray.

Rear panel



- 1** LAN (100) terminal
- 2** HDMI OUT jack
- 3** DIGITAL OUT (COAXIAL) jack

Remote

The available functions of the remote are different depending on the disc or the situation.



Number 5, AUDIO, +, and buttons have a tactile dot. Use the tactile dot as a reference when operating the player.

1 (open/close)

Opens or closes the disc tray.

-TV- (TV input select)

Switches between TV and other input sources.

-TV- I/⏻ (TV on/standby)

Turns on the TV, or sets to standby mode.

I/⏻ (on/standby)

Turns on the player, or sets to standby mode.

2 Number buttons (0 - 9)

Enters the title/chapter/track numbers, etc.



Track numbers are applicable to CD-DA (Music CD) only.

(volume) +/-

Adjusts the TV volume.

AUDIO (page 22)

Selects the language track when multi-lingual tracks are recorded on BD-ROMs/DVD VIDEOS.

Selects the sound track on CDs.

SUBTITLE (page 22)

Selects the subtitle language when multi-lingual subtitles are recorded on BD-ROMs/DVD VIDEOS.

(muting)

Turns off the sound temporarily.

3 Colour buttons (red/green/yellow/blue)

Shortcut keys for interactive functions.

4 TOP MENU

Opens or closes the BD's or DVD's Top Menu.

POP UP/MENU

Opens or closes the BD-ROM's Pop-up Menu, or the DVD's menu.

OPTIONS (page 18)

Displays the available options on the screen.

HOME

Enters the player's home menu.
Displays the wall paper when pressed on the category icon of the home menu.

RETURN

Returns to the previous display.



Moves the highlight to select a displayed item.

Centre button (ENTER)

Enters the selected item.

5 **◀◀/▶▶ (previous/next)**

Skips to the previous/next chapter, track, or file.

⏸ (pause)

Pauses or re-starts playback.

◀◀/▶▶ (fast reverse/fast forward)

- Fast reverse/fast forward the disc when you press the button during playback. The search speed changes each time you press the button during video playback.
- Plays in slow motion, when pressed for more than one second in pause mode.
- Plays one frame at a time, when you press for a short time in pause mode.

▶ (play)

Starts or re-starts playback.

DISPLAY (page 17)

Displays the playback information on the screen.

■ (stop)

Stops playback and remembers the stop point (resume point).

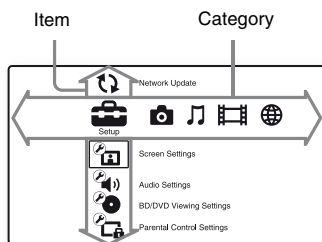
The resume point for a title/track is the last point you played or the last photo for a photo folder.

SEN (page 17)

Accesses the "Sony Entertainment Network™" online service.

Home menu display

The home menu appears when you press HOME. Select a category using ◀/▶. Select an item using ↑/↓, and press ENTER.



- [Setup]: Adjusts the player settings.
- [Photo]: Displays photos.
- [Music]: Plays music.
- [Video]: Plays videos.
- [Network]: Displays network items.

Step 1: Supplied Accessories

Check that you have the following items:

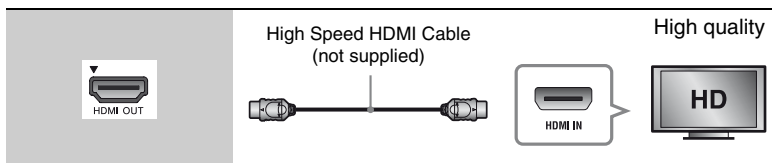
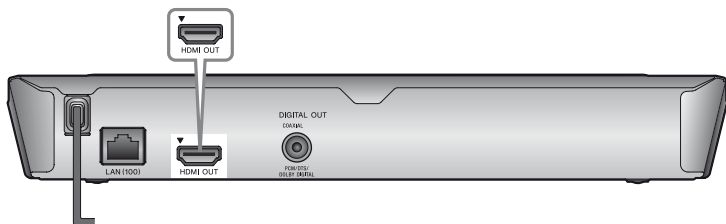
- Remote commander (remote) (1)
- R6 (size AA) batteries (2)

Step 2: Connecting the Player

Do not connect the mains lead until you have made all the connections.

Connecting to your TV

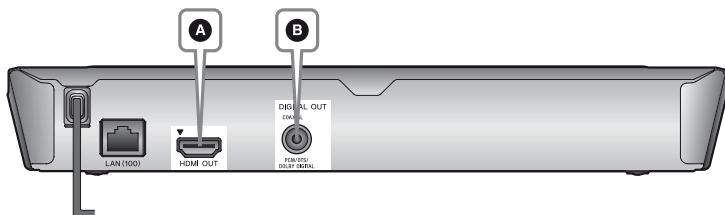
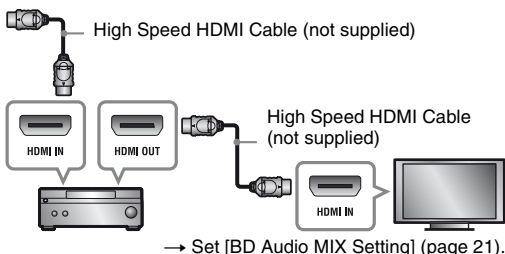
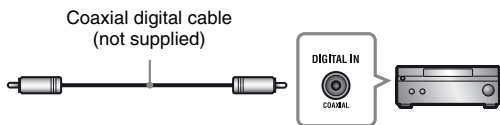
Connect the player to your TV with a High Speed HDMI Cable.



