# JVC

**DVD/CD RECEIVER** 

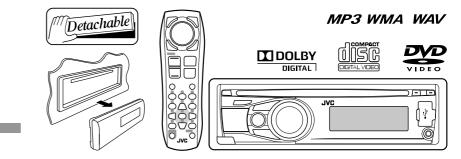


KD-DV5606/ KD-DV5605/KD-DV5604

# Having TROUBLE with operation?

Please reset your unit Refer to page of How to reset your unit

JVC



For canceling the display demonstration, see page 4.

For installation and connections, refer to the separate manual.

////// INSTRUCTIONS

0110DTSMDTJEIN

Thank you for purchasing a JVC product.

Please read all instructions carefully before operation, to ensure your complete understanding and to obtain the best possible performance from the unit.

#### **IMPORTANT FOR LASER PRODUCTS**

- 1. CLASS 1 LASER PRODUCT
- CAUTION: Do not open the top cover. There are no user serviceable parts inside the unit; leave all servicing to qualified service personnel.
- CAUTION: Visible and/or invisible class 1M laser radiation when open. Do not view directly with optical instruments.
- 4. REPRODUCTION OF LABEL: CAUTION LABEL, PLACED OUTSIDE THE UNIT.

| CAUTION                                 | ATTENTION                            | AVISO                            | VARNING                                | 注意                  | CAUTION                               |
|---|--------------------------------------|----------------------------------|--|---------------------|---------------------------------------|
|   | RAYONNEMENT LASER                    |                                  | SYNLIG OCH/ELLER                       | ここを聞くと可視            | VISIBLE AND/OR                        |
|   | VISIBLE ET/OU<br>INVISIBLE DE CLASSE |                                  | OSYNLIG                                |                     | INVISIBLE CLASS II<br>LASER RADIATION |
|   | INVISIBLE DE CLASSE                  | CUANDO ESTÁ                      | LASENSTHALNING,<br>KLASS 1M, NÅR DENNA |                     | laser radiation<br>When open.         |
|   |                                      | ABIERTO. NO MIRAR                | del àr ôppnad.                         | 出ます。                | DO NOT STARE                          |
| OPTICAL INSTRUMENTS.<br>IEC60825-1:2001 |                                      | DIRECTAMENTE<br>CON INSTRUMENTAL | BETRAKTA EJ<br>STRÅLEN MED OPTISKA     | 光学装置で直接<br>目かいぞください | INTO BEAM.<br>FDA 21 CFR              |
|   |                                      |                                  | INSTRUMENT. (SWE)                      | (JPN)               | (ENG)                                 |



[European Union only]

#### This mark is used to indicate...



Turn the control dial to make a selection, then press to confirm the selection.

#### Indication language:

In this manual, English indications are used for purposes of explanation. You can select the indication language on the monitor on the "LANGUAGE" setting (see page 21).

#### Caution on volume setting:

Digital devices (CD/USB) produce very little noise compared with other sources. Lower the volume before playing these digital sources to avoid damaging the speakers by sudden increase of the output level.

#### WARNINGS:

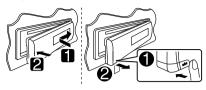
#### (To prevent accidents and damage)

- DO NOT install any unit or wire any cable in a location where;
  - it may obstruct the steering wheel and gearshift lever operations.
  - it may obstruct the operation of safety devices such as air bags.
  - it may obstruct visibility.
- DO NOT operate the unit while driving.
- If you need to operate the unit while driving, be sure to look around carefully.
- The driver must not watch the monitor while driving.

If the parking brake is not engaged, "DRIVER MUST NOT WATCH THE MONITOR WHILE DRIVING." appears on the monitor, and no playback picture will be shown.

 This warning appears only when the parking brake lead is connected to the parking brake system built in the car (refer to the Installation/Connection Manual).

### How to attach/detach the control panel



#### How to reset your unit



Your preset adjustments will also be erased.

### How to forcibly eject a disc



- You can forcibly eject the loaded disc even if the disc is locked. To lock/unlock the disc, see page 12.
- Be careful not to drop the disc when it ejects.
- If this does not work, reset your unit.

#### For safety...

- Do not raise the volume level too much, as this will block outside sounds, making driving dangerous.
- Stop the car before performing any complicated operations.

#### Temperature inside the car...

If you have parked the car for a long time in hot or cold weather, wait until the temperature in the car becomes normal before operating the unit.

# CONTENTS

| How to attach/detach the control panel | 3 |
|--|---|
| How to reset your unit                 | 3 |
| How to forcibly eject a disc           | 3 |

#### PREPARATIONS

| Canceling the display demonstration | 4 |
|-------------------------------------|---|
| Setting the clock                   | 4 |

#### INTRODUCTIONS

| Playable disc type  | 5 |
|---------------------|---|
| r layable uist type | J |

#### **OPERATIONS**

| Basic operations                         | 6  |
|--|----|
| Using the control panel                  | 6  |
| • Using the remote controller (RM-RK255) | 7  |
| Listening to the radio                   | 10 |
| Disc operations                          | 12 |
| Operations using the control panel       | 13 |
| Operations using the remote controller   |    |
| (RM-RK255)                               | 15 |
| USB operations                           | 22 |
|  |    |

#### **EXTERNAL DEVICES**

| Listening to the other external |    |
|---------------------------------|----|
| components                      | 23 |

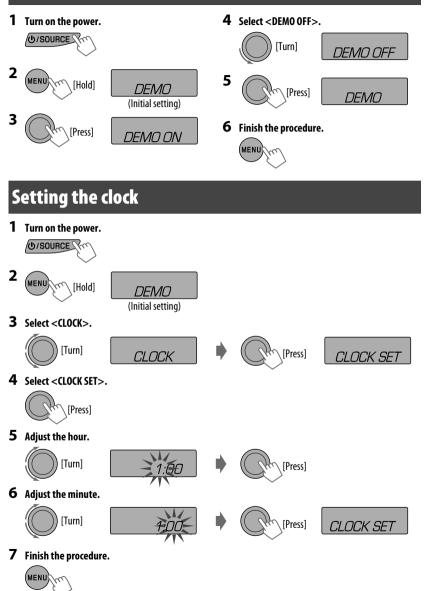
#### SETTINGS

| Selecting a preset sound mode | 24 |
|-------------------------------|----|
| Menu operations               | 25 |

#### REFERENCES

| More about this unit | 28 |
|----------------------|----|
| Maintenance          | 32 |
| Troubleshooting      | 33 |
| Specifications       | 36 |
|                      |    |

# Canceling the display demonstration



PREPARATIONS

4

# Playable disc type

| Disc type   | Recording format, file type, etc  | Playable |
|---|---|----------|
| DVD   | DVD-Video *1<br>Region Code: South East Asia, Hong Kong region: 3<br>India: 5<br>Ex.: | √ок      |
|   | DVD-Audio/DVD-ROM   | XNO      |
| DVD Recordable/Rewritable   | DVD-Video   |          |
| (DVD-R/-RW * <sup>2</sup> , +R/+RW * <sup>3</sup> )<br>• DVD Video: UDF bridge          | DVD-VR  |          |
| <ul> <li>DVD video. ODF bridge</li> <li>DVD-VR</li> </ul>                               | MPEG1/MPEG2   | √ок      |
| • MPEG-1/MPEG-2/MP3/WMA/  | JPEG  |          |
| WAV: ISO 9660 level 1, level 2,<br>Romeo, Joliet  | MP3/WMA/WAV   |          |
|   | DivX/AAC/MPEG4/DVD+VR/DVD-RAM   | XNO      |
| Dual Disc   | DVD side  | √ок      |
|   | Non-DVD side  | XNO      |
| CD/VCD  | Audio CD/CD Text (CD-DA)  | √ок      |
|   | VCD (Video CD)  | ₩ OK     |
|   | DTS-CD/SVCD (Super Video CD)/CD-ROM/<br>CD-I (CD-I Ready)                             | XNO      |
| CD Recordable/Rewritable<br>(CD-R/-RW)<br>• ISO 9660 level 1, level 2, Romeo,<br>Joliet | CD-DA   |          |
|   | VCD (Video CD)  |          |
|   | MPEG1/MPEG2   | √ок      |
|   | JPEG  |          |
|   | MP3/WMA/WAV   |          |
|   | DivX/AAC/MPEG4  | XNO      |

\*1 If you insert a DVD Video disc of an incorrect Region Code, "REGION CODE ERROR" appears on the monitor.

\*2 DVD-R recorded in multi-border format is also playable (except for dual layer discs). DVD-RW dual layer discs are not playable.

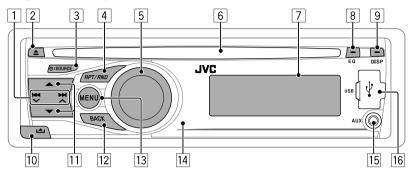
\*3 It is possible to play back finalized +R/+RW (Video format only) discs. +RW double layer discs are not playable.

#### **Caution for DualDisc playback**

The Non-DVD side of a "DualDisc" does not comply with the "Compact Disc Digital Audio" standard. Therefore, the use of Non-DVD side of a DualDisc on this product may not be recommended.

