

KENWOOD

DUAL DIN SIZED CD RECEIVER

DPX302

INSTRUCTION MANUAL

Kenwood Corporation



Take the time to read through this instruction manual.

Familiarity with installation and operation procedures will help you obtain the best performance from your new CD-receiver.

For your records

Record the serial number, found on the back of the unit, in the spaces designated on the warranty card, and in the space provided below. Refer to the model and serial numbers whenever you call upon your Kenwood dealer for information or service on the product.

Model DPX302 Serial number _____

US Residence Only

Register Online

Register your Kenwood product at
www.Kenwoodusa.com

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Safety precautions

⚠ WARNING

To prevent injury or fire, take the following precautions:

- To prevent a short circuit, never put or leave any metallic objects (such as coins or metal tools) inside the unit.
- Do not watch or fix your eyes on the unit's display when you are driving for any extended period.
- Mounting and wiring this product requires skills and experience. For safety's sake, leave the mounting and wiring work to professionals.

⚠ CAUTION

To prevent damage to the machine, take the following precautions:

- Make sure to ground the unit to a negative 12V DC power supply.
- Do not install the unit in a spot exposed to direct sunlight or excessive heat or humidity. Also avoid places with too much dust or the possibility of water splashing.
- When replacing a fuse, only use a new fuse with the prescribed rating. Using a fuse with the wrong rating may cause your unit to malfunction.
- Use only the screws provided or specified for installation. If you use wrong screws, you could damage the unit.

Do Not Load 3-in. CDs in the CD slot

If you try to load a 3 in. CD with its adapter into the unit, the adapter might separate from the CD and damage the unit.

About CD players/disc changers connected to this unit

Kenwood disc changers/ CD players released in 1998 or later can be connected to this unit.

Refer to the catalog or consult your Kenwood dealer for connectable models of disc changers/ CD players. Note that any Kenwood disc changers/ CD players released in 1997 or earlier and disc changers made by other makers cannot be connected to this unit. Connecting unsupported disc changers/CD players to this unit may result in damage.

Set the "O-N" Switch to the "N" position for the applicable Kenwood disc changers/ CD players.

The functions you can use and the information that can be displayed may differ depending on the models being connected.



- You can damage both your unit and the CD changer if you connect them incorrectly.

Lens Fogging

When you turn on the car heater in cold weather, dew or condensation may form on the lens in the CD player of the unit. Called lens fogging, this condensation on the lens may not allow CDs to play. In such a situation, remove the disc and wait for the condensation to evaporate. If the unit still does not operate normally after a while, consult your Kenwood dealer.

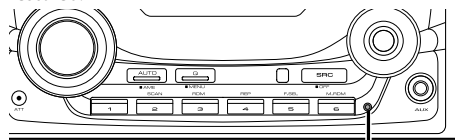
The "AAC" logo is trademark of Dolby Laboratories.

Notes

- If you experience problems during installation, consult your Kenwood dealer.
- When you purchase optional accessories, check with your Kenwood dealer to make sure that they work with your model and in your area.
- We recommend the use of <Activating Security Code> (page 17) to prevent theft.
- The characters which can be displayed by this unit are A-Z 0-9 @ " ' ` % & * + = , . / \ < > [] () ; ; ^ - { } ~ .
- The illustrations of the display and the panel appearing in this manual are examples used to explain more clearly how the controls are used. Therefore, what appears on the display in the illustrations may differ from what appears on the display on the actual equipment, and some of the illustrations on the display may be inapplicable.

How to reset your unit

- If the unit fails to operate properly, press the Reset button. The unit returns to factory settings when the Reset button is pressed.
- Press the reset button if the disc auto changer fails to operate correctly. Normal operation should be restored.



Reset button

Cleaning the Unit

If the faceplate of this unit is stained, wipe it with a dry soft cloth such as a silicon cloth.

If the faceplate is stained badly, wipe the stain off with a cloth moistened with neutral cleaner, then wipe it again with a clean soft dry cloth.



- Applying spray cleaner directly to the unit may affect its mechanical parts. Wiping the faceplate with a hard cloth or using a volatile liquid such as thinner or alcohol may scratch the surface or erases characters.

Before using this unit for the first time

This unit is initially set on the Demonstration mode.

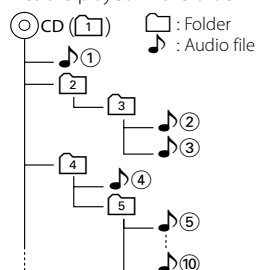
When using this unit for the first time, cancel the <Demonstration mode Setting> (page 21).

About Audio file

- **Playable Audio file**
AAC (.m4a), MP3 (.mp3), WMA (.wma)
 - **Playable disc media**
CD-R/RW/ROM
 - **Playable disc file format**
ISO 9660 Level 1/2, Joliet, Romeo, Long file name.
- Although the audio files are complied with the standards listed above, the play maybe impossible depending on the types or conditions of media or device.

- **Playing order of the Audio file**

In the example of folder/file tree shown below, the files are played in the order from ① to ⑩.



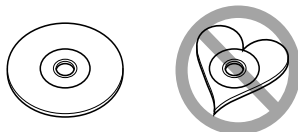
An online manual about audio files is put on the site, www.kenwood.com/audiofile/. On this online manual, detailed information and notes which are not written in this manual are provided. Make sure to read through the online manual as well.


Handling CDs

- Do not touch the recording surface of the CD.
- Do not stick tape etc. on the CD, or use a CD with tape stuck on it.
- Do not use disc type accessories.
- Clean from the center of the disc and move outward.
- When removing CDs from this unit, pull them out horizontally.
- If the CD center hole or outside rim has burrs, use the CD only after removing the burrs with a ballpoint pen etc.

CDs that cannot be used

- CDs that are not round cannot be used.



- CDs with coloring on the recording surface or CDs that are dirty cannot be used.
- This unit can only play the CDs with . This unit may not correctly play discs which do not have the mark.
- You cannot play a CD-R or CD-RW that has not been finalized. (For the finalization process refer to your CD-R/CD-RW writing software, and your CD-R/CD-RW recorder instruction manual.)