Do not connect the player through a VCR. Video signals from VCRs can be affected by copyright protection systems that cause the picture on the TV to be distorted.

Connecting to your AV amplifier (receiver)

Select one of the following connection methods according to the input jacks on your AV amplifier (receiver). When you select **A** or **B**, make the appropriate settings in the [Audio Settings] setup (page 21).

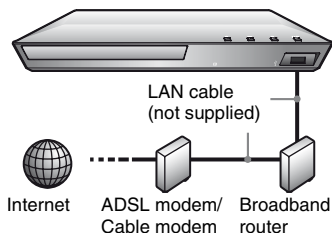
**A****B**

Step 3: Preparing for Network Connection

If you are not going to connect the player to a network, proceed to “Step 4: Easy Setup” (page 14).

Wired Setup

Use a LAN cable to connect to the LAN (100) terminal on the player.



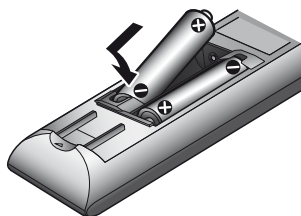
Using a shielded interface cable (LAN cable), straight or crossing, is recommended.

Step 4: Easy Setup

When turned on for the first time

Wait for a short while before the player turns on and starts [Easy Initial Settings].

- 1 Insert two R6 (size AA) batteries by matching the $\oplus$ and $\ominus$ ends on the batteries to the markings inside the battery compartment.**



- 2 Plug the player into the mains.**



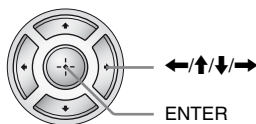
- 3 Press I/⏻ to turn on the player.**



4 Turn on the TV and set the input selector on your TV. This will show the signal from the player on your TV screen.

5 Perform [Easy Initial Settings].

Follow the on-screen instructions to make the basic settings using **←/↑/↓/→** and **ENTER** on the remote.

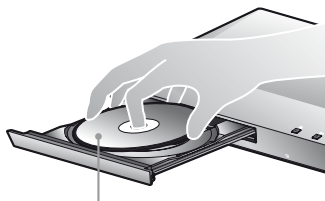


When [Easy Initial Settings] is complete, select [Easy Network Settings] to use the network functions of the player.

Playing a Disc

For playable discs, see page 30.

- 1 Switch the input selector on your TV so that the signal from the player appears on your TV screen.
- 2 Press , and place a disc on the disc tray.



Playing side facing down

- 3 Press  to close the disc tray.
Playback starts.
If playback does not start automatically, select  in the [Video],  [Music], or  [Photo] category, and press ENTER.

Enjoying BONUSVIEW/ BD-LIVE

Some BD-ROMs with the “BD-LIVE” logo* have bonus contents and other data that can be downloaded for your enjoyment.

* 

- 1 Connect a USB memory to the USB jack on the player (page 8).
Use a 1 GB or larger USB memory as your local storage.

- 2 Prepare for BD-LIVE (BD-LIVE only).
 - Connect the player to a network (page 14).
 - Set [BD Internet Connection] in [BD/DVD Viewing Settings] setup to [Allow] (page 22).

- 3 Insert a BD-ROM with BONUSVIEW/BD-LIVE.
The operation method differs depending on the disc. Refer to the instruction manual supplied with the disc.

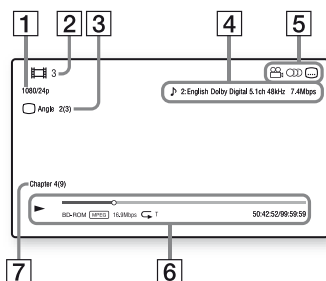


To delete data in the USB memory, select [Delete BD Data] in the  [Video] category, and press ENTER. All data stored in the buda folder will be erased.

Displaying the play information

You can view the playback information, etc., by pressing DISPLAY. The displayed information differs depending on the disc type and player status.

Example: when playing a BD-ROM



- 1 Output resolution/Video frequency
- 2 Title number or name
- 3 The currently selected angle
- 4 The currently selected audio setting
- 5 Available functions (Angle, Audio, Subtitle)
- 6 Playback information
Displays the Play mode, Playing status bar, Disc type, Video codec, Bitrate, Repeat type, Elapsed time, and Total playing time.
- 7 Chapter number

Playing from a USB Device

For “Playable types of files”, see page 31.

- 1 **Connect the USB device to the USB jack on the player (page 8).**
Refer to the instruction manual supplied with the USB device before connecting.
- 2 **Select [Video], [Music], or [Photo] category on the home menu using ←/→.**
- 3 **Select [USB device] using ↑/↓, and press ENTER.**

Playing via a Network

Enjoying Sony Entertainment Network

Sony Entertainment Network serves as a gateway, delivering the selected Internet content and a variety of on-demand entertainment straight to your player.