# **Basic operations**

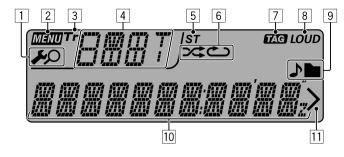
# Using the control panel



- 1 FM/AM: Search for station.
  - DISC/USB: Select chapter/track.
- 2 Eject disc.
- **3** Turn on the power.
  - Turn off the power [Hold].
  - Select the source.  $FM \rightarrow AM^{*1} \rightarrow DISC^{*2} \rightarrow USB^{*2} \rightarrow AUX IN^{*1} \rightarrow (back to the beginning)$
- 4 DISC/USB: Enter the playback mode.
- 5 Control the volume\*<sup>3</sup> or select items [Turn].
  - Confirm the selection [Press].
  - FM/AM: Enter "PRESET MODE" [Hold].
  - Mutes the sound while listening to a source [Press].
  - DISC/USB: Pause/resume playback and cancel muting [Press].
- 6 Loading slot
- 7 Display window
- 8 Select the sound mode.
- 9 Change the display information (if the power is turned on).
  - Check the current clock time (if the power is turned off).

- 10 Detach the panel.
- 11 FM/AM: Select preset station.
  - DISC: Select title/program/playlist/folder.
  - USB: Select folder.
- 12 Return to the previous menu.
- 13 Enter list operations.
  - Enter Menu setting [Hold].
- 14 Remote sensor
- 15 AUX (auxiliary) input jack
- 16 USB (Universal Serial Bus) input terminal
- \*1 You cannot select these sources if they were disabled in the Menu (see < SRC SELECT> in "Menu operations" on page 27).
- \*2 You cannot select these sources if they are not ready or not connected.
- \*3 Also known as "Control dial" in this manual.

#### **Display window**



- 1 🗲 (setting) indicator
  - $\mathcal{P}$  (search) indicator
- 2 MENU indicator
- 3 Tr (track) indicator
- Source display / Track number / Folder number / Title number / PBC indicator / Time countdown indicator / Setting and list operation information
- 5 ST (stereo) indicator

- 6 Playback mode indicators → → (random),
   → (repeat)
- 7 TAG (Tag information) indicator
- 8 LOUD (loudness) indicator
- Disc/device information indicators—♪ (track/file),
   (folder)
- 10 Main display
- 11 > (next level) indicator

# Using the remote controller (RM-RK255)

#### Installing the batteries



Insert the batteries into the remote controller by matching the polarity (+ and -) correctly.

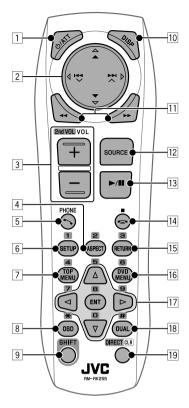
# If the effectiveness of the remote controller decreases, replace the batteries.

#### Caution:

- Danger of explosion if battery is incorrectly replaced. Replace only with the same or equivalent type.
- Battery shall not be exposed to excessive heat such as sunshine, fire, or the like.

#### Before using the remote controller:

- Aim the remote controller directly at the remote sensor on the unit.
- DO NOT expose the remote sensor to bright light (direct sunlight or artificial lighting).



#### 1 ර/ATT button

- Turns on the power. When the power is on, pressing U/ATT on the remote controller also mutes the sound or pauses. Press U/ATT again to cancel muting or resume playback.
- Turns the power off if pressed and held.

#### 2 ▲/▼ buttons

- FM/AM: Selects the preset stations.
- DISC:
  - DVD-Video: Selects the title.
  - DVD-VR: Selects the program/playlist.
  - JPEG/MPEG Video/MP3/WMA/WAV: Selects the folders if included.

- USB:
  - JPEG/MPEG Video/MP3/WMA/WAV: Selects the folders if included.

#### buttons

- FM/AM:
  - Searches for stations automatically if pressed briefly.
  - Searches for stations manually if pressed and held.
- DISC/USB:
  - Reverse skip/forward skip if pressed briefly.
  - Reverse search/forward search if pressed and held.
- 3 VOL (volume) + / buttons
  - Adjusts the volume level.

#### 2nd VOL (volume) buttons

Not applicable for this unit.

#### 4 \* ASPECT button

- Not applicable for this unit.
- 5 🥆 PHONE button
  - Not applicable for this unit.

#### 6\* SETUP button

• Enters disc setup menu (during stop).

#### 7\* TOP MENU button

- DVD-Video: Shows the disc menu.
- DVD-VR: Shows the Original Program screen.
- VCD: Resumes PBC playback.

#### 8\* OSD (on-screen display) button

• Shows the on-screen bar.

#### 9 SHIFT button

- Functions with other buttons.
- 10 DISP (display) button
  - Changes the display information (if the power is turned on).
  - Checks the current clock time (if the power is turned off).

#### 11 **44/** buttons

- DVD-Video: Slow motion playback (during pause).
- DVD-VR/VCD: Forward slow motion playback (during pause).
- JPEG/MPEG Video/MP3/WMA/WAV/USB: Reverse search/forward search.

#### 12 SOURCE button

- Selects the source.
- 13 ► (play) / II (pause) button
  - DISC/USB: Starts/pauses playback.
- 14 🖛 (end call) button
  - Not applicable for this unit.
  - (stop) button
  - DISC/USB: Stops playback.

#### 15\* RETURN button

• VCD: Returns to the PBC menu.

#### 16\* DVD MENU button

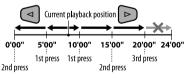
- DVD-Video: Shows the disc menu.
- DVD-VR: Shows the Playlist screen.
- VCD: Resumes PBC playback.

#### $17^* \triangle / \nabla$ buttons

• DVD-Video: Makes selection/settings.

#### ⊲/⊳ buttons

- DVD-Video: Makes selection/settings.
- JPEG/MPEG Video: Skips back or forward by about five minutes.



#### ENT (enter) button

Confirms selection.

#### 18\* DUAL button

• Not applicable for this unit.

#### 19 DIRECT button

 DISC/USB: Enters direct search mode for chapter/title/program/playlist/folder/track when pressed with SHIFT button (see page 16 for details).

#### CLR (clear) button

- DISC/USB: Erases the misentry when pressed with SHIFT button.
- \* Functions as number buttons/\* (asterisk)/# (hatch) when pressed with SHIFT button.
  - DISC/USB: Enters chapter/title/program/playlist/ folder/track number after entering search mode by pressing SHIFT and DIRECT (see page 16 for details).

# Listening to the radio

| 1 | 也/SOURCE | Select "FM" or "AM."   |
|---|----------|--|
| 2 |          | <ul> <li>Search for a station to listen—Auto Search.</li> <li>When a station is tuned in, searching stops. To stop searching, press the same button again.</li> <li>You can also search for a station manually—Manual Search. Hold either one of the buttons until "M" flashes on the display, then press it repeatedly.</li> <li>When receiving an FM stereo broadcast with sufficient signal strength, the ST indicator lights up on the display.</li> </ul> |

#### **Changing the display information**



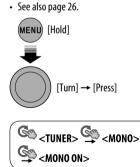
DISP

Frequency  $\rightarrow$  Clock  $\rightarrow$  Station name\*  $\rightarrow$  (back to the beginning)

\* If no title is assigned to a station, "NO NAME" appears. To assign a title to a station, see page 11.

### Improving the FM reception

When an FM stereo broadcast is hard to receive, activate monaural mode for better reception.



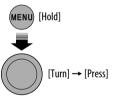
Reception improves, but stereo effect will be lost.

**To restore the stereo effect,** repeat the same procedure to select **<MONO OFF**>.

# Storing stations in memory <u>Automatic presetting (FM)—SSM (Strong-station Sequential Memory)</u>

You can preset up to 18 stations for FM.

• See also page 26.



"SSM" flashes and local stations with the strongest signals are searched and stored automatically.

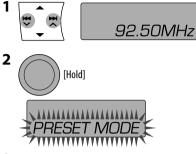
To stop searching, press I→→ /→→I ∧.

To preset another 6 stations, repeat the above procedure by selecting one of the other 6 SSM setting ranges.

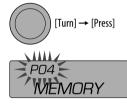
#### Manual presetting (FM/AM)

You can preset up to 18 stations for FM and 6 stations for AM.

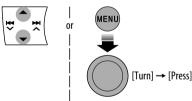
Ex.: Storing FM station of 92.50 MHz into preset number "04."



**3** Select preset number "04" and store.



### Selecting preset station



### 🔳 Title assignment

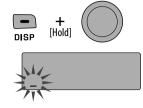
You can assign titles to 30 station frequencies (FM and AM) using 8 characters (maximum) for each title.

• If you try to assign titles to more than 30 station frequencies, "NAME FULL" appears. Delete unwanted titles before assignment.

1 Select "FM" or "AM."

心/SOURCE

**2** Show the title entry screen.



#### **3** Assign a title.

1 Select a character.



#### A B C D E F G H I J K L M N O P Q R S T U V W X Y Z 0 1 2 3 4 5 6 7 8 9 - / < > space

2 Move to the next (or previous) character position.



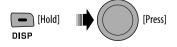
3 Repeat steps 1 and 2 until you finish entering the title.

#### 4 Finish the procedure.



#### To erase the entire title

After step 2 above...



# **Disc operations**

#### Before performing any operations...

Turn on the monitor to watch the playback picture. If you turn on the monitor, you can also control playback of other discs by referring to the monitor screen. (See pages 17 - 20.)

The disc type is automatically detected, and playback starts automatically (for DVD: automatic start depends on its internal program).

If the current disc does not have any disc menu, all tracks will be played repeatedly until you change the source or eject the disc.

If " $\mathfrak{O}$ " appears on the monitor when pressing a button, the unit cannot accept the operation you have tried to do.

• In some cases, without showing "O," operations will not be accepted.

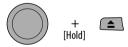
| Turn on the power.   |
|--|
| Insert a disc.<br>All tracks will be played repeatedly until you change the source<br>or eject the disc. |

#### Stop playing and ejecting the disc



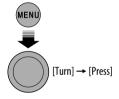
"NO DISC" appears. Press **ウ/SOURCE** to listen to another playback source.