About Satellite Radio tuner

This unit supports Satellite Radio tuners which are released by SIRIUS and XM.

Refer to the instruction manual of Satellite radio tuner.

▲CAUTION

Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure. In compliance with Federal Regulations, following are reproductions of labels on, or inside the product relating to laser product safety.

Kenwood Corporation
2967-3, ISHIKAWA-MACHI,
HACHIOJI-SHI
TOKYO, JAPAN

KENWOOD CORP. CERTIFIES THIS EQUIPMENT
CONFORMS TO DHHS REGULATIONS NO.21 CFR
1040. 10, CHAPTER 1, SUBCHAPTER J.

Location : Bottom Panel

FCC WARNING

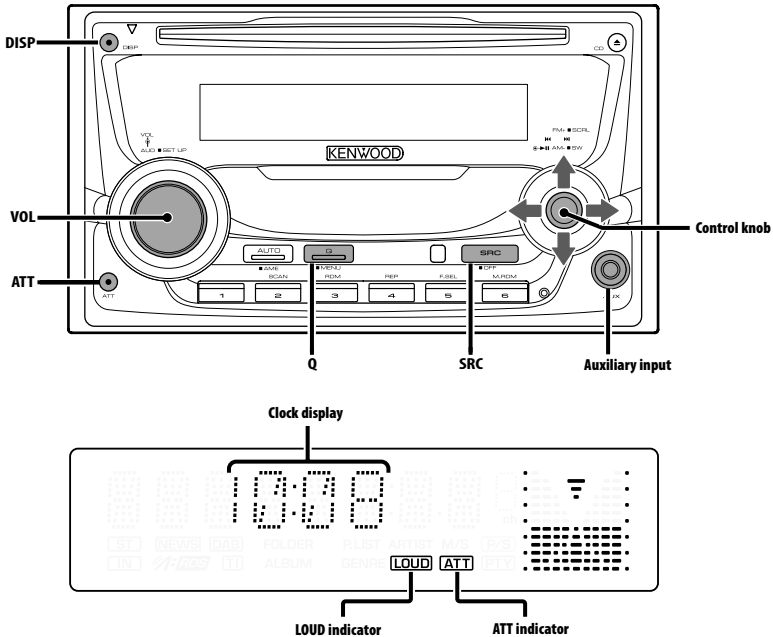
This equipment may generate or use radio frequency energy. Changes or modifications to this equipment may cause harmful interference unless the modifications are expressly approved in the instruction manual. The user could lose the authority to operate this equipment if an unauthorized change or modification is made.

NOTE

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

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

General features



Power

Turning ON the Power

Press the [SRC] button.

Turning OFF the Power

Press the [SRC] button for at least 1 second.

Selecting the Source

Press the [SRC] button.

Source required	Display
Satellite radio (Optional accessory)	"SAT"
Tuner or HD Radio (Optional accessory)	"TUNER" or "HD RADIO"
CD	"CD"
External disc (Optional accessory)	"CD CH"
Auxiliary input*	"AUX"
Auxiliary input (Optional accessory)	"AUX EXT"
Standby (Illumination only mode)	"STANDBY"

* An equipment such as a portable audio player can be connected to the auxiliary input terminal using a commercially available mini-plug (3.5 ϕ).



- Use the mini-plug which is stereo type and does not have any resistance.

Volume

Increasing Volume

Turn the [VOL] knob clockwise.

Decreasing Volume

Turn the [VOL] knob counterclockwise.

Attenuator

Turning the volume down quickly.

Press the [ATT] button.

Each time you press the button, the Attenuator turns ON and OFF.

When the Attenuator is ON, the "ATT" indicator blinks.

System Q

Selecting the best sound setting preset for different types of music.

1 Select the source to set

Press the [SRC] button.

2 Select the Sound type

Press the [Q] button.

Each time you press the button, the sound setting alternates.

Sound setting	Display
Natural	"NATURAL"
User memory	"USER"
Rock	"ROCK"
Pops	"POPS"
Easy	"EASY"
Top 40	"TOP40"
Jazz	"JAZZ"



- User memory: The values set on the <Audio Control> (page 7).
- Change each setting value with the <Speaker Setting> (page 8).
First, select the speaker type with the Speaker setting.

Audio Control

1 Select the source to adjust

Press the [SRC] button.

2 Enter Audio Control mode

Press the [VOL] knob.

3 Select the Basic Audio item to adjust

Press the [VOL] knob.

Each time you press the knob, the item to be adjusted alternates between the items shown in the table below.

4 Adjust the Basic Audio item

Turn the [VOL] knob.

Adjustment Item	Display	Range
Subwoofer level	"SW L"	-15 — +15
Bass level*	"BAS L"	-8 — +8
Middle level*	"MID L"	-8 — +8
Treble level*	"TRE L"	-8 — +8
Balance	"BAL"	Left 15 — Right 15
Fader	"FAD"	Rear 15 — Front 15

Exit Audio Control mode. (Volume control mode)

* Source tone memory: Puts the set up value in the memory per source.

5 Exit Audio Control mode

Press any button.

Press a button other than the [VOL] knob and [ATT] button.

General features

Audio Setup

Setting the Sound system, such as Cross over Network.

1 Select the source to adjust

Press the [SRC] button.

2 Enter Audio Setup mode

Press the [VOL] knob for at least 1 second.

3 Select the Audio Setup item to adjust

Press the [VOL] knob.

Each time you press the knob, the item to be adjusted alternates between the items shown in the table below.

4 Setup the Audio item

Turn the [VOL] knob.

Adjustment Item	Display	Range
Front High Pass Filter	"HPF"	Through/40/60/80/100/120/150/180/220 Hz
Rear High Pass Filter	"HPR"	Through/40/60/80/100/120/150/180/220 Hz
Low Pass Filter	"LPF"	50/60/80/100/120/Through Hz
Subwoofer Phase	"PHAS"	Reverse (180°)/ Normal (0°)
Volume offset	"V-OFF"	-8 — ±0 (AUX: -8 — +8)
Loudness	"LOUD"	OFF/ON



- Volume offset: Sets each source's volume as a difference from the basic volume.
- Loudness: Compensates for low and high tones during low volume. (Only the low tone is compensated for when the tuner is selected as a source.)