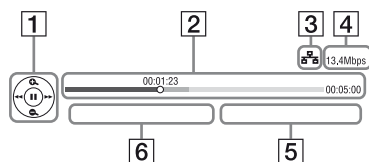
- Some Internet content requires registration via a PC before it can be played.
- Some Internet content may not be available in some regions/countries.

- 1 Connect the player to a network (page 14).
- 2 Press **SEN** button on the remote.
- 3 Select an Internet content and a variety of on-demand entertainment using **←/↑/↓/→**, and press **ENTER**.

Video streaming control panel

The control panel appears when the video file starts playing. The displayed items may differ depending on Internet content providers.

To display again, press **DISPLAY**.



- 1 Control display
Press **←/↑/↓/→** or **ENTER** for playback operations.
- 2 Playing status bar
Status bar, Cursor indicating the current position, Playing time, Duration of the video file
- 3 Network condition
[Icon] indicates the wired connection.
- 4 Network transmission speed
- 5 The file name of the next video
- 6 The file name of the current video selection

Available Options

Various settings and playback operations are available by pressing **OPTIONS**. The available items differ depending on the situation.

Common options

- **[Repeat Setting]**: Sets the repeat mode.
- **[Play]/[Stop]**: Starts or stops the playback.
- **[Play from start]**: Plays the item from the beginning.
- **[Change Category]**: Switches category between [Video], [Music] and [Photo] category.

[Video] only

- **[A/V SYNC]**: Adjusts the gap between picture and sound, by delaying the sound output in relation to the picture output (0 to 120 milliseconds).
- **[Video Settings]**:
 - [Picture Quality Mode]: Selects the picture settings for different lighting environments.
 - [BNR]: Reduces the mosaic-like block noise in the picture.
 - [MNR]: Reduces minor noise around the picture outlines (mosquito noise).
- **[Pause]**: Pauses the playback.
- **[Top Menu]**: Displays the BD's or DVD's Top Menu.
- **[Menu]/[Popup Menu]**: Displays the BD-ROM's Pop-up Menu or DVD's menu.
- **[Title Search]**: Searches for a title on BD-ROMs/DVD VIDEOS and starts playback from the beginning.
- **[Chapter Search]**: Searches for a chapter and starts playback from the beginning.

- **[Audio]:** Switches the language track when multilingual tracks are recorded on BD-ROMs/DVD VIDEOS. Selects the sound track on CDs.
- **[Subtitle]:** Switches the subtitle language when multilingual subtitles are recorded on BD-ROMs/DVD VIDEOS.
- **[Angle]:** Switches to other viewing angles when multi-angles are recorded on BD-ROMs/DVD VIDEOS.
- **[IP Content Noise Reduction]:** Adjusts the picture quality of Internet contents.

🎵 **[Music] only**

- **[Add Slideshow BGM]:** Registers music files in the USB memory as slideshow background music (BGM).

📷 **[Photo] only**

- **[Slideshow Speed]:** Changes the slideshow speed.
- **[Slideshow Effect]:** Sets the effect for slideshows.
- **[Slideshow BGM]:**
 - [Off]: Turns off the function.
 - [My Music from USB]: Sets the music files registered in [Add Slideshow BGM].
 - [Play from Music CD]: Sets the tracks in CD-DAs.
- **[Change Display]:** Switches between [Grid View] and [List View].
- **[View Image]:** Displays the selected photo.
- **[Slideshow]:** Plays a slideshow.
- **[Rotate Left]:** Rotates the photo counterclockwise by 90 degrees.
- **[Rotate Right]:** Rotates the photo clockwise by 90 degrees.

Using the Settings Displays

Select  [Setup] on the home menu when you need to change the settings of the player.

The default settings are underlined.

- 1** Select  [Setup] on the home menu using /.
- 2** Select the setup category icon using /, and press ENTER.

[Network Update]

Select [OK] to update the player's software via the network.



- We recommend performing the network update every 2 months or so.
- For information about update functions, visit the following website:

For customers in European countries

<http://support.sony-europe.com/>

For customers in Australia/New Zealand

<http://www.sony-asia.com/support/>



[Screen Settings]

■ [TV Type]

[16:9]: Select this when connecting to a wide-screen TV or a TV with a wide mode function.

[4:3]: Select this when connecting to a 4:3 screen TV without a wide mode function.

■ [Screen Format]

[Full]: Select this when connecting to a TV with a wide mode function. Displays a 4:3 screen picture in 16:9 aspect ratio even on a wide-screen TV.

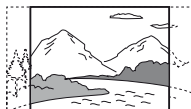
[Normal]: Changes the picture size to fit the screen size with the original picture aspect ratio.

■ [DVD Aspect Ratio]

[Letter Box]: Displays a wide picture with black bands on the top and bottom.



[Pan & Scan]: Displays a full-height picture on the entire screen, with trimmed sides.



■ [Cinema Conversion Mode]

[Auto]: Normally select this. The player automatically detects whether the material is video-based or film-based, and switches to the appropriate conversion method.

[Video]: The conversion method suited for video-based material will always be selected regardless of the material.

■ [Output Video Resolution]

Normally select [Auto]. Select [Original Resolution] to output the resolution recorded on the disc. When the resolution is lower than the SD resolution, it is scaled up to the SD resolution.