#### Prohibiting disc ejection



To cancel the prohibition, repeat the same procedure.

#### Selecting a track/folder (MP3/WMA/WAV/CD)



- For MP3/WMA/WAV discs, select the desired folder, then the desired track by repeating the control dial procedures.
- To return to the previous menu, press BACK.

# Operations using the control panel

Pressing (or holding) the following buttons allows you to...

| Disc type        | Operation                              | Changes the display information DISP   |
|------------------|--|--|
| OVD Video        | •  44 ♥/<br>▶►! ▲<br>• ▲/♥<br>• DISP   | <ul> <li>: [Press] Select chapter</li> <li>[Hold] Reverse/fast-forward chapter*1</li> <li>: Select title</li> <li>: Current chapter number and Elapsed playing time → Current chapter number and Clock → Current title and chapter number → (back to the beginning)</li> </ul>   |
| OVD-VR           | •  44 ♥/<br>▶►! ▲<br>• ▲/♥<br>• DISP   | <ul> <li>: [Press] Select chapter</li> <li>[Hold] Reverse/fast-forward chapter*1</li> <li>: Select program number/playlist number</li> <li>: Current chapter number and Elapsed playing time → Current chapter number and Clock → Current program (or playlist) number and chapter number → (back to the beginning)</li> </ul> |
| JPEG/MPEG        | • 144 V/<br>• ►►1 A<br>• A/V<br>• DISP | <ul> <li>: [Press] Select track</li> <li>[Hold] Reverse/fast-forward track (for MPEG)*2</li> <li>: Select folder</li> <li>: Elapsed playing time → Folder number and Clock → Folder name → Track title → (back to the beginning)</li> </ul>  |
| VCD              | • 144 V/<br>• DISP                     | <ul> <li>: [Press] Select track</li> <li>[Hold] Reverse/fast-forward track*<sup>1</sup></li> <li>: Current track number and Elapsed playing time → Current track number and Clock → (back to the beginning)</li> </ul>   |
| EMP3/<br>WMA/WAV | •  44 \v/                              | <ul> <li>: [Press] Select track</li> <li>[Hold] Reverse/fast-forward track*1</li> <li>: Select folder</li> <li>: Current track number and Elapsed playing time → Current track number and Clock → Album name/performer (folder name*3) → Track title (file name*3) → (back to the beginning)</li> </ul>                        |
| CD               | • 144 V/<br>• DISP                     | <ul> <li>: [Press] Select track</li> <li>[Hold] Reverse/fast-forward track*1</li> <li>: Current track number and Elapsed playing time → Current track number and Clock → Disc title/performer*4 → Track title*4 → (back to the beginning)</li> </ul>   |

- \*1 Search speed:  $\times 2 \implies \times 10$
- \*2 Search speed:  $\blacktriangleright$  1  $\Rightarrow$   $\triangleright$  2
- \*3 If the file does not have Tag information or <TAG DISPLAY> is set to <TAG OFF> (see page 26), folder name and file name appear. TAG indicator will not light up.
- \*4 "NO NAME" appears for an audio CD.

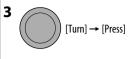
# Selecting the playback modes

You can use only one of the following playback modes at a time.









| Disc type   | REPEAT   | RANDOM   |
|---|--|--|
| <b>OVD</b> Video  | CHAPTER RPT: Repeat current chapter<br>TITLE RPT: Repeat current title | _  |
| CHAPTER RPT: Repeat current chapter<br>PROGRAM RPT: Repeat current program<br>(not available for Playlist Playback) |  | _  |
| <b>U</b> JPEG   | FOLDER RPT: Repeat current folder                                      | _  |
| MPEG  | TRACK RPT: Repeat current track<br>FOLDER RPT: Repeat current folder   | FOLDER RND: Randomly play all tracks of<br>current folder, then tracks of next<br>folders<br>ALL RND: Randomly play all tracks |
| TRACK RPT: Repeat current track (PBC not in use)  |  | ALL RND: Randomly play all tracks (PBC not in use)   |
| EMP3/<br>WMA/WAV  | TRACK RPT: Repeat current track<br>FOLDER RPT: Repeat current folder   | FOLDER RND: Randomly play all tracks of<br>current folder, then tracks of next<br>folders<br>ALL RND: Randomly play all tracks |
| TRACK RPT: Repeat current track ALL R   |  | ALL RND: Randomly play all tracks  |

• To cancel repeat play or random play, select "RPT OFF" or "RND OFF."

• To return to the previous menu, press BACK.

### Operations using the remote controller (RM-RK255)

| Button     | DVD Video / DVD-VR   | JPEG/MPEG  |
|------------|--|--|
|            | Stop play  | Stop play  |
| ►/III      | Start play/Pause (if pressed during play)  | Start play/Pause (if pressed during play)<br>JPEG: Slide show: Each track is shown for a few<br>seconds.         |
| and her    | <ul> <li>Reverse/forward chapter search*1 (No sound can be heard.)</li> <li>Slow motion*2 during pause (No sound can be heard.)</li> <li>DVD-VR: Reverse slow motion does not work.</li> </ul> | MPEG: Reverse/forward track search *4 (No<br>sound can be heard.)  |
| (( i> i )) | [Press] Select chapter (during play or pause)<br>[Hold] Reverse/fast-forward chapter search* <sup>3</sup>  | [Press] Select track<br>[Hold] MPEG: Reverse/fast-forward track<br>search* <sup>5</sup> (No sound can be heard.) |
| (( • • ))  | <ul> <li>DVD-Video: Select title (during play or pause)</li> <li>DVD-VR: Select program<br/>Select playlist (during play or pause)</li> </ul>  | Select folder  |
|            | _  | <ul> <li>MPEG: Skip back or forward the scenes</li> <li>MPEG: Select chapter</li> </ul>                          |

\*1 Search speed:  $\times 2 \Longrightarrow \times 5 \Longrightarrow \times 10 \Longrightarrow \times 20 \Longrightarrow \times 60$ 

#### \*2 Slow motion speed: $1/32 \Rightarrow 1/16 \Rightarrow 1/8 \Rightarrow 1/4 \Rightarrow 1/2$

- \*3 Search speed:  $\times 2 \Rightarrow \times 10$
- \*4 Search speed:  $\rightarrow$  1  $\Rightarrow$   $\rightarrow$  2  $\Rightarrow$   $\rightarrow$  3
- \*5 Search speed:  $\rightarrow$  1  $\Rightarrow$   $\rightarrow$  2

| Button     | CVCD  | CMP3/<br>WMA/WAV  | CD  |
|------------|---|---|---|
|            | Stop play   | Stop play   | Stop play   |
|            |   | Start play/Pause (if pressed<br>during play)                          | Start play/Pause (if pressed<br>during play)                          |
| and the    | <ul> <li>Reverse/forward track search*1</li> <li>Forward slow motion*2<br/>during pause (No sound can<br/>be heard.)</li> <li>Reverse slow motion does not<br/>work.</li> </ul> | Reverse/forward track search*1  | Reverse/forward track search *1                                       |
| (( iš ž )) | [Press] Select track<br>[Hold] Reverse/fast-forward<br>track search *3 (No<br>sound can be heard.)  | [Press] Select track<br>[Hold] Reverse/fast-forward<br>track search*3 | [Press] Select track<br>[Hold] Reverse/fast-forward<br>track search*3 |
| (( • • ))  | _   | Select folder   | _   |

<sup>\*1 - \*3:</sup> See page 15.

#### Searching for chapter/title/program/playlist/folder/track directly (DVD/JPEG/MPEG Video/ MP3/WMA/WAV/CD)

1 While holding **SHIFT**, press **DIRECT** repeatedly to select the desired search mode.

| DVD-Video:       | $\rightarrow CHAP \rightarrow - \rightarrow TITLE \rightarrow - \rightarrow Canceled \rightarrow - Canceled \rightarrow Canceled \rightarrow$ |
|------------------|---|
| DVD-VR:          | $\vdash CHAP \twoheadrightarrow \longrightarrow PG/PL \twoheadrightarrow \longrightarrow Canceled \longrightarrow$  |
| JPEG/MPEG Video: | $\vdash TRACK \twoheadrightarrow \twoheadrightarrow FOLDER \twoheadrightarrow \twoheadrightarrow Canceled$  |
| MP3/WMA/WAV:     | $\rightarrow \text{Track Search} \rightarrow \rightarrow \text{Folder Search} \rightarrow \rightarrow \text{Canceled}$  |
| CD:              | $\rightarrow$ Track Search – – $\rightarrow$ Canceled –   |

- 2 While holding SHIFT, press the number buttons (0 9) to enter the desired number.
- 3 Press ENT (enter) to confirm.

- For JPEG/MPEG Video/MP3/WMA/WAV, track is searched within the same folder.
- For DVD-VR, program/playlist search is possible during Original program playback (PG)/Playlist playback (PL).
- To erase a misentry, press **CLR** (clear) while holding **SHIFT**.
- To return to the previous screen, press **RETURN**.

#### <u>Using menu driven features... (DVD-Video/</u> <u>DVD-VR)</u>

- 1 Press **TOP MENU/DVD MENU** to enter the menu screen.
- Press △/▽/⊲/▷ to select an item you want to start play.
- 3 Press ENT (enter) to confirm.

#### Canceling the PBC playback... (VCD)

- 1 During stop, press **DIRECT** while holding **SHIFT**.
- ☑ Hold SHIFT, then press the number buttons (0 − 9) to enter the desired number.
- 3 Press ENT (enter) to confirm.
- To resume PBC, press TOP MENU/DVD MENU.