5 Exit Audio Setup mode

Press the [VOL] knob for at least 1 second.

Speaker Setting

Fine-tuning so that the System Q value is optimal when setting the speaker type.

1 Enter Standby

Press the [SRC] button.

Select the "STANDBY" display.

2 Enter Speaker Setting mode

Press the [VOL] knob.

3 Select the Speaker type

Turn the [VOL] knob.

Each time you turn the knob, the setting alternates between the settings shown in the table below.

Speaker type	Display
OFF	"SP OFF"
For 5 & 4 in. speaker	"SP 5/4"
For 6 & 6x9 in. speaker	"SP 6*9/6"
For the OEM speaker	"SP OEM"

4 Exit Speaker Setting mode

Press the [VOL] knob.

Subwoofer Output

Turning the Subwoofer output ON or OFF.

Push the Control knob toward down for at least 2 seconds.

Each time you push the knob, Subwoofer output switches ON and OFF.

When it is ON, "SW ON" is displayed.

TEL Mute

The audio system automatically mutes when a call comes in.

When a call comes in

"CALL" is displayed.
The audio system pauses.

Listening to the audio during a call

Press the [SRC] button.

The "CALL" display disappears and the audio system comes back ON.

When the call ends

Hang up the phone.

The "CALL" display disappears and the audio system comes back ON.



- To use the TEL Mute feature, you need to hook up the MUTE wire to your telephone using a commercial telephone accessory. Refer to <Connecting Wires to Terminals> (page 25).

Switching Display

Changing the information displayed.

Press the [DISP] button.

Each time the button is pressed the display switches as shown below.

In Tuner source

Information	Display
Frequency	"FREQ"
Clock	"CLOCK"

In CD & External disc source

Information	Display
Disc title	"D-TITLE"
Track title	"T-TITLE"
Play time	"P-TIME"
Clock	"CLOCK"

In Audio file source

Information	Display
Music title & Artist name	"TITLE"
Album name & Artist name	"ALBUM"
Folder name	"FOLDER"
File name	"FILE"
Play time	"P-TIME"
Clock	"CLOCK"

In Standby/ Auxiliary input source

Information	Display
Source name	"SRC NAME"
Clock	"CLOCK"

In HD Radio source

Information	Display
Station name	"ST NAME"
Title	"TITLE"
Frequency	"FREQ"
Clock	"CLOCK"

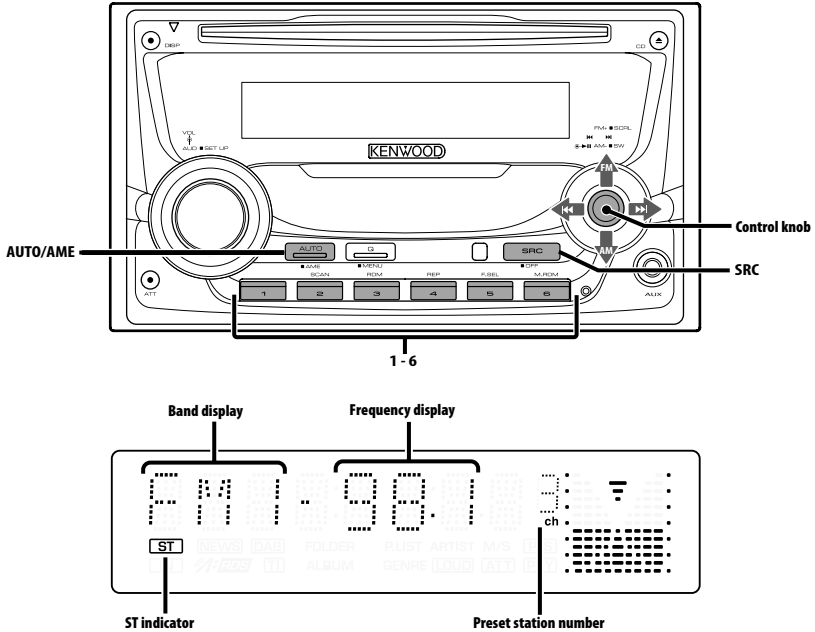
In Satellite radio source

Information	Display
Channel name	"CH NAME"
Music Title	"SONG"
Artist name	"ARTIST"
Composer name	"COMPOSER"
Category name	"CATEGORY"
Label name	"LABEL"
Comment	"COMMENT"
Band & Channel Number	"CH NUM"
Clock	"CLOCK"



- If the selected display item does not have any information, alternative information is displayed.
- Album name cannot be displayed in WMA file.
- When you select the clock display, the display setting of each source will be changed to the clock display.

Tuner features



Tuning

Selecting the station.

1 Select tuner source

Press the [SRC] button.

Select the "TUNER" display.

2 Select the band

Push the Control knob towards [FM] or [AM].

Each time you push the knob toward [FM], it switches between the FM1, FM2, and FM3 bands.

3 Tune up or down band

Push the Control knob towards [◀◀] or [▶▶].



- During reception of stereo stations the "ST" indicator is ON.

Tuning Mode

Choose the tuning mode.

Press the [AUTO] button.

Each time you press the button, the Tuning mode alternates between the modes shown in the table below.

Tuning mode	Display	Operation
Auto seek	"AUTO 1"	Automatic search for a station.
Preset station seek	"AUTO 2"	Search in order of the stations in the Preset memory.
Manual	"MANUAL"	Normal manual tuning control.

Function of remote control

Direct Access Tuning

Entering the frequency and tuning.

1 Select the band

Press the [FM] or [AM] button.

2 Enter Direct Access Tuning mode

Press the [DIRECT] button on the remote control.

"- - - -" is displayed.

3 Enter the frequency

Press the number buttons on the remote control.

Example:

Desired frequency	Press button
92.1 MHz (FM)	[0], [9], [2], [1]
810 kHz (AM)	[0], [8], [1], [0]

Canceling Direct Access Tuning

Press the [DIRECT] button on the remote control.