■ [BD-ROM 24p Output]

[Auto]: Outputs 1920 × 1080p/24 Hz video signals only when connecting a 1080/24p-compatible TV using the HDMI OUT jack.

[On]: Turns on the function.

[Off]: Select this when your TV is not compatible with 1080/24p video signals.

■ [DVD-ROM 24p Output]

[Auto]: Outputs 1920 × 1080p/24 Hz video signals only when connecting a 1080/24p-compatible TV using the HDMI OUT jack.

[Off]: Select this when your TV is not compatible with 1080/24p video signals.

■ [YCbCr/RGB (HDMI)]

[Auto]: Automatically detects the connected TV type, and switches to the matching colour setting.

[YCbCr (4:2:2)]: Outputs YCbCr 4:2:2 video signals.

[YCbCr (4:4:4)]: Outputs YCbCr 4:4:4 video signals.

[RGB]: Outputs RGB video signals.

■ [HDMI Deep Colour Output]

[Auto]: Normally select this.

[16bit]/[12bit]/[10bit]: Outputs 16bit/12bit/10bit video signals when the connected TV is compatible with Deep Colour.

[Off]: Select this when the picture is unstable or colours appear unnatural.

■ [Pause Mode]

[Auto]: Normally select this. Dynamic moving pictures appear without blurring.

[Frame]: Displays static pictures at high resolution.

**[Audio Settings]**

■ [Digital Audio Output]

[Auto]: Normally select this. Outputs audio signals according to the status of the connected devices.

[PCM]: Outputs PCM signals from the DIGITAL OUT (COAXIAL)/HDMI OUT jack.

■ [BD Audio MIX Setting]

[On]: Outputs the audio obtained by mixing the interactive and secondary audio to the primary audio.

[Off]: Outputs the primary audio only. Select this to output HD audio signals to an AV amplifier (receiver).

■ [DTS Neo:6]

[Cinema]/[Music]: Outputs the simulated multi-channel sound from 2 channel sources via the HDMI OUT jack according to the capability of the connected device using DTS Neo:6 Cinema or DTS Neo:6 Music mode.

[Off]: Outputs the sound with its original number of channels via the HDMI OUT jack.

■ [Audio DRC]

[Auto]: Performs playback at the dynamic range specified by the disc (BD-ROM only). Other discs are played back at the [On] level.

[On]: Performs playback at a standard compression level.

[Off]: No compression works. A more dynamic sound is produced.

■ [Downmix]

[Surround]: Outputs audio signals with surround effects. Select this when connecting an audio device that supports Dolby Surround (Pro Logic) or DTS Neo:6.

[Stereo]: Outputs audio signals without surround effects. Select this when connecting an audio device that does not support Dolby Surround (Pro Logic) or DTS Neo:6.

[BD/DVD Viewing Settings]

■ [BD/DVD Menu Language]

Selects the default menu language for BD-ROMs or DVD VIDEOS.

Select [Select Language Code], and enter the code for your language, referring to “Language code list” (page 33).

■ [Audio Language]

Selects the default track language for BD-ROMs or DVD VIDEOS.

When you select [Original], the language given priority in the disc is selected.

Select [Select Language Code], and enter the code for your language, referring to “Language code list” (page 33).

■ [Subtitle Language]

Selects the default subtitle language for BD-ROMs or DVD VIDEOS.

Select [Select Language Code], and enter the code for your language, referring to “Language code list” (page 33).

■ [BD Hybrid Disc Playback Layer]

[BD]: Plays BD layer.

[DVD/CD]: Plays DVD or CD layer.

■ [BD Internet Connection]

[Allow]: Normally select this.

[Do not allow]: Prohibits Internet connection.

[Parental Control Settings]

■ [Password]

Sets or changes the password for the Parental Control function. A password allows you to set a restriction on BD-ROM or DVD VIDEO, and Internet video playback. If necessary, you can differentiate the restriction levels for BD-ROMs, DVD VIDEOS, and Internet videos.

■ [Parental Control Area Code]

Playback of some BD-ROMs, DVD VIDEOS, or Internet videos can be limited according to the geographic area. Scenes may be blocked or replaced with different scenes. Follow the on-screen instructions and enter your four-digit password.

■ [BD Parental Control] / [DVD Parental Control] / [Internet Video Parental Control]

By setting Parental Control, scenes can be blocked or replaced with different scenes. Follow the on-screen instructions and enter your four-digit password.

■ [Internet Video Unrated]

[Allow]: Allows the playback of unrated Internet videos.

[Block]: Blocks the playback of unrated Internet videos.

[System Settings]

■ [OSD Language]

Selects on-screen display language for your player.

■ [HDMI Settings]

By connecting Sony components that are compatible with HDMI functions with a High Speed HDMI Cable, operation is simplified.

[Control for HDMI]

[On]: The following BRAVIA Sync features are available:

- One-Touch Play
- System Power-Off
- Language Follow

[Off]: Turns off the function.



For details, refer to the instruction manual supplied with the TV or components.

[Linked to TV-off]

[On]: Automatically turns off the player and HDMI-compatible components when the connected TV enters standby mode (BRAVIA Sync).