#### Operations using the on-screen bar (DVD/DVD-VR/JPEG/MPEG Video/VCD)

These operations are possible on the monitor using the remote controller.

# 1 Show the on-screen bar (see the right column).

(twice)

2 Select an item.



#### 3 Make a selection.

If pop-up menu appears...



- To cancel pop-up menu, press RETURN.
- For entering time/numbers, see the following.

#### Entering time/numbers

Press  $\triangle / \bigtriangledown$  to change the number, then press  $\lhd / \triangleright$  to move to the next entry.

- Each time you press △/▽, the number increases/ decreases by one value.
- After entering the numbers, press ENT (enter).
- It is not required to enter the zero and tailing zeros (the last two digits in the example below).

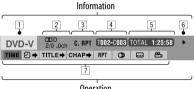
Ex.: Time search

**DVD**: \_:\_\_:\_ (Ex.: 1:02:00)

Press  $\triangle$  once, then  $\triangleright$  twice to go to the third entry,  $\triangle$  twice, then press **ENT** (enter).

### <u>On-screen bar</u>





Operation

- 1 Disc type
- 2 DVD-Video: Audio signal format type and channel
  - VCD:PBC
- 3 Playback mode\*1

| DVD-Video:  | T. RPT:  | Title repeat   |
|-------------|----------|----------------|
|             | C. RPT:  | Chapter repeat |
| DVD-VR:     | C. RPT:  | Chapter repeat |
|             | PG. RPT: | Program repeat |
| JPEG:       | F. RPT:  | Folder repeat  |
| MPEG Video: | T. RPT:  | Track repeat   |
|             | F. RPT:  | Folder repeat  |
|             | A. RND:  | All random     |
|             | F. RND:  | Folder random  |
| VCD*2:      | T. RPT:  | Track repeat   |
|             | A. RND:  | All random     |
|             |          |                |

| 4 | Playback information |
|---|----------------------|
|---|----------------------|

| T002-C003                     | Current title/chapter    |
|-------------------------------|--------------------------|
| PG <b>001</b><br>C <b>002</b> | Current program/chapter  |
| PL <b>001</b><br>C <b>002</b> | Current playlist/chapter |
| TRACK 01                      | Current track            |

F001-T001 Current folder/track

5 Time indication

T. REM

TIME

REM

- Elapsed playing time of the disc (For DVD-Video, elapsed playing time of the current title/program/playlist.)
- DVD-Video/DVD-VR: Remaining title/ program/playlist time
  - VCD: Remaining disc time
- Elapsed playing time of the current chapter/track\*3
- Remaining time of the current chapter/track\*3
- 6 Playback status

| •     | Play                        |
|-------|-----------------------------|
| ▶/◀   | Forward/reverse search      |
| ▶ / ◀ | Forward/reverse slow-motion |
| н     | Pause                       |
|       | Stop                        |

- 7 Operation icons
  - TIME Change time indication (see 5) D → Time Search (Enter the elapsed playing time of the current title/ program/playlist or of the disc.) TITLE→ Title Search (by its number) CHAP→ Chapter Search (by its number) TRACK→ Track Search (by its number) Change the audio language or audio channel
  - Change or turn off the subtitle language
     Change the view angle
     RPT Repeat play\*1
  - RND Random play\*1
- \*1 For repeat play/random play, see also page 14.
- \*2 While PBC is not in use.
- \*<sup>3</sup> Not applicable for DVD-VR.

#### Removing the on-screen bar

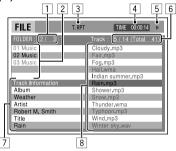


# Operations using the control screen (JPEG/MPEG Video/MP3/WMA/WAV/CD)

These operations are possible on the monitor using the remote controller.

#### 1 Show the control screen.

JPEG/MPEG Video: Press ■ during play. MP3/WMA/WAV/CD: Automatically appear during play.



Ex.: MP3/WMA/WAV disc

- 1 Current folder number/total folder number
- 2 Folder list with the current folder selected
- 3 Selected playback mode
- 4 Elapsed playing time of the current track
- 5 Operation mode icon (  $\triangleright$ ,  $\blacksquare$ ,  $\blacksquare$ ,  $\blacksquare$ ,  $\triangleright$ ,  $\blacktriangleleft$ )
- 6 Current track number/total number of tracks in the current folder (total number of tracks on the disc)
- 7 Track information
- 8 Track list with the current track selected

# 2 Select "Folder" column or "Track" column (except for CD).



#### **3** Select a folder or track.



#### 4 Start playback.

JPEG/MPEG Video: Press ENT (enter) or ►/II. MP3/WMA/WAV/CD: Playback starts automatically.

#### Selecting a playback mode

- See also page 14.
- 1 While control screen is displayed...





Playback mode selection screen appears on the folder list section of the control screen.

2 Select a playback mode.





3 Select an item.



| EAT    | FOLDER* | : | Repeat current folder   |
|--------|---------|---|---|
| REPEAT | TRACK   | : | Repeat current track  |
| ۷      | ALL     | : | Randomly play all tracks  |
| RANDOM | FOLDER* | : | Randomly play all tracks of<br>current folder, then tracks of<br>next folders |

- To cancel repeat play or random play, select "REPEAT OFF" or "RANDOM OFF."
- \* Not selectable for CD.
- 4 Confirm the selection.



# Operations using the list screen

These operations are possible on the monitor using the remote controller.

Before playing, you can display the folder list/track list to confirm the contents and start playing a track.

#### List screen (JPEG/MPEG Video/MP3/WMA/ WAV)

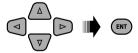
#### 1 Display the folder list while stop.

| 1               | 2            |          | 3         |  |
|-----------------|--------------|----------|-----------|--|
| Folder: 153/    | 240 Track:15 | 4/198    | Page: 4/6 |  |
| fol130          | fo 140       | fo1150   | fol160    |  |
| fo[131          | fo[141       | fo[151   | fo 161    |  |
| fol132          | fol142       | fol152   | fol162    |  |
| fol133          | fo 143       | fol153 🗢 | fe 163    |  |
| fo 134          | fo 144       | fol154   | fo 164    |  |
| fol135          | fo 145       | fo 155   | fo 165    |  |
| fol136          | fo1146       | fol156   | fo 166    |  |
| fo <b>l</b> 137 | fol147       | fol157   | fo 167    |  |
| fol138          | fo 148       | fol158   | fo 168    |  |
| fol139          | fol149       | fol159   | fo 169    |  |
|                 |              |          | 4         |  |

Ex.: Folder list

- 1 Current folder number/total folder number
- 2 Current track number/total number of tracks in the current folder
- 3 Current page/total number of the pages included in the list
- [4] Current folder/track (highlighted bar)

#### 2 Select an item from the folder list.



- Track list of the selected folder appears.
- To go back to the folder list, press **RETURN**.

#### **3** Select a track to start playing.



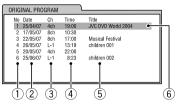
• MP3/WMA/WAV: Control screen appears (see page 18).

#### List screen (DVD-VR)

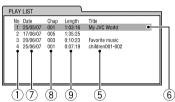
You can use ORIGINAL PROGRAM or PLAY LIST screen anytime while playing DVD-VR with its data recorded.

1 Select a list screen.









- ① Program/playlist number
- ② Recording date
- ③ Recording source (TV station, the input terminal of the recording equipment, etc.)
- ④ Start time of recording
- 5 Title of the program/playlist\*
- 6 Current selection (highlighted bar)
- ⑦ Creating date of playlist
- ⑧ Number of chapters
- 9 Playback time
- \* The title of the original program or playlist may not be displayed depending on the recording equipment.
- 2 Select an item from the list.



### 🔳 Disc setup menu

These operations are possible on the monitor using the remote controller.

1 Enter the disc setup menu while stop.

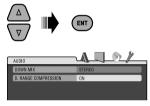


| LANGUAGE           |         |
|--------------------|---------|
| MENU LANGUAGE      | ENGLISH |
| AUDIO LANGUAGE     | ENGLISH |
| SUBTITLE           | ENGLISH |
| ON SCREEN LANGUAGE | ENGLISH |

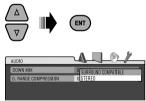
2 Select a menu.

⊳

- → LANGUAGE → PICTURE → OTHER → AUDIO →
- **3** Select an item you want to set up.



- To cancel pop-up menu, press RETURN.
- 4 Select an option.