Station Preset Memory

Putting a station in the memory.

1 Select the band

Push the Control knob towards [FM] or [AM].

2 Select the frequency to put in the memory

Push the Control knob towards [◀◀] or [▶▶].

3 Put the frequency in the memory

Press the desired [1] — [6] button for at least 2 seconds.

The preset number display blinks 1 time.

On each band, 1 station can be put in the memory on each [1] — [6] button.

Auto Memory Entry

Putting stations with good reception in the memory automatically.

1 Select the band for Auto Memory Entry

Push the Control knob towards [FM] or [AM].

2 Open Auto Memory Entry

Press the [AME] button for at least 2 seconds.

"A-MEMORY" is displayed.

When 6 stations that can be received are put in the memory Auto Memory Entry closes.

Preset Tuning

Recalling the stations in the memory.

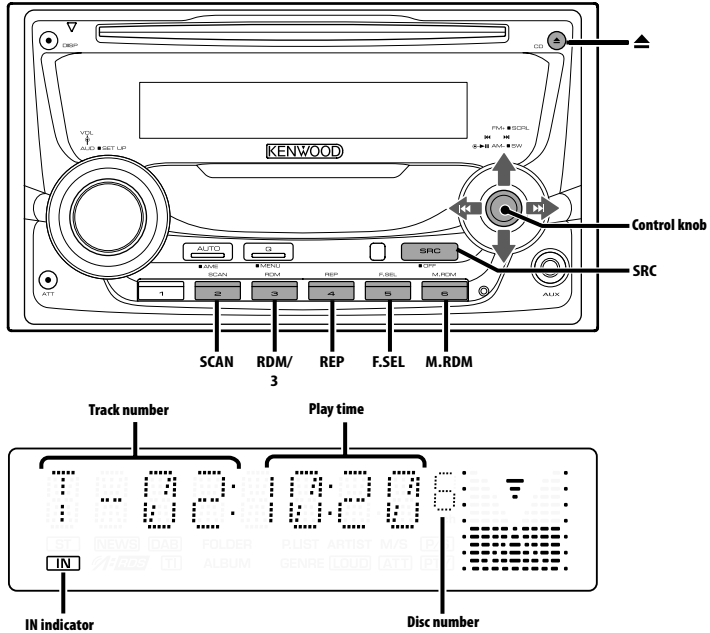
1 Select the band

Push the Control knob towards [FM] or [AM].

2 Recall the station

Press the desired [1] — [6] button.

CD/Audio file/External disc control features



Playing CD & Audio file

When a disc is inserted

Press the [SRC] button.

Select the "CD" display.



- When a CD is inserted, the "IN" indicator is ON.

Pause and play

Press the Control knob.

Each time you press the knob, the audio pauses or plays.

Eject the CD

Press the [▲] button.



- For the audio files and discs you can play with this unit, refer to <About Audio file> (page 4).
- You can eject the disc for 10 minutes after switching off the engine.

Playing External Disc

Playing discs set in the optional accessory disc player connected to this unit.

Press the [SRC] button.

Select the display for the disc player you want.

Display examples:

Display	Disc player
"CD CH"	CD changer
"MD CH"	MD changer

Pause and play

Press the Control knob.

Each time you press the knob, the audio pauses or plays.



- Disc 10 is displayed as "0".
- The functions that can be used and the information that can be displayed will differ depending on the external disc players being connected.

Fast Forwarding and Reversing

Fast Forwarding

Hold down toward [▶▶] with the Control knob.
Release to resume the playback.

Reversing

Hold down toward [◀◀] with the Control knob.
Release to resume the playback.



- There is no sound while the Audio file is being searched.
- The accurate play time is not displayed during fast forwarding or reversing of the Audio file.
- You cannot fast Forwarding and Reversing while AAC file is being played.

Track/File Search

Searching for a music on the disc or in the Audio file folder.

Push the Control knob towards [◀◀] or [▶▶].

Function of disc changer/ Audio file

Disc Search/Folder Search

Selecting the disc set in the Disc changer or the folder recorded on the Audio file media.

Push the Control knob towards up or down.

Function of remote control

Direct Music Search

Doing Music Search by entering the music number.

1 Enter the music number

Press the number buttons on the remote control.

2 Do music Search

Press the [◀◀] or [▶▶] button.

Canceling Direct Music Search

Press the [▶||] button.

Function of disc changers with remote control

Direct Disc Search

Doing Disc Search by entering the disc number.

1 Enter the disc number

Press the number buttons on the remote control.

2 Do Disc Search

Press the [+] or [-] button.

Canceling Direct Disc Search

Press the [▶||] button.



- Input "0" to select disc 10.

Track/File/Disc/Folder Repeat

Replaying the music, disc in the Disc changer or Audio file folder you are listening to.

Press the [REP] button.

Each time you press the button, the Repeat Play alternates between the modes shown in the tables below.

In CD & External disc source

Repeat play	Display
Track Repeat	"TRAC REP"
Disc Repeat (In Disc Changer)	"DISC REP"
OFF	"REP OFF"

In Audio file source

Repeat play	Display
File Repeat	"FILE REP"
Folder Repeat	"FOLD REP"
OFF	"REP OFF"

CD/Audio file/External disc control features

Scan Play

Playing the first part of each music on the disc or Audio file folder you are listening to and searching for the music you want to hear.

1 Start Scan Play

Press the [SCAN] button.

"TRAC SCN"/"FILE SCN"/"SCAN ON" is displayed.

2 Release it when the music you want to listen to is played

Press the [SCAN] button.

Random Play

Play all the music on the disc or Audio file folder in random order.

Press the [RDM] button.

Each time you press the button, Random Play turns ON or OFF.

When the Random mode is ON, "DISC RDM"/"FOLD RDM"/"RDM ON" is displayed.



- When you push the Control knob toward [▶▶], the next selected music starts.

Function of disc changer

Magazine Random Play

Play the music on all the discs in the disc changer in random order.

Press the [M.RDM] button.

Each time you press the button, the Magazine Random Play turns ON or OFF.