[Off]: Turns off the function.

■ [Startup Screen]

Set the startup screen when turning on the player.

[Network Service Screen]: Starts on Sony Entertainment Network portal screen.

[Home Menu Screen]: Starts on home menu.

■ [Quick Start Mode]

[On]: Shortens the startup time when turning on the player.

[Off]: Reduces standby power consumption.

■ [Auto Standby]

[On]: Automatically returns to standby mode if no button is pressed for more than 30 minutes.

[Off]: Turns off the function.

■ [Auto Display]

[On]: Automatically displays information on the screen when changing the viewing titles, picture modes, audio signals, etc.

[Off]: Displays information only when you press DISPLAY.

■ [Screen Saver]

[On]: Turns on the screen saver function. The screen saver image appears when you do not use the player for more than 10 minutes while an on-screen display is displayed.

[Off]: Turns off the function.

■ [Software Update Notification]

[On]: Sets the player to inform you of newer software version information (page 20).

[Off]: Turns off the function.

■ [System Information]

Displays the player's software version information and the MAC address.

■ [Software License Information]

Displays information about the Software License.

[Network Settings]

■ [Internet Settings]

Connect the player to the network beforehand. For details, see “Step 3: Preparing for Network Connection” (page 14).



For further details, visit the following website and check the FAQ contents:

For customers in European countries
<http://support.sony-europe.com/>

■ [Network Connection Status]

Displays the current network status.

■ [Network Connection Diagnostics]

Checks for the proper network connection by running the network diagnostics.

[Easy Network Settings]

Select [Easy Network Settings] to specify the network settings. Follow the on-screen instructions.

 [Resetting]

■ [Reset to Factory Default Settings]

Resets the player settings to the factory default by selecting the group of settings. All the settings within the group will be reset.

■ [Initialise Personal Information]

Erases your personal information stored in the player.

Additional Information

Troubleshooting

If you experience any of the following difficulties while using the player, use this troubleshooting guide to help remedy the problem before requesting repairs. Should any problem persist, consult your nearest Sony dealer.

Picture

There is no picture or the picture is not output correctly.

- ➔ Check that all the connecting cables are securely connected (page 12).
- ➔ Switch the input selector on your TV to display the signal from the player.
- ➔ Reset the [Output Video Resolution] to the lowest resolution by pressing ■ on the player for more than 10 seconds.
- ➔ Try the following: ①Turn the player off and on again. ②Turn the connected equipment off and on again. ③Disconnect and then reconnect the HDMI cable.
- ➔ The HDMI OUT jack is connected to a DVI device that does not support copyright protection technology.
- ➔ Check the [Output Video Resolution] settings in the [Screen Settings] setup (page 21).
- ➔ For BD-ROMs, check the [BD-ROM 24p Output] setting in the [Screen Settings] setup (page 21).
- ➔ For DVD-ROMs, check the [DVD-ROM 24p Output] setting in the [Screen Settings] setup (page 21).

The display language on the screen switches automatically when connected to the HDMI OUT jack.

- ➔ When [Control for HDMI] in [HDMI Settings] is set to [On] (page 23), the display language on the screen automatically switches according to the language setting of the connected TV (if you change the setting on your TV, etc.).

Sound

There is no sound or the sound is not output correctly.

- ➔ Check that all the connecting cables are securely connected (page 12).
- ➔ Switch the input selector on your AV amplifier (receiver) so that the audio signals of the player are output from your AV amplifier (receiver).
- ➔ If the audio signal does not come through the DIGITAL OUT (COAXIAL)/HDMI OUT jack, check the audio settings (page 21).
- ➔ For HDMI connections, try the following: ①Turn the player off and on again. ②Turn the connected equipment off and on again. ③Disconnect and then reconnect the HDMI cable.
- ➔ For HDMI connections, if the player is connected to a TV through an AV amplifier (receiver), try connecting the HDMI cable directly to the TV. Refer also to the instruction manual supplied with the AV amplifier (receiver).
- ➔ The HDMI OUT jack is connected to a DVI device (DVI jacks do not accept audio signals).

- ➔ The device connected to the HDMI OUT jack does not support the audio format of the player. Check the audio settings (page 21).

The HD Audio (Dolby Digital Plus, Dolby TrueHD, DTS-HD High Resolution Audio, and DTS-HD Master Audio) is not output by bitstream.

- ➔ Set [BD Audio MIX Setting] in [Audio Settings] setup to [Off] (page 21).
- ➔ Check that the connected AV amplifier (receiver) is compatible with each HD Audio format.

The interactive audio is not output.

- ➔ Set [BD Audio MIX Setting] in [Audio Settings] setup to [On] (page 21).

Message Code 3 [Audio outputs temporarily muted. Do not adjust the playback volume. The content being played is protected by Cinavia and is not authorized for playback on this device. For more information, see <http://www.cinavia.com>. Message Code 3.] appears on the screen when playing a disc.

- ➔ The audio track of the video that you are playing contains a Cinavia code indicating that it is an unauthorized copy of professionally-produced content (page 5).

Disc

The disc does not play.

- ➔ The disc is dirty or skewed.
- ➔ The disc is upside down. Insert the disc with the playback side facing down.