#### To return to normal screen

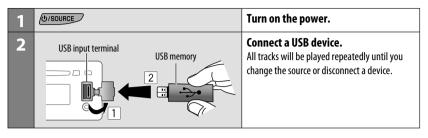


| Menu   | ltem                    | Setting  |  |  |
|--|-------------------------|--|--|--|
|  | MENU<br>LANGUAGE        | Select the initial disc menu language. Refer also to "Language codes" on page 31.  |  |  |
| ANGUAGE  | AUDIO<br>LANGUAGE       | Select the initial audio language. Refer also to "Language codes" on page 31.  |  |  |
| LANG   | SUBTITLE                | Select the initial subtitle language or remove the subtitle (OFF). Refer also to "Language codes" on page 31.  |  |  |
|  | ON SCREEN<br>LANGUAGE   | Select the language for the on screen display.   |  |  |
| PICTURE  | MONITOR TYPE            | Select the monitor type to watch a wide screen picture on your monitor.<br>16:9 4:3 LETTERBOX 4:3 PAN SCAN   |  |  |
| PIC  | OSD POSITION            | Select the on-screen bar position on the monitor.  |  |  |
|  |                         | <ul> <li>1 : Higher position</li> <li>2 : Lower position (Guidance below the disc setup menu will disappear.)</li> </ul>   |  |  |
| through the LINE OUT jacks.<br>• SURROUND COMPATIBLE : Selection of the Surrest of the Surrest of Sur |                         | When playing back a multi-channel disc, this setting affects the signals reproduced through the LINE OUT jacks.         • SURROUND COMPATIBLE       : Select to enjoy multi-channel surround audio by connecting an amplifier compatible with Dolby Surround.         • STEREO       : Normally select this. |  |  |
| AU   | D. RANGE<br>Compression | You can enjoy a powerful sound at low or middle volume levels while playing a Dolby Digital software.         • AUTO       : Select to apply the effect to multi-channel encoded software (excluding 1-channel and 2-channel software).         • ON       : Select to always use this function.             |  |  |
| AUDIO     STILL PICTURE     VIDEO  |                         | • STILL PICTURE : Play JPEG files.   |  |  |
| OTHER  | FILE TYPE (USB)         | Select playback file type when a disc contains different types of files.         • AUDIO       : Play MP3/WMA/WAV files.         • STILL PICTURE       : Play JPEG files.         • VIDEO       : Play MPEG Video files.         • AUDIO + VIDEO       : Play MPEG Video files.                              |  |  |

# **USB** operations

You can connect a USB mass storage class device (except HDD) to the unit.

#### This unit can play JPEG/MPEG Video/MP3/WMA/WAV tracks stored in a USB mass storage class device (such as a USB memory, Digital Audio Player, etc.).



Turn on the monitor to watch the playback picture if you play back an JPEG/MPEG file. You can also control playback by referring to the monitor screen. (See also pages 18 – 20.)

See pages 15 – 21 for operation using the remote controller.

If " $\bigcirc$ " appears on the monitor when pressing a button, the unit cannot accept the operation you have tried to do.

 In some cases, without showing "\ointy," operations will not be accepted.

You can operate the USB device in the same way you operate the files on a disc. (See pages 12 - 21.)

#### If a USB device has been attached...

#### 也/SOURCE

Playback starts from where it has been stopped previously.

• If a different USB device is currently attached, playback starts from the beginning.

#### Stop playing and detaching the USB device

Straightly pull it out from the USB input terminal.

 "NO USB" appears. Press O/SOURCE to listen to another playback source.

#### Cautions:

- Avoid using the USB device if it might hinder your safety driving.
- While "READING" is shown on the display:
  - Do not pull out and attach the USB device repeatedly.
  - Do not pull out or attach another USB device.
- Do not start the car engine if a USB device is connected.
- This unit may not be able to play the files depending on the type of USB device.
- Operation and power supply may not work as intended for some USB devices.
- You cannot connect a computer to the USB input terminal of the unit.
- Make sure all important data has been backed up to avoid losing the data.
- Do not leave a USB device in the car, expose to direct sunlight, or high temperature to avoid deformation or cause damages to the device.

- Some USB devices may not work immediately after you turn on the power.
- The detect time and response time may be very long for some USB devices (such as Digital Audio Player, etc.).
- For more details about USB operations, see pages 29 and 30.

# Listening to the other external components

You can connect an external component to the AUX (auxiliary) input jack on the control panel. • For details, refer also to the instructions supplied with the adapter or external components.

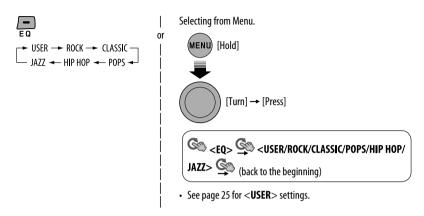
**Preparation:** Make sure <**AUX ON**> is selected for the <**SRC SELECT** $> \rightarrow <$ **AUX IN**> setting, see page 27.

| 1 | (U/SOURCE | Select "AUX IN."  |
|---|-----------|---|
| 2 | —         | Turn on the connected component and start playing the source. |
| 3 |           | Adjust the volume.  |

#### Connecting an external component to the AUX input jack



You can select a preset sound mode suitable to the music genre.



#### Preset value setting for each sound mode

|               | Preset value |       |      |         |       |       |          |       |       |            |  |
|---------------|--------------|-------|------|---------|-------|-------|----------|-------|-------|------------|--|
| Sound<br>mode |              | BASS  |      | MIDDLE  |       |       | TREBLE   |       |       | LOUD       |  |
| moue          | Freq.        | Level | Q    | Freq.   | Level | Q     | Freq.    | Level | Q     | (loudness) |  |
| USER          | 60 Hz        | 00    | Q1.0 | 1.0 kHz | 00    | Q1.0  | 10.0 kHz | 00    | Q1.25 |            |  |
| ROCK          | 100 Hz       | +03   | Q1.0 | 1.0 kHz | 00    | Q1.25 | 10.0 kHz | +02   | Q1.25 |            |  |
| CLASSIC       | 80 Hz        | +01   | Q1.0 | 1.0 kHz | 00    | Q1.25 | 10.0 kHz | +03   | Q1.25 | OFF        |  |
| POPS          | 100 Hz       | +02   | Q1.0 | 1.0 kHz | +01   | Q1.25 | 10.0 kHz | +02   | Q1.25 | UFF        |  |
| HIP HOP       | 60 Hz        | +04   | Q1.0 | 1.0 kHz | -02   | Q1.0  | 10.0 kHz | +01   | Q1.25 |            |  |
| JAZZ          | 80 Hz        | +03   | Q1.0 | 1.0 kHz | 00    | Q1.25 | 10.0 kHz | +03   | Q1.25 |            |  |

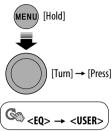
Freq.: Frequency

Q: Q-slope

### Storing your own sound mode

You can store your own adjustments in memory.

**1** Select <USER>.



2 While <USER> is shown on the display...

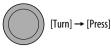


**3** Select a tone.

$$[Turn] \rightarrow [Press]$$

$$\blacktriangleright BASS \leftrightarrow MIDDLE \leftrightarrow TREBLE$$

4 Adjust the sound elements of the selected tone.



- 1 Adjust the frequency.
- 2 Adjust the level.
- 3 Adjust the Q-slope.

| Sound     | Range/selectable item |         |          |  |  |  |  |
|-----------|-----------------------|---------|----------|--|--|--|--|
| element   | BASS                  | MIDDLE  | TREBLE   |  |  |  |  |
| Frequency | 60 Hz                 | 0.5 kHz | 7.5 kHz  |  |  |  |  |
|           | 80 Hz                 | 1.0 kHz | 10.0 kHz |  |  |  |  |
|           | 100 Hz                | 1.5 kHz | 12.5 kHz |  |  |  |  |
|           | 120 Hz                | 2.5 kHz | 15.0 kHz |  |  |  |  |
| Level     | -06 to                | -06 to  | -06 to   |  |  |  |  |
|           | +06                   | +06     | +06      |  |  |  |  |
| Q         | Q0.5                  | Q0.75   | Q0.75    |  |  |  |  |
|           | Q1.0                  | Q1.0    | Q1.25    |  |  |  |  |
|           | Q1.5                  | Q1.25   |          |  |  |  |  |
|           | Q2.0                  | Q1.5    |          |  |  |  |  |

# 5 Repeat steps 3 and 4 to adjust other sound characteristics.

The adjustment made will be stored automatically.

| Menu  | Menu operations   |  |  |  |  |  |  |
|---|---|--|--|--|--|--|--|
|   | t <b>he menu.</b><br>Hold]  | 2 Select the desired item.<br>[Turn] → [Press] | <ul> <li><b>3</b> Repeat step 2 if necessary.</li> <li>To confirm the setting, press the control dial.</li> <li>To return to the previous menu, press BACK.</li> <li>To exit from the menu, press DISP or MENU.</li> </ul> |  |  |  |  |
| Category M  | Category Menu item Selectable setting, [reference page], Initial: <u>Underlined</u> |  |  |  |  |  |  |
| DEMO • DEMO ON : Display demonstration will be activated automati |   |  |  |  |  |  |  |

| DEMO                  | • DEMO ON | : Display demonstration will be activated automatically if |
|-----------------------|-----------|--|
| Display demonstration |           | no operation is done for about 20 seconds, [4].            |
|                       | DEMO OFF  | : Cancels.   |

| Category               | Menu item  | Selectable setting, [reference page], Initial: Underlined   |  |  |  |  |  |
|------------------------|--|---|--|--|--|--|--|
| CLOCK                  | <b>CLOCK SET</b><br>Clock setting                    | : Adjust the hour, then the minute, [4].<br>(Initial: <u>1:00</u> )   |  |  |  |  |  |
| <b>EQ</b><br>Equalizer |  | : Select a preset sound mode suitable to the music genre.<br>USER, ROCK, CLASSIC, POPS, HIP HOP, JAZZ   |  |  |  |  |  |
|                        | DIMMER   | DIMMER AUTO       : Dims the display when you turn on the headlights.*1         DIMMER ON       : Dims the display and button illumination.         DIMMER OFF       : Cancels.   |  |  |  |  |  |
| DISPLAY                | SCROLL*2   | SCROLL ONCE       : Scrolls the displayed information once.         SCROLL AUTO       : Repeats scrolling (at 5-second intervals).         SCROLL OFF       : Cancels.         Pressing DISP for more than one second can scroll the display regardless of the setting.   |  |  |  |  |  |
|                        | TAG DISPLAY  | TAG ON       : Shows the Tag information while playing MP3/WMA/WAV tracks.         TAG OFF       : Cancels.   |  |  |  |  |  |
|                        | VIDEO*3<br>Video format                              | PAL       : Select this if your monitor is of the PAL color system.         NTSC       : Select this if your monitor is of the NTSC color system.   |  |  |  |  |  |
|                        | <b>SSM</b> *4<br>Strong-station<br>Sequential Memory | <ul> <li>MONO ON : Activate monaural mode to improve FM reception, but stereo effect will be lost, [10].</li> <li>MONO OFF : Restore the stereo effect.</li> </ul>  |  |  |  |  |  |
| TUNER                  | <b>MONO</b> *4<br>Monaural mode                      | MONO ON       : Activate monaural mode to improve FM reception, but stereo effect will be lost, [10].         MONO OFF       : Restore the stereo effect.   |  |  |  |  |  |
| 101                    | IF BAND<br>Intermediate<br>frequency band            | <ul> <li>AUTO         <ul> <li>Increases the tuner selectivity to reduce interference<br/>noises between adjacent stations. (Stereo effect may be<br/>lost.)</li> <li>WIDE             <ul> <li>Subject to interference noises from adjacent stations, but<br/>sound quality will not be degraded and the stereo effect<br/>will remain.</li> </ul> </li> </ul> </li> </ul> |  |  |  |  |  |

\*1 The illumination control lead connection is required. (See "Installation/Connection Manual.")