When the Magazine Random mode is ON, "MGZN RDM" is displayed.



- When you push the Control knob toward [▶▶], the next selected music starts.

Function of Audio file

Folder Select

Quickly selecting the folder you want to hear.

1 Enter Folder Select mode

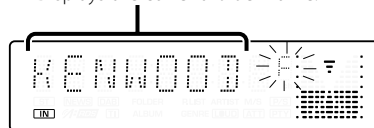
Press the [F.SEL] button.

"FOLD SEL" is displayed.

During Select mode the folder information is displayed as shown below.

Folder name display

Displays the current folder name.



2 Select the folder level

Push the Control knob towards up or down.

With the up of the Control knob, you move 1 level down and with the down of the Control knob, 1 level up.

Selecting a folder in the same level

Push the Control knob towards right or left.

With the left of the Control knob, you move to the previous folder, and with the right of the Control knob, to the next folder.

Returning to the top level

Press the [3] button.

Scrolling the folder name display

Push the Control knob toward up for at least 2 seconds.

3 Decide the folder to play

Press the Control knob.

The Folder Select mode releases, and the Audio file in the folder being displayed plays.

Cancelling the Folder Select mode

Press the [F.SEL] button.

Text/Title Scroll

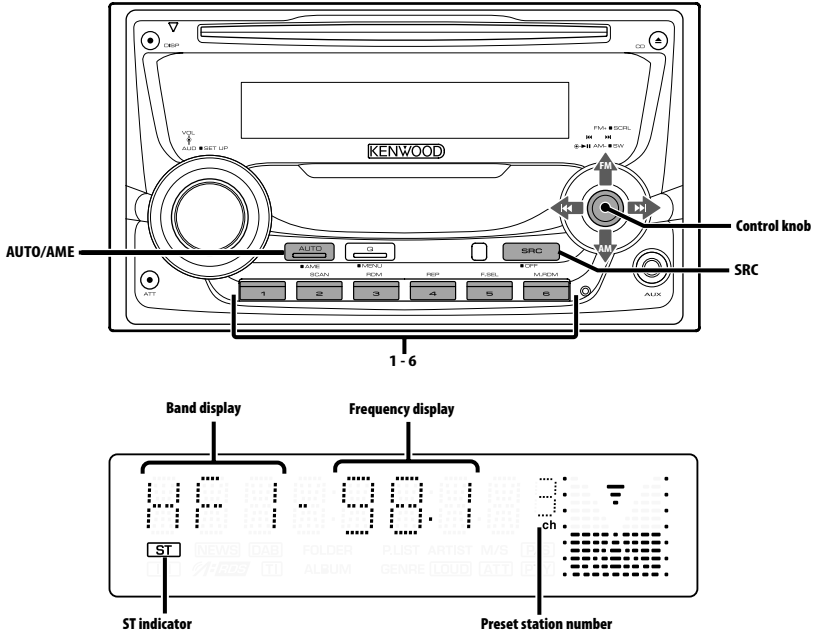
Scrolling the displayed CD text, Audio file text, or MD title.

Push the Control knob toward up for at least 2 seconds.



- When the <Display Illumination Control> (page 18) is set to OFF, the display may black out while scrolling.

HD Radio control features



About HD Radio

- When you connect an HD Radio, Tuner features of the unit are disabled and changed to HD Radio tuner features. A portion of the setting methods including the Tuning Mode will change.
- With the HD Radio tuner, you can use the similar functions to <Station Preset Memory>, <Auto Memory Entry>, and <Preset Tuning> of Tuner features. Refer to Tuner features for how to use the functions.

Tuning

Selecting the station.

1 Select HD Radio source

Press the [SRC] button.

Select the "HD RADIO" display.

2 Select the HD FM band

Push the Control knob toward [FM].

Each time you push the knob to [FM], the band alternates between the HF1, HF2, and HF3 bands.

Select the HD AM band

Push the Control knob toward [AM].

3 Tune up or down band

Push the Control knob towards [◀◀] or [▶▶].

In Standby mode

Activating Security Code

Activating the Security Code disables the usage of audio unit by someone else. Once the Security Code is activated, the entry of authorized Security Code is required to turn on the audio unit when it is removed from the vehicle. Indication of this Security Code activation prevents your precious audio unit from stealing.



- You can set the Security Code with a 4 digit number of your choice.
- The Security Code cannot be displayed or referenced. Make a note of the Security Code and treasure it up.

1 Enter Standby

Press the [SRC] button.

Select the "STANDBY" display.

2 Enter Menu mode

Press the [MENU] button for at least 1 second.

When "MENU" is displayed, "CODE SET" is also displayed.

3 Enter Security Code mode

Press the Control knob for at least 1 second.

When "ENTER" is displayed, "CODE" is also displayed.

4 Select the digits to enter

Push the Control knob towards right or left.

5 Select the Security Code numbers

Push the Control knob towards up or down.

6 Repeat steps 4 and 5, and complete the Security Code.

7 Confirm the Security Code

Press the Control knob for at least 3 seconds.

When "RE-ENTER" is displayed, "CODE" is also displayed.

8 Do the step 4 through 7 operation, and reenter the Security Code.

"APPROVED" is displayed.

The Security Code function activates.



- If you enter the wrong Code in steps 4 through 6, repeat from step 4.

Resetting the Security Code function when the audio unit is first used after removed from the battery power source or the Reset button is pressed

1 Turn the power ON.

2 Do the step 4 through 7 operation, and enter the Security Code.

"APPROVED" is displayed.

Now, you can use the unit.



- When the Security Code function is activated, "CODE SET" changes to "CODE CLR".
- To deactivate the Security Code function, see the next section <Deactivating Security Code>.

In Standby mode

Deactivating Security Code

To deactivate the Security Code function.

1 Select Security Code mode

Push the Control knob towards up or down.

Select the "CODE CLR" display.

2 Enter Security Code mode

Press the Control knob for at least 1 second.

When "ENTER" is displayed, "CODE" is also displayed.

3 Select the digits to enter

Push the Control knob towards right or left.

4 Select the Security Code numbers

Push the Control knob towards up or down.