- ➔ The disc has a format that cannot be played back by this player (page 30).
- ➔ The player cannot play a recorded disc that is not correctly finalised.
- ➔ The region code on the BD or DVD does not match the player.

USB device

The player does not detect a USB device connected to the player.

- ➔ Make sure that the USB device is securely connected to the USB jack.
- ➔ Check if the USB device or a cable is damaged.
- ➔ Check if the USB device is on.
- ➔ If the USB device is connected via a USB hub, connect the USB device directly to the player.

Sony Entertainment Network

The picture/sound is poor/certain programmes display a loss of detail, especially during fast-motion or dark scenes.

- ➔ Picture/sound quality may be improved by changing the connection speed. Recommended connection speed is of at least 2.5 Mbps for standard definition video (10 Mbps for high definition video).

The picture is small.

- ➔ Press **↑** to zoom in.

Network connection

The player cannot connect to the network.

- ➔ Check the network connection (page 14) and the network settings (page 24).

The message [A new software version is available. Please go to the "Setup" section of the menu and select "Network update" to perform the update.] appears on the screen when turning the player on.

- ➔ See [Network Update] (page 20) to update the player to a newer software version.

Control for HDMI (BRAVIA Sync)

The [Control for HDMI] function does not work (BRAVIA Sync).

- ➔ Check that [Control for HDMI] in [HDMI Settings] is set to [On] (page 23).
- ➔ If you change the HDMI connection, turn the player off and on again.
- ➔ If power failure occurs, set [Control for HDMI] in [HDMI Settings] to [Off], then set [Control for HDMI] in [HDMI Settings] to [On] (page 23).
- ➔ Check the following and refer to the instruction manual supplied with the component.
 - the connected component is compatible with the [Control for HDMI] function.
 - the connected component's setting for the [Control for HDMI] function is correct.

- ➔ When you connect the player to a TV through an AV amplifier (receiver),
 - if the AV amplifier (receiver) is not compatible with the [Control for HDMI] function, you may be unable to control the TV from the player.
 - if you change the HDMI connection, disconnect and reconnect the mains lead, or a power failure occurs, try the following:
 - ① Switch the input selector of the AV amplifier (receiver) so that the picture from the player appears on the TV screen.
 - ② Set [Control for HDMI] in [HDMI Settings] to [Off], then set [Control for HDMI] in [HDMI Settings] to [On] (page 23). Refer to the instruction manual supplied with the AV amplifier (receiver).

The System Power-Off function does not work (BRAVIA Sync).

- ➔ Check that [Control for HDMI] and [Linked to TV-off] in [HDMI Settings] are set to [On] (page 23).

Others

Playback does not start from the beginning of content.

- ➔ Press **OPTIONS**, and select [Play from start].

Playback does not start from the resume point where you last stopped playing.

- ➔ The resume point may be cleared from memory depending on the disc when
 - you open the disc tray.
 - you disconnect the USB device.
 - you play other content.
 - you turn off the player.

Message Code 1 [Playback stopped. The content being played is protected by Cinavia and is not authorized for playback on this device. For more information, see <http://www.cinavia.com>. Message Code 1.] appears on the screen when playing a disc.

- ➔ The audio track of the video that you are playing contains a Cinavia code indicating it was intended for presentation using professional equipment only and is not authorized for playback by consumers (page 5).

The disc tray does not open and you cannot remove the disc even after you press .

- ➔ Try the following: ①Turn the player off, and disconnect the mains lead. ②Reconnect the mains lead while pressing down  on the player. ③Keep pressing down  on the player until the tray opens. ④Remove the disc. ⑤Hold down  on the player for more than 10 seconds until the player turns off.

The player does not respond to any button.

- ➔ Moisture has condensed inside the player (page 3).
- ➔ Hold down  on the player for more than 10 seconds until the player turns off.
- If the player still does not respond to any button, disconnect then reconnect the mains lead.

Specifications

System

Laser: Semiconductor laser

Inputs and outputs

(Jack name:

Jack type/Output level/Load impedance)

DIGITAL OUT (COAXIAL):

Phono jack/0.5 Vp-p/75 ohms

HDMI OUT:

HDMI 19-pin standard connector

LAN (100):

100BASE-TX Terminal

USB:

USB jack Type A, maximum current 500 mA (For connecting USB device)

General

Power requirements:

220 V - 240 V AC, 50/60 Hz

Power consumption: 8.8 W

Dimensions (approx.):

290 mm × 199 mm × 43 mm
(width/depth/height)
incl. projecting parts

Mass (approx.): 1.1 kg

Operating temperature:

5 °C to 35 °C

Operating humidity:

25 % to 80 %

Supplied accessories

See page 12.

Specifications and design are subject to change without notice.

Playable discs

Blu-ray Disc *1	BD-ROM BD-R*2/BD-RE*2
DVD *3	DVD-ROM DVD-R/DVD-RW DVD+R/DVD+RW
CD *3	CD-DA (Music CD) CD-ROM CD-R/CD-RW

*1 Since the Blu-ray Disc specifications are new and evolving, some discs may not be playable depending on the disc type and the version.

The audio output differs depending on the source, connected output jack, and selected audio settings.