\*2 Some characters or symbols will not be shown correctly (or will be blanked) on the display.

\*<sup>3</sup> The newly selected video format takes effect only after you turn on the power again or change the source.

\*4 Displayed only when the source is "FM."

| Category   | Menu item                                | Selectable settin                             | ıg,    | [reference page], Initial: Underlined   |
|------------|--|---|--------|---|
|            | FADER*5                                  | R06 – F06 [ <u>00]</u>                        | :      | Adjust the front and rear speaker output balance.   |
|            | BALANCE                                  | L06 – R06 [ <u>00</u> ]                       | :      | Adjust the left and right speaker output balance.   |
|            | <b>LOUD</b><br>Loudness                  | <ul> <li>LOUD ON</li> <li>LOUD OFF</li> </ul> |        | Boost low and high frequencies to produce a well-balanced sound at a low volume level. Cancels.   |
| AUDIO      | <b>VOL ADJUST</b><br>Volume adjust       | VOL ADJ -05<br>VOL ADJ +05<br>[VOL ADJ 00]    | :      | <ul> <li>Preset the volume adjustment level of each source (except FM), compared to the FM volume level. The volume level will automatically increase or decrease when you change the source.</li> <li>Before making an adjustment, select the source you want to adjust.</li> <li>"VOL ADJ FIX" appears on the display if "FM" is selected as the source.</li> </ul> |
|            | <b>AUX ADJUST</b> *6<br>Auxiliary adjust | <u>AUX ADJ 00</u> —<br>AUX ADJ 05             | :      | Adjust the auxiliary input level to avoid the sudden<br>increase of the output level when changing the source to<br>external component connected to the AUX input jack on<br>the control panel.   |
|            | BEEP<br>Key touch tone                   | • <u>BEEP ON</u><br>• BEEP OFF                | :      | Activates the keypress tone.<br>Deactivates the keypress tone.  |
|            | AMP GAIN*7<br>Amplifier gain<br>control  | LOW POWER     HIGH POWER                      |        | VOLUME 00 – VOLUME 30 (Select if the maximum power<br>of each speaker is less than 50 W to prevent damaging the<br>speaker.)<br>VOLUME 00 – VOLUME 50   |
| ELECT      | <b>AM</b> *8<br>AM station               | • <u>AM ON</u><br>• AM OFF                    | :      | Enable " $AM$ " in source selection, [6].<br>Disable " $AM$ " in source selection.  |
| SRC SELECT | AUX IN*9<br>Auxiliary input              | • <u>AUX ON</u><br>• AUX OFF                  | :<br>: | Enable "AUX IN" in source selection, [6].<br>Disable "AUX IN" in source selection.  |

\*5 If you are using a two-speaker system, set the fader level to <00>.

\*6 Displayed only when <AUX IN> is set to <AUX ON>.

\*7 The volume level automatically changes to "VOLUME 30" if you change to <**LOW POWER**> with the volume level set higher than "VOLUME 30."

\*\* Displayed only when any source other than "  $AM^{\prime\prime}$  is selected.

\*9 Displayed only when any source other than "  $\mathbf{AUX}$   $\mathbf{IN}$  " is selected.

# More about this unit

# 🔲 General

- If you turn off the power while listening to a disc, disc play will start automatically, next time you turn on the power.
- If you change the source, playback also stops (without ejecting the disc).
   Next time you select "DISC" for the playback source, disc play starts from where it has been stopped previously.
- When a disc is inserted upside down, "PLEASE" and "EJECT" appear alternately on the display. Press ▲ to eject the disc.
- If the ejected disc is not removed within 15 seconds, the disc is automatically inserted again into the loading slot to protect it from dust. Playback starts automatically.
- After ejecting a disc or disconnect a USB device, "NO DISC" or "NO USB" appears and you cannot operate some of the buttons. Insert another disc, reconnect a USB device, or press O/SOURCE to select another playback source.
- If no operation is done for about 60 seconds after pressing MENU button or control dial, the operation will be canceled.

# Tuner operations

#### **Storing stations in memory**

- During SSM search...
  - All previously stored stations are erased and the stations are stored anew.
  - When SSM is over, the station stored in the lowest preset number will be automatically tuned in.
- When storing a station manually, the previously preset station is erased when a new station is stored in the same preset number.

### Disc operations

#### General

- In this manual, words "track" and "file" are interchangeably used.
- This unit can only play back audio CD (CD-DA) files if different type of files are recorded in the same disc.

#### Playing Recordable/Rewritable discs

- This unit can recognize a total of 5 000 files and 250 folders (a maximum of 999 files per folder).
- This unit can recognize a total 25 characters for file/ folder names.
- Use only "finalized" discs.
- This unit can play back multi-session discs; however, unclosed sessions will be skipped while playing.
- This unit may be unable to play back some discs or files due to their characteristics or recording conditions.
- Rewritable discs may require a longer readout time.

#### Playing DVD-VR files

 For details about DVD-VR format and playlist, refer to the instructions supplied with the recording equipment.

#### **Playing JPEG files**

- This unit can play back JPEG files with the extension code <.jpg>, or <.jpeg>.
- This unit can play back JPEG files that are at 32 x 32 to 8 192 x 7 680 resolution. It may take time to display the file depending on its resolution.
- This unit can play back baseline JPEG files.
   Progressive JPEG files or lossless JPEG files cannot be played.

#### Playing MPEG Video files

- This unit can play back MPEG Video files with the extension code <.mpg>, <.mpeg>, or <.mod>\*.
- \* <.mod> is an extension code used for the MPEG-2 files recorded by JVC Everio camcorders.
- The stream format should conform to MPEG system/ program stream.

The file format should be MP@ML (Main Profile at Main Level)/SP@ML (Simple Profile at Main Level)/ MP@LL (Main Profile at Low Level).

- Audio stream should conform to MPEG1 Audio Layer 2.
- The maximum bit rate for video signals (average) is 4 Mbps.

#### Playing MP3/WMA/WAV files

- The maximum number of characters for folder and file names is 25 characters; 128 characters for MP3/ WAV and 64 characters for WMA tag information.
- This unit can play back files with the extension code <.mp3>, <.wma>, or <.wav> (regardless of the letter case—upper/lower).
- This unit can show the names of albums, artists (performer), and Tag (Version 1.0, 1.1, 2.2, 2.3, or 2.4) for the MP3/WMA/WAV files.
- This unit can display only one-byte characters. No other characters can be correctly displayed.
- This unit can play back files recorded in VBR (variable bit rate).

Files recorded in VBR have a discrepancy in elapsed time indication.

- This unit cannot play back the following files:
  - MP3 files encoded with MP3i and MP3 PRO format.
  - MP3 files encoded with Layer 1/2.
  - WMA files encoded with lossless, professional, and voice format.
  - WMA files which are not based upon Windows Media<sup>®</sup> Audio.
  - WMA files copy-protected with DRM.
  - Files which have the data such as ATRAC3, etc.
  - AAC files and OGG files.

#### Disc setup menu

- When the language you have selected is not recorded on a disc, the original language is automatically used as the initial language. In addition, for some discs, the initial languages settings will not work as you set due to their internal disc programming.
- When you select "16:9" for a picture whose aspect ratio is 4:3, the picture slightly changes due to the process for converting the picture width.
- Even if "4:3 PAN SCAN" is selected, the screen size may become "4:3 LETTERBOX" for some discs.

### USB operations

- Connecting a USB device automatically changes the source to "USB."
- While playing from a USB device, the playback order may differ from the one from other players.
- This unit may be unable to play back some USB devices or some files due to their characteristics or recording conditions.
- Depending on the shape of the USB devices and connection ports, some USB devices may not be attached properly or the connection might be loose.
- When connecting a USB mass storage class device, refer also to its instructions.
- Connect one USB mass storage class device to the unit at a time. Do not use a USB hub.
- This unit is compatible with the USB Full-Speed.
- If the connected USB device does not have the correct files, "CANNOT PLAY" appears.
- This unit can play back MP3 files recorded in VBR (variable bit rate).
- The maximum number of characters for folder and file names is 25 characters; 128 characters for MP3/ WAV and 64 characters for WMA Tag information.
- This unit can recognize a total of 5 000 files and 250 folders (999 files per folder).
- The unit cannot recognize a USB mass storage class device whose rating is other than 5 V and exceeds 500 mA.
- USB devices equipped with special functions such as data security functions cannot be used with the unit.