5 Repeat steps 3 and 4, and complete the Security Code.

6 Press the Control knob for at least 3 seconds.

"CLEAR" is displayed.

The Security Code function deactivates.



- If a wrong security code is entered, "ERROR" is displayed. Enter a correct security code.

Menu system

In Standby mode

Touch Sensor Tone

Setting the operation check sound (beep sound) ON/OFF.

Display	Setting
"BEEP ON"	Beep is heard.
"BEEP OFF"	Beep canceled.

In Standby mode

Manual Clock Adjustment

1 Select Clock Adjustment mode

Push the Control knob towards up or down.

Select the "CLK ADJ" display.

2 Enter Clock Adjust mode

Press the Control knob for at least 1 second.

The clock display blinks.

3 Adjust the hours

Push the Control knob towards up or down.

Adjust the minutes

Push the Control knob towards right or left.

4 Exit Clock adjustment mode

Press the [MENU] button.

Display Illumination Control

This function turns off the display when you perform no operation for 5 seconds. This function is effective when you are driving at night.

Display	Setting
"DISP ON"	Keeps the display on.
"DISP OFF"	Turns off the display when you perform no operation for 5 seconds.



- Set the Display Illumination Control when the <Demonstration mode Setting> (page 21) is set to OFF.
- When the display is off, pressing any key will turn on the display.

- When the display is off, you cannot perform any operation except for the following:
 - Volume
 - Attenuator
 - Selecting the source
 - Ejecting the disc
 - Turning off the power
- During function control, such as the Menu System, the display stays on.

In Standby mode

Dimmer

Dimming this unit's display automatically when the vehicle light switch is turned ON.

Display	Setting
"DIM AUTO"	The display dims.
"DIM OFF"	The display doesn't dim.

In Standby mode

Switching preout

Alternating the preout between the rear and subwoofer. (With the subwoofer the sound outputs without being effected by fader control.)

Display	Setting
"SWPRE R"	Rear preout.
"SWPRE SW"	Subwoofer preout.

In Standby mode

Built-in Amp Setting

Controlling the built-in amplifier.

Turning OFF this control enhances the preout quality.

Display	Setting
"AMP ON"	The built-in amplifier activates.
"AMP OFF"	The built-in amplifier deactivates.

In Audio file source

Supreme Setting

When AAC, MP3 or WMA files encoded at a low bit rate (less than 96kbps (fs=44.1k, 48kHz)) are played, this function restores their high frequency region to approach the sound quality of equivalents of these files encoded at a high bit rate. Processing is optimized for the compression format used (AAC, MP3, or WMA), and adjustment is made for the bit rate used.

Display	Setting
"SPRM ON"	Plays sound using the Supreme function.
"SPRM OFF"	Plays the original sound stored in the audio file.



- The sound effect may be imperceptible depending on the relationship between the audio file format and setting.

In FM reception

CRSC (Clean Reception System Circuit)

Temporarily have reception alternate from stereo to mono to reduce multi-path noise when listening to the FM station.

Display	Setting
"CRSC ON"	The CRSC is ON.
"CRSC OFF"	The CRSC is OFF.



- Strong electrical fields (such as from power lines) may cause unstable sound quality when CRSC is turned ON. In such a situation, turn it OFF.

In HD Radio mode

Receive mode Setting

Sets the receive mode.

1 Select the Receive mode

Push the Control knob towards up or down.

Select the "HDR MODE" display.

2 Enter Receive mode

Press the Control knob for at least 1 second.

3 Set the Receive mode

Push the Control knob towards up or down.

Each time you push the knob, the Receive mode alternates between the modes shown in the table below.

Receive mode	Display	Operation
Auto mode	"AUTO"	Analog broadcasts and digital broadcasts will be switched automatically. When both are being transmitted, the digital broadcast will have priority.
Digital	"DIGITAL"	Digital broadcasts only.
Analog	"ANALOG"	Analog broadcasts only.

4 Exit Receive mode

Press the [MENU] button.



- Even if the Receive mode is set to "AUTO", when the Ball game mode program (non-delayed broadcast program) is received, the Receive mode will automatically switch to Analog broadcast only.

In Satellite radio source

Electronic Serial Number (ESN) display

Displaying the Electronic Serial Number.

Display
"ESN=*****"



- Electronic Serial Number (ESN)
It is important to retain the unit serial number and the electronic Satellite radio Identification number for service activation and potential service changes.

Menu system

Auxiliary Input Display Setting

Selecting the display when changing to Auxiliary input source.

1 Select Auxiliary input source

Press the [SRC] button.

Select the "AUX"/ "AUX EXT" display.

2 Enter Menu mode

Press the [MENU] button for at least 1 second.

"MENU" is displayed.

3 Select Auxiliary input display setting mode

Push the Control knob towards up or down.

Select the "NAME SET" display.

4 Enter Auxiliary input display setting mode

Press the Control knob for at least 1 second.

The presently selected Auxiliary input display is displayed.

5 Select the Auxiliary input display

Push the Control knob towards right or left.

Each time you push the knob, the display alternates as listed below.

- "AUX"/ "AUX EXT"
- "DVD"
- "PORTABLE"
- "GAME"
- "VIDEO"
- "TV"

6 Exit Auxiliary input display setting mode

Press the [MENU] button.



- When operation stops for 10 seconds, the name at that time is registered, and the Auxiliary input display setting mode closes.
- The Auxiliary Input Display can be set only when the built-in auxiliary input or the auxiliary input of optional KCA-S220A is used.

Text Scroll

Setting the displayed text scroll.

Display	Setting
"SCL AUTO"	Repeats scroll.
"SCL MANU"	Scrolls when the display changes.



- The text scrolled is listed below.
 - CD text
 - Folder name/ File name/ Music title/ Artist name/ Album name
 - MD title
 - Text for the Satellite radio source, HD Radio source, including Channel name, etc.

In Standby mode

Built-in Auxiliary input Setting

Set the Built-in Auxiliary Input function.

Display	Setting
"AUX OFF"	When selecting the source there's no Auxiliary Input.
"AUX ON"	When selecting the source there's Auxiliary Input.