*2 BD-RE: Ver.2.1

BD-R: Ver.1.1, 1.2, 1.3 including organic pigment type BD-R (LTH type)

The BD-Rs recorded on a PC cannot be played if postscripts are recordable.

*3 A CD or DVD disc will not play if it has not been correctly finalised. For more information, refer to the instruction manual supplied with the recording device.

Discs that cannot be played

- BDs with cartridge
- BDXLs
- DVD-RAMs
- HD DVDs
- DVD Audio discs
- PHOTO CDs
- Data part of CD-Extras
- Super VCDs
- Audio material side on DualDiscs

Note on Discs

This product is designed to playback discs that conform to the Compact Disc (CD) standard. DualDiscs and some of the music discs encoded with copyright protection technologies do not conform to the Compact Disc (CD) standard, therefore, these discs may not be playable by this product.

Note on playback operations of BDs/DVDs

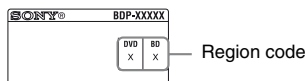
Some playback operations of BDs/DVDs may be intentionally set by software producers. Since this player plays BDs/DVDs according to the disc contents the software producers designed, some playback features may not be available.

Note about double-layer BDs/DVDs

The playback pictures and sound may be momentarily interrupted when the layers switch.

Region code (BD-ROM/DVD VIDEO only)

Your player has a region code printed on the rear of the unit and will only play BD-ROMs/DVD VIDEOS labelled with identical region codes or .



Playable types of files

Video

Codec	Container	Extension	With Audio
MPEG-1 Video	PS	.mpg, .mpeg	Dolby Digital, DTS, LPCM, MPEG
MPEG-2 Video	PS	.mpg, .mpeg	Dolby Digital, DTS, LPCM, MPEG
	TS	.m2ts, .mts	Dolby Digital, DTS, LPCM, MPEG, AAC
Xvid	AVI	.avi	Dolby Digital, LPCM, WMA9, MP3
	MKV	.mkv	Dolby Digital, LPCM, AAC, MP3
MPEG4/AVC ^{*1}	MKV	.mkv	Dolby Digital, LPCM, AAC, MP3
	MP4	.mp4, .m4v	AAC
	TS	.m2ts, .mts	Dolby Digital, DTS, LPCM, MPEG, AAC
	Quick Time	.mov	Dolby Digital, LPCM, AAC, MP3
	3gpp/3gpp2	.3gp, .3g2, .3gpp, .3gp2	AAC
VC1	TS	.m2ts, .mts	Dolby Digital, DTS, LPCM, MPEG, AAC
WMV9	ASF	.wmv, .asf	WMA9
Motion JPEG	Quick Time	.mov	Dolby Digital, LPCM, AAC, MP3
	AVI	.avi	Dolby Digital, LPCM, AAC, MP3

Format
AVCHD (Ver.2.0) ^{*2*3}

Music

Codec	Extension
MP3 (MPEG-1 Audio Layer III) ^{*4}	.mp3
AAC/HE-AAC ^{*4}	.m4a, .aac
WMA9 Standard	.wma
LPCM ^{*4}	.wav
FLAC	.flac, .fla
Dolby Digital ^{*4}	.ac3

Photo

Format	Extension
JPEG	.jpeg, .jpg, .jpe
PNG	.png ^{*5}
GIF	.gif ^{*5}

- *1 The player can support AVC up to Level 4.1.
- *2 The player can support frame rate up to 60 fps.
- *3 The player plays AVCHD format files that are recorded on a digital video camera, etc. The AVCHD format disc will not play if it has not been correctly finalised.
- *4 The player can play “.mka” files.
- *5 The player does not play animated PNG or animated GIF files.



- Some files may not play depending on the format, the encoding, or recording condition.
- Some files edited on a PC may not play.
- Some files may not be able to perform fast forward or fast reverse function.
- The player does not play coded files such as DRM and Lossless.
- The player can recognise the following files or folders in BDs, DVDs, CDs and USB devices:
 - up to folders in the 9th layer, including the root folder
 - up to 500 files/folders in a single layer
- The player can support frame rate:
 - up to 60 fps for AVCHD (MPEG4/AVC) only.
 - up to 30 fps for other video codecs.
- The player can support video bit rate up to 40 Mbps.
- The player can support video resolution up to 1920 × 1080p.
- Some USB devices may not work with this player.
- The player can recognise Mass Storage Class (MSC) devices, Still Image Capture Device (SICD) class devices and 101 keyboard.
- To avoid data corruption or damage to the USB memory or devices, turn off the player when connecting or removing the USB memory or devices.
- The player may not play high bit rate video files on DATA CDs smoothly. It is recommended to play such files using DATA DVDs or DATA BDs.

Notes About the Discs

- To keep the disc clean, handle the disc by its edge. Do not touch the surface.
 

Dust, fingerprints, or scratches on the disc may cause it to malfunction.
- Do not expose the disc to direct sunlight or heat sources such as hot air ducts, or leave it in a car parked in direct sunlight as the temperature may rise considerably inside the car.
- After playing, store the disc in its case.
- Clean the disc with a cleaning cloth. Wipe the disc from the centre out.
 