- Do not use a USB device with 2 or more partitions.
- When connecting with a USB cable, use the USB 2.0 cable.
- This unit may not recognized a USB device connected through a USB card reader.
- This unit may not play back files in a USB device properly when using a USB extension cord.
- This unit cannot assure proper functions or supply power to all types of USB devices.
- For MPEG1/2 files: The maximum bit rate for video signals (average) is 2 Mbps.

### 📕 Menu operations

 <AUTO> setting for <DIMMER> may not work correctly on some vehicles, particularly on those having a control dial for dimming.

In this case, change the **<DIMMER**> setting to any other than **<AUTO**>.

#### On-screen guide icons

During playback, the following guide icons may appear for a while on the monitor.

| l |  |
|---|--|

24

- : Playback : Pause
- : DVD-Video/DVD-VR/VCD: Forward

slow motion

- : DVD-Video: Reverse slow motion
- Forward search
  - : Reverse search

DVD: The following icons appear at the beginning of a scene containing:

- : Multi-subtitle languages
- : Multi-audio languages
- : Multi-angle views

#### Sounds reproduced through the rear analog terminals (Speaker out/LINE OUT)

2-channel signal is emitted. When playing a multichannel encoded disc, multi-channel signals are downmixed. (AUDIO—DOWN MIX: see page 21.)

- Manufactured under license from Dolby Laboratories. Dolby and the double-D symbol are trademarks of Dolby Laboratories.
- "DVD Logo" is a trademark of DVD Format/Logo Licensing Corporation registered in the US, Japan and other countries.
- Microsoft and Windows Media are either registered trademarks or trademarks of Microsoft Corporation in the United States and/or other countries.
- This product incorporates copyright protection technology that is protected by U.S. patents and other intellectual property rights. Use of this copyright protection technology must be authorized by Macrovision, and is intended for home and other limited viewing uses only unless otherwise authorized by Macrovision. Reverse engineering or disassembly is prohibited.

#### Language codes

| Code | Language        | Code | Language     | Code | Language         | Code | Language           | Code | Language   |
|------|-----------------|------|--------------|------|------------------|------|--------------------|------|------------|
| AA   | Afar            | FA   | Persian      | KK   | Kazakh           | NO   | Norwegian          | ST   | Sesotho    |
| AB   | Abkhazian       | FI   | Finnish      | KL   | Greenlandic      | 0C   | Occitan            | SU   | Sundanese  |
| AF   | Afrikaans       | FJ   | Fiji         | KM   | Cambodian        | 0M   | (Afan) Oromo       | SW   | Swahili    |
| AM   | Ameharic        | FO   | Faroese      | KN   | Kannada          | OR   | Oriya              | TA   | Tamil      |
| AR   | Arabic          | FY   | Frisian      | КО   | Korean (KOR)     | PA   | Panjabi            | TE   | Telugu     |
| AS   | Assamese        | GA   | Irish        | KS   | Kashmiri         | PL   | Polish             | TG   | Tajik      |
| AY   | Aymara          | GD   | Scots Gaelic | KU   | Kurdish          | PS   | Pashto, Pushto     | TH   | Thai       |
| AZ   | Azerbaijani     | GL   | Galician     | KY   | Kirghiz          | QU   | Quechua            | TI   | Tigrinya   |
| BA   | Bashkir         | GN   | Guarani      | LA   | Latin            | RM   | Rhaeto-<br>Romance | ТК   | Turkmen    |
| BE   | Byelorussian    | GU   | Gujarati     | LN   | Lingala          | RN   | Kirundi            | TL   | Tagalog    |
| BG   | Bulgarian       | HA   | Hausa        | LO   | Laothian         | RO   | Rumanian           | TN   | Setswana   |
| BH   | Bihari          | HI   | Hindi        | LT   | Lithuanian       | RW   | Kinyarwanda        | TO   | Tonga      |
| BI   | Bislama         | HR   | Croatian     | LV   | Latvian, Lettish | SA   | Sanskrit           | TR   | Turkish    |
| BN   | Bengali, Bangla | HU   | Hungarian    | MG   | Malagasy         | SD   | Sindhi             | TS   | Tsonga     |
| BO   | Tibetan         | HY   | Armenian     | MI   | Maori            | SG   | Sangho             | TT   | Tatar      |
| BR   | Breton          | IA   | Interlingua  | MK   | Macedonian       | SH   | Serbo-Croatian     | TW   | Twi        |
| CA   | Catalan         | IE   | Interlingue  | ML   | Malayalam        | SI   | Singhalese         | UK   | Ukrainian  |
| C0   | Corsican        | IK   | Inupiak      | MN   | Mongolian        | SK   | Slovak             | UR   | Urdu       |
| CS   | Czech           | IN   | Indonesian   | MO   | Moldavian        | SL   | Slovenian          | UZ   | Uzbek      |
| CY   | Welsh           | IS   | lcelandic    | MR   | Marathi          | SM   | Samoan             | VI   | Vietnamese |
| DZ   | Bhutani         | IW   | Hebrew       | MS   | Malay (MAY)      | SN   | Shona              | VO   | Volapuk    |
| EL   | Greek           | JA   | Japanese     | MT   | Maltese          | SO   | Somali             | W0   | Wolof      |
| EO   | Esperanto       | JI   | Yiddish      | MY   | Burmese          | SQ   | Albanian           | XH   | Xhosa      |
| ET   | Estonian        | JW   | Javanese     | NA   | Nauru            | SR   | Serbian            | YO   | Yoruba     |
| EU   | Basque          | KA   | Georgian     | NE   | Nepali           | SS   | Siswati            | ZU   | Zulu       |

JVC bears no responsibility for any loss of data in the USB mass storage class device while using this System.

# Maintenance

### How to clean the connectors

Frequent detachment will deteriorate the connectors. To minimize this possibility, periodically wipe the connectors with a cotton swab or cloth moistened with alcohol, being careful not to damage the connectors.



Connectors

### Moisture condensation

Moisture may condense on the lens inside the unit in the following cases:

- After starting the heater in the car.
- · If it becomes very humid inside the car.

Should this occur, the unit may malfunction. In this case, eject the disc and leave the unit turned on for a few hours until the moisture has evaporated.

### How to handle discs

#### When removing a disc from its

**case**, press down the center holder of the case and lift the disc out, holding it by the edges.



Always hold the disc by the edges. Do not touch its recording surface.

When storing a disc in its case, gently insert the disc around the center holder (with the printed surface facing up).

• Make sure to store discs in cases after use.

# To keep discs clean

A dirty disc may not play correctly. If a disc does become dirty, wipe it with a soft cloth in a straight line from center to edge.



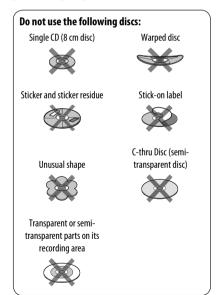
 Do not use any solvents (for example, conventional record cleaner, spray, thinner, benzine, etc.) to clean discs.

### To play new discs

New discs may have some rough spots around the inner and outer edges. If such a disc is used, this unit may reject the disc.



To remove these rough spots, rub the edges with a pencil or ball-point pen, etc.



What appears to be trouble is not always serious. Check the following points before calling a service center.

|                  | Symptom  | Remedy/Cause  |  |  |
|------------------|--|---|--|--|
| ral              | Sound cannot be heard from the speakers.   | <ul> <li>Adjust the volume to the optimum level.</li> <li>Make sure the unit is not muted/paused (see page 6).</li> <li>Check the cords and connections.</li> </ul> |  |  |
| General          | The unit does not work at all.   | Reset the unit (see page 3).  |  |  |
|                  | "AUX IN" cannot be selected.   | Check the $\langle$ <b>SRC SELECT</b> $\rangle \rightarrow \langle$ <b>AUX IN</b> $\rangle$ setting (see page 27).  |  |  |
|                  | SSM automatic presetting does not work.  | Store stations manually.  |  |  |
| FM/AM            | Static noise while listening to the radio.   | Connect the antenna firmly.   |  |  |
| FM               | "AM" cannot be selected.   | Check the $\langle$ <b>SRC SELECT</b> $\rangle \rightarrow \langle$ <b>AM</b> $\rangle$ setting (see page 27).  |  |  |
|                  | Disc cannot be played back.  | Insert the disc correctly.  |  |  |
|                  | Disc can be neither played back nor ejected.   | <ul><li> Unlock the disc (see page 12).</li><li> Eject the disc forcibly (see page 3).</li></ul>  |  |  |
| Discs in general | <ul> <li>Recordable/Rewritable discs cannot be<br/>played back.</li> <li>Tracks on the Recordable/Rewritable discs<br/>cannot be skipped.</li> </ul> | <ul> <li>Insert a finalized disc.</li> <li>Finalize the discs with the component which you have used for recording.</li> </ul>                                      |  |  |
| iscs i           | Disc cannot be recognized.   | Eject the disc forcibly (see page 3).   |  |  |
|                  | Sound and pictures are sometimes interrupted or distorted.   | <ul> <li>Stop playback while driving on rough roads.</li> <li>Change the disc.</li> <li>Check the cords and connections.</li> </ul>                                 |  |  |
|                  | No playback picture (DVD-Video/DVD-VR/<br>JPEG/MPEG/VCD) appears on the monitor.   | Parking brake wire is not connected properly. (See<br>Installation/Connection Manual.)  |  |  |