In Standby mode

CD Read Setting

When there is a problem with playing a CD with special format, this setting plays the CD by force.

Display	Setting
"CD READ1"	Play CD and Audio file.
"CD READ2"	Play CD by force.



- Some music CDs may not play even in the "CD READ2" mode.

In Standby mode

Demonstration mode Setting

Sets the demonstration mode.

1 Select the Demonstration mode

Push the Control knob towards up or down.

Select the "DEMO" display.

2 Set the Demonstration mode

Press the Control knob for at least 2 seconds.

Each time you press the knob at least 2 seconds, the Demonstration mode alternates between the settings shown in the table below.

Display	Setting
"DEMO ON"	The Demonstration mode function is ON.
"DEMO OFF"	Exit Demonstration mode (Normal mode).

Audio Control

[AUD] button

Selects the Audio item to be adjusted.

[VOL] buttons

Adjusts the Audio item.



- Refer to <Audio Control> (page 7) for the operation method, such as the procedures for Audio control and others operations.

In Tuner source

[FM]/ [AM] buttons

Selects the band.

Each time you press the [FM] button, the band alternates between the FM1, FM2, and FM3 bands.

[◀◀]/ [▶▶] buttons

Tune up or down band.

[0] — [9] buttons

Press buttons [1] — [6] to recall preset stations.

[DIRECT] button

Enters and cancels the <Direct Access Tuning> (page 11) mode.

In Disc source

[◀◀]/ [▶▶] buttons

Going forwards and backwards between music.

[+]/ [-] buttons

Going forwards and backwards between disc/folders.

[▶ II] button

Each time you press the button, the music is played or paused.

[0] — [9] buttons

When in <Direct Music Search> (page 13) and <Direct Disc Search> (page 13), enters the music/disc number.

In HD Radio source

[FM] button

Selects the HD FM band.

Each time you press the [FM] button, the band alternates between the HF1, HF2, and HF3 bands.

[AM] button

Selects the HD AM band.

[◀◀]/ [▶▶] buttons

Tunes up or down bands.

[0] — [9] buttons

Press buttons [1] — [6] to recall preset stations.

In Satellite radio source

[FM] button

Selects the preset band.

[◀◀]/ [▶▶] buttons

Searches up or down channels.

[0] — [9] buttons

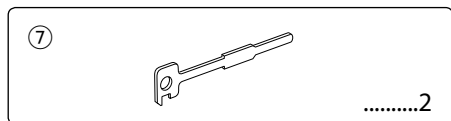
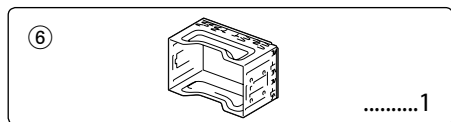
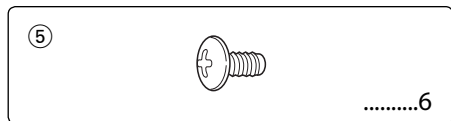
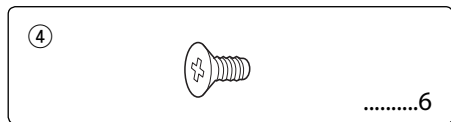
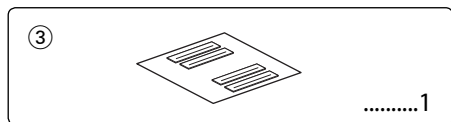
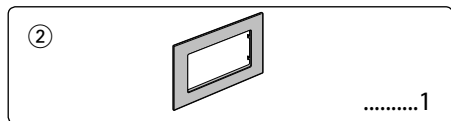
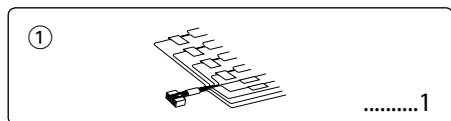
Press buttons [1] — [6] to recall preset channels.

[DIRECT] button

Enters and cancels the <Direct Access Tuning> mode.

Accessories/ Installation Procedure

Accessories



Installation Procedure

1. To prevent a short circuit, remove the key from the ignition and disconnect the \ominus battery.
2. Make the proper input and output wire connections for each unit.
3. Connect the speaker wires of the wiring harness.
4. Connect the wiring harness wires in the following order: ground, battery, ignition.
5. Connect the wiring harness connector to the unit.
6. Install the unit in your car.
7. Reconnect the \ominus battery.
8. Press the reset button.

▲WARNING

If you connect the ignition wire (red) and the battery wire (yellow) to the car chassis (ground), you may cause a short circuit, that in turn may start a fire. Always connect those wires to the power source running through the fuse box.

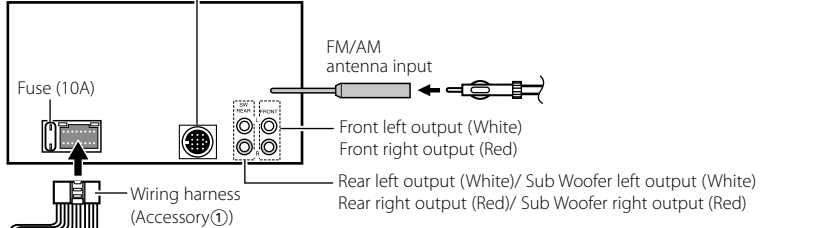


- If the power is not turned ON ("PROTECT" is displayed), the speaker wire may have a short-circuit or touched the chassis of the vehicle and the protection function may have been activated. Therefore, the speaker wire should be checked.
- If your car's ignition does not have an ACC position, connect the ignition wires to a power source that can be turned on and off with the ignition key. If you connect the ignition wire to a power source with a constant voltage supply, as with battery wires, the battery may die.
- If the console has a lid, make sure to install the unit so that the faceplate will not hit the lid when closing and opening.
- If the fuse blows, first make sure the wires aren't touching to cause a short circuit, then replace the old fuse with one with the same rating.
- Insulate unconnected wires with vinyl tape or other similar material. To prevent a short circuit, do not remove the caps on the ends of the unconnected wires or the terminals.
- Connect the speaker wires correctly to the terminals to which they correspond. The unit may be damaged or fail to work if you share the \ominus wires or ground them to any metal part in the car.
- When only two speakers are being connected to the system, connect the connectors either to both the front output terminals or to both the rear output terminals (do not mix front and rear). For example, if you connect the \oplus connector of the left speaker to a front output terminal, do not connect the \ominus connector to a rear output terminal.
- After the unit is installed, check whether the brake lamps, blinkers, wipers, etc. on the car are working properly.
- Mount the unit so that the mounting angle is 30° or less.