- Do not use solvents such as benzene, thinner, commercially available disc/lens cleaners, or anti-static spray intended for vinyl LPs.
- If you have printed the disc's label, dry the label before playing.
- Do not use the following discs.
 - A lens cleaning disc.
 - A disc that has a non-standard shape (e.g., card, heart).
 - A disc with a label or sticker on it.
 - A disc that has cellophane tape or sticker adhesive on it.
- Do not resurface the playing side of a disc to remove surface scratches.

Code numbers of controllable TVs

While holding down -TV- **II**, enter the TV manufacturer's code using the number buttons.

If more than one code number is listed, try entering them one at a time until you find the one that works with your TV.

Manufacturer	Code number
Sony	01 (default)
Hitachi	24
LG/Goldstar	76
Loewe	45
Panasonic	17, 49
Philips	06, 08, 72
Samsung	71
Sharp	29
Toshiba	38

Language code list

For details, see [BD/DVD Viewing Settings] (page 22).

The language spellings conform to the ISO 639: 1988 (E/F) standard.

Code Language

1027	Afar	1028	Abkhazian
1032	Afrikaans	1039	Amharic
1044	Arabic	1045	Assamese
1051	Aymara	1052	Azerbaijani
1053	Bashkir	1057	Byelorussian
1059	Bulgarian	1060	Bihari
1061	Bislama	1066	Bengali
1067	Tibetan	1070	Breton
1079	Catalan	1093	Corsican
1097	Czech	1103	Welsh
1105	Danish	1109	German
1130	Bhutani; Dzongkha	1142	Greek
1144	English	1145	Esperanto
1149	Spanish	1150	Estonian
1151	Basque	1157	Persian
1165	Finnish	1166	Fiji
1171	Faroese	1174	French
1181	Frisian	1183	Irish
1186	Scots Gaelic	1194	Galician
1196	Guarani	1203	Gujarati
1209	Hausa	1217	Hindi
1226	Croatian	1229	Hungarian
1233	Armenian	1235	Interlingua
1239	Interlingue	1245	Inupiak
1248	Indonesian	1253	Icelandic
1254	Italian	1257	Hebrew
1261	Japanese	1269	Yiddish
1283	Javanese	1287	Georgian
1297	Kazakh	1298	Greenlandic; Kalaallisut
1299	Cambodian; Khmer	1300	Kannada
1301	Korean	1305	Kashmiri
1307	Kurdish	1311	Kirghiz
1313	Latin	1326	Lingala
1327	Laothian; Lao	1332	Lithuanian
1334	Latvian	1345	Malagasy
1347	Maori	1349	Macedonian
1350	Malayalam	1352	Mongolian
1353	Moldavian	1356	Marathi

Code Language

1357	Malay	1358	Malese; Maltese
1363	Burmese	1365	Nauru
1369	Nepali	1376	Dutch
1379	Norwegian	1393	Occitan
1403	Oromo	1408	Oriya
1417	Punjabi; Panjabi	1428	Polish
1435	Pashto; Pushto	1436	Portuguese
1463	Quechua	1481	Rhaeto- Romance
1482	Kirundi; Rundi	1483	Romanian
1489	Russian	1491	Kinyarwanda
1495	Sanskrit	1498	Sindhi
1501	Sangho; Sango	1502	Serbo- Croatian
1503	Singhalese; Sinhalese	1505	Slovak
1506	Slovenian	1507	Samoa
1508	Shona	1509	Somali
1511	Albanian	1512	Serbian
1513	Siswati; Swati	1514	Sesotho; Sotho southern
1515	Sundanese	1516	Swedish
1517	Swahili	1521	Tamil
1525	Telugu	1527	Tajik
1528	Thai	1529	Tigrinya
1531	Turkmen	1532	Tagalog
1534	Setswana; Tswana	1535	Tonga; Tonga islands
1538	Turkish	1539	Tsonga
1540	Tatar	1543	Twi
1557	Ukrainian	1564	Urdu
1572	Uzbek	1581	Vietnamese
1587	Volapük	1613	Wolof
1632	Xhosa	1665	Yoruba
1684	Chinese	1697	Zulu
1703	Not specified		

Parental control/area code

For details, see [Parental Control Area Code] (page 23).

Code Area

2044	Argentina	2047	Australia
2046	Austria	2057	Belgium
2070	Brazil	2090	Chile
2092	China	2093	Colombia
2115	Denmark	2165	Finland
2174	France	2109	Germany
2200	Greece	2219	Hong Kong
2248	India	2238	Indonesia
2239	Ireland	2254	Italy
2276	Japan	2304	Korea
2333	Luxembourg	2363	Malaysia
2362	Mexico	2376	Netherlands
2390	New Zealand	2379	Norway
2427	Pakistan	2424	Philippines
2428	Poland	2436	Portugal
2489	Russia	2501	Singapore
2149	Spain	2499	Sweden
2086	Switzerland	2543	Taiwan
2528	Thailand	2184	United Kingdom

The software of this player may be updated in the future. For information about any available updates and the latest Operating Instructions, please visit the following website:

For customers in European countries

<http://support.sony-europe.com/>

For customers in Australia/New Zealand

<http://www.sony-asia.com/support/>



To find out useful hints, tips and information about Sony products and services please visit: www.sony-europe.com/myproduct/



<http://www.sony.net/>

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