|                             | Symptom  | Remedy/Cause   |  |  |
|-----------------------------|--|--|--|--|
|                             | No picture appears on the monitor at all.  | <ul><li>Connect the video cord correctly.</li><li>Select a correct input on the monitor.</li></ul>   |  |  |
| Discs in general            | The monitor shows black and white wavy pictures (DVD-Video/DVD-VR/JPEG/MPEG/ VCD). | Select an appropriate video format (PAL/NTSC) for your monitor (see page 26).  |  |  |
| Disc                        | The left and right edges of the picture are missing on the monitor.                | Select "4:3 LETTERBOX" (see page 21).  |  |  |
|                             | "NO DISC" appears on the display.  | Insert a playable disc into the loading slot.  |  |  |
|                             | Disc cannot be played back.  | <ul> <li>Change the disc.</li> <li>Record the tracks using a compliant application in the appropriate discs (see page 5).</li> <li>Add the extension code &lt;.jpg&gt;, &lt;.jpeg&gt;, &lt;.mpg&gt;, &lt;.mpg&gt;, &lt;.mpg&gt;, &lt;.mpg&gt;, &lt;.wma&gt;, or &lt;.wav&gt; to the file names.</li> </ul> |  |  |
| WAV                         | Noise is generated.  | Skip to another track or change the disc.  |  |  |
| 3/WMA/                      | Tracks cannot play back as you have intended them to play.                         | Playback order is determined when files are recorded.  |  |  |
| JPEG/MPEG Video/MP3/WMA/WAV | Longer readout time is required.   | Readout time varies due to the complexity of the folder/file configuration. Do not use too many hierarchies and folders.   |  |  |
| EG/MPEG                     | No sound can be heard when picture is displayed while playing a MPEG Video file.   | Record the audio track using MPEG1 Audio Layer 2 as the audio stream for MPEG Video files.   |  |  |
| Idí                         | Elapsed playing time is not correct.   | This sometimes occurs during playback. This is caused by how the tracks are recorded.  |  |  |
|                             | "PLEASE" and "EJECT" appear alternately on the display.                            | Insert a disc that contains tracks of appropriate formats.   |  |  |
|                             | Correct characters are not displayed (e.g. album name).                            | This unit can only display letters (upper case), numbers, and a limited number of symbols. (See page 11.)  |  |  |

|  | Symptom   | Remedy/Cause  |
|--|---|---|
|  | Noise is generated.   | The track played back is not an MP3/WMA/WAV track. Skip<br>to another file. (Do not add the extension code <.mp3>,<br><.wma>, or <.wav> to non-MP3/WMA/WAV tracks.)   |
|  | "READING" keeps flashing on the display.  | <ul> <li>Readout time varies depending on the USB device.</li> <li>Do not use too many hierarchy or folders.</li> <li>Turn off the power then on again.</li> <li>Do not pull out or connect the USB device repeatedly while "READING" is displayed on the display.</li> </ul> |
|  | "CANNOT PLAY" appears on the display.   | Selected folder is an empty folder*. Select another folder<br>that contains MP3/WMA/WAV tracks.<br>* Folder that is physically empty or folder that contains data<br>but does not contain valid MP3/WMA/WAV track.  |
|  | Tracks/folders are not played back in the order you have intended.  | The playback order is determined by the write-in time stamp. The first track/folder written into the USB device will be the first track/folder for playback.  |
|  | While playing a track, sound is sometimes interrupted.  | The tracks have not been properly copied into the USB<br>device.<br>Copy tracks again into the USB device, and try again.   |
|  | <ul> <li>"CANNOT PLAY" appears on the display.</li> <li>"NO USB" appears on the display.</li> <li>The unit cannot detect the USB device.</li> </ul> | <ul> <li>Connect a USB device that contains tracks encoded in an appropriate format.</li> <li>Connect the USB device again.</li> </ul>  |
|  | "NOT SUPPORT" appears on the display and track skips.   | Check whether the track is a playable file format.  |
|  | "READ FAILED" appears on the display.   | The connected USB device may be malfunctioning, or may<br>not have been formatted correctly. The files included in the<br>USB device are corrupted.   |
|  | Correct characters are not displayed (e.g. album name).   | This unit can only display letters (upper case), numbers, and a limited number of symbols. (See page 11.)   |

USB device playback

# Specifications

|                         |  | -   |   |
|-------------------------|--|---|---|
| AUDIO AMPLIFIER SECTION | Maximum Power Output:                          | Front/Rear:                                 | 50 W per channel  |
|                         | Continuous Power Output<br>(RMS):              | Front/Rear:                                 | 19 W per channel into 4 $\Omega,$ 40 Hz to 20 000 Hz at no more than 0.8% total harmonic distortion |
|                         | Load Impedance:                                |   | 4 Ω (4 Ω to 8 Ω allowance)  |
|                         | Tone Control Range:                            | Bass:                                       | ±12 dB (60 Hz, 80 Hz, 100 Hz, 120 Hz)<br>Q0.5, Q1.0, Q1.5, Q2.0                                     |
|                         |  | Middle:                                     | ±12 dB (0.5 kHz, 1.0 kHz, 1.5 kHz,<br>2.5 kHz)<br>Q0.75, Q1.0, Q1.25, Q1.5                          |
|                         |  | Treble:                                     | ±12 dB (7.5 kHz, 10.0 kHz, 12.5 kHz,<br>15.0 kHz)<br>Q0.75, Q1.25                                   |
|                         | Signal-to-Noise Ratio:                         |   | 80 dB   |
|                         | Audio Output Level:                            | Line-Out Level/Impedance:                   | 2.5 V/20 kΩ load (full scale)   |
|                         |  | Output Impedance:                           | 1 kΩ  |
|                         | Color System:                                  |   | PAL/NTSC  |
|                         | Video Output (composite):                      |   | 1 Vp-p/75 Ω   |
|                         | Other Terminal: USB input terminal, AUX (auxil |   | iary) input jack, Antenna input   |
| TUNER SECTION           | Frequency Range:                               | FM:   | 87.5 MHz to 108.0 MHz   |
|                         |  | AM:   | 531 kHz to 1 602 kHz  |
|                         | FM Tuner:                                      | Usable Sensitivity:                         | 9.3 dBf (0.8 μV/75 Ω)   |
|                         |  | 50 dB Quieting Sensitivity:                 | 16.3 dBf (1.8 μV/75 Ω)  |
|                         |  | Alternate Channel Selectivity<br>(400 kHz): | 65 dB   |
|                         |  | Frequency Response:                         | 40 Hz to 15 000 Hz  |
|                         |  | Stereo Separation:                          | 40 dB   |
|                         |  |   |   |

Sensitivity:

Selectivity:

20 µV

40 dB

AM Tuner:

|                       | Signal Detection                 | on System: | Non-contact optical pickup (semico | nductor laser)  |
|-----------------------|----------------------------------|------------|------------------------------------|---|
|                       | Number of Channels:              |            |                                    | 2 channels (stereo)   |
|                       | Frequency Response:              |            | DVD, fs=48 kHz/96 kHz:             | 16 Hz to 22 000 Hz  |
|                       |                                  |            | CD, fs=44.1 kHz:                   | 16 Hz to 20 000 Hz  |
|                       | Dynamic Range:                   |            |                                    | 96 dB   |
|                       | Signal-to-Noise Ratio:           |            |                                    | 98 dB   |
| NOI                   | Wow and Flutter:                 |            |                                    | Less than measurable limit  |
| DVD/CD PLAYER SECTION | JPEG/MPEG<br>Video:              | Video:     | Max. Resolution:                   | 720 × 480 pixels (30 fps)<br>720 × 576 pixels (25 fps)                |
| PLA                   |                                  | Audio:     | Bit Rate:                          | 32 kbps – 320 kbps  |
| D/CD                  |                                  |            | Sampling Frequency: MPEG Video:    | 32 kHz, 44.1 kHz, 48 kHz  |
| DV                    | MP3:                             |            | Bit Rate:                          | 32 kbps – 320 kbps  |
|                       |                                  |            | Sampling Frequency:                | MPEG-1: 32 kHz, 44.1 kHz, 48 kHz<br>MPEG-2: 16 kHz, 22.05 kHz, 24 kHz |
|                       | WMA:                             |            | Bit Rate:                          | 32 kbps – 320 kbps  |
|                       |                                  |            | Sampling Frequency:                | 22.05 kHz, 32 kHz, 44.1 kHz, 48 kHz                                   |
|                       | WAV:                             |            | Quantization Bit Rate:             | 16 bit  |
|                       |                                  |            | Sampling Frequency:                | 44.1 kHz  |
|                       | USB Standard:                    |            |                                    | USB 1.1, USB 2.0  |
| z                     | Data Transfer Rate (Full Speed): |            | peed):                             | Max. 12 Mbps  |
| 데                     | Compatible Device:               |            |                                    | Mass storage class (except HDD)                                       |
| <b>JSB SECTION</b>    | Compatible File System:          |            |                                    | FAT 32/16/12  |
| 5                     | Playable Audio Format:           |            |                                    | JEPG/MPEG1/MPEG2/MP3/WMA/WAV  |
|                       | Max. Current:                    |            |                                    | DC 5 V <del></del> 500 mA   |
|                       | Power Require                    | ement:     | Operating Voltage:                 | DC 14.4 V (11 V to 16 V allowance)                                    |
|                       | Grounding System:                |            |                                    | Negative ground   |
| RAL                   | Allowable Operating Temperature: |            | perature:                          | 0°C to +40°C  |
| GENERAL               | Dimensions                       |            | Installation Size (approx.):       | 182 mm × 52 mm × 159 mm   |
| 0                     | $(W \times H \times D)$ :        |            | Panel Size (approx.):              | 188 mm × 58 mm × 6 mm   |
|                       | Mass (approx.):                  |            | , ,, ·                             | 1.3 kg (excluding accessories)  |
|                       |                                  |            |                                    |   |

Design and specifications are subject to change without notice.