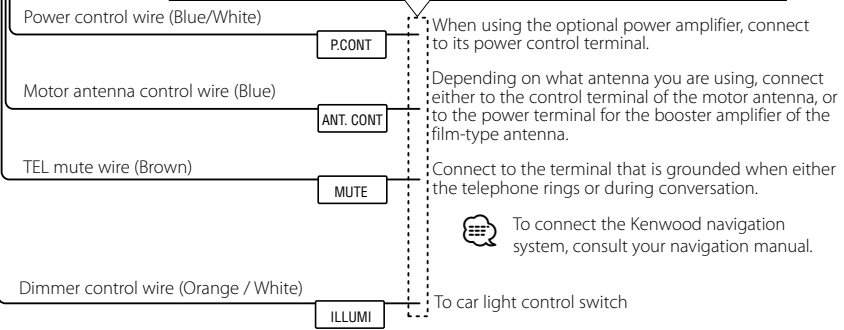
Connecting Wires to Terminals

To connect the Disc changer, consult your Disc changer manual.

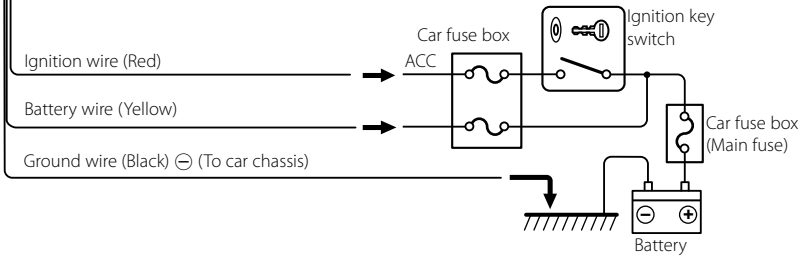
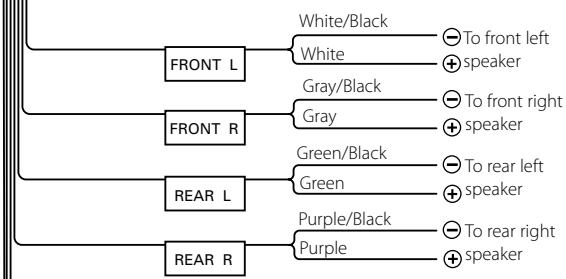
To Kenwood disc changer/ External optional accessory



If no connections are made, do not let the wire come out from the tab.



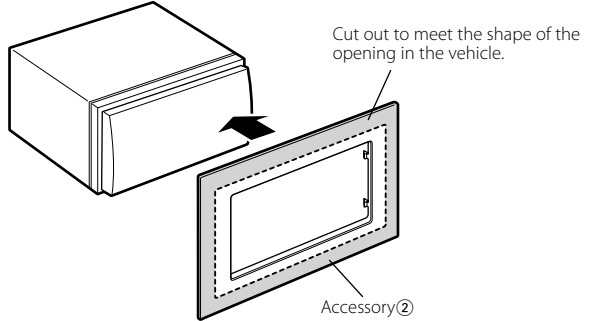
To connect the Kenwood navigation system, consult your navigation manual.



Installing the Escutcheon

For General Motors

- 1 Refer to the section <Removing the Hard Rubber Frame> (page 28) and then remove the hard rubber frame.
- 2 Cut out accessory ② to meet the shape of the opening of the center console.
- 3 Attach accessory ② to the unit.

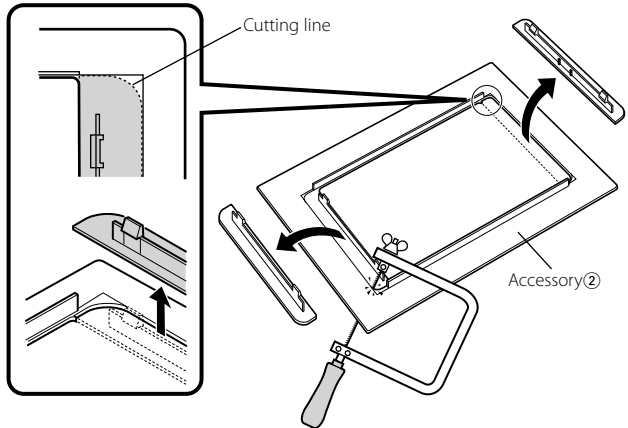


For TOYOTA/ SCION

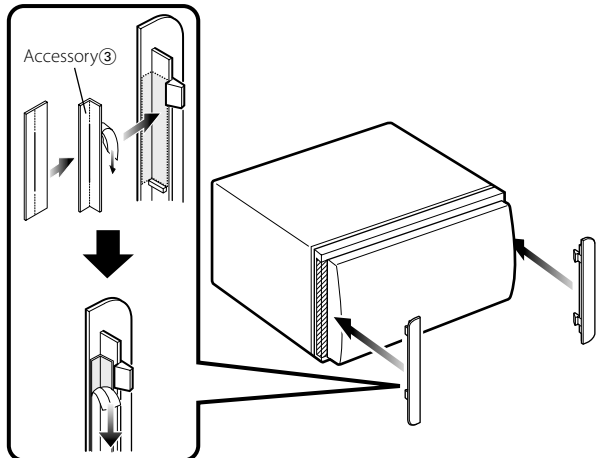
- 1 Refer to the section <Removing the Hard Rubber Frame> (page 28) and then remove the hard rubber frame.
- 2 Cut out accessory ② as illustrated.



- When cutting out accessory ②, make sure it fits the opening of the center console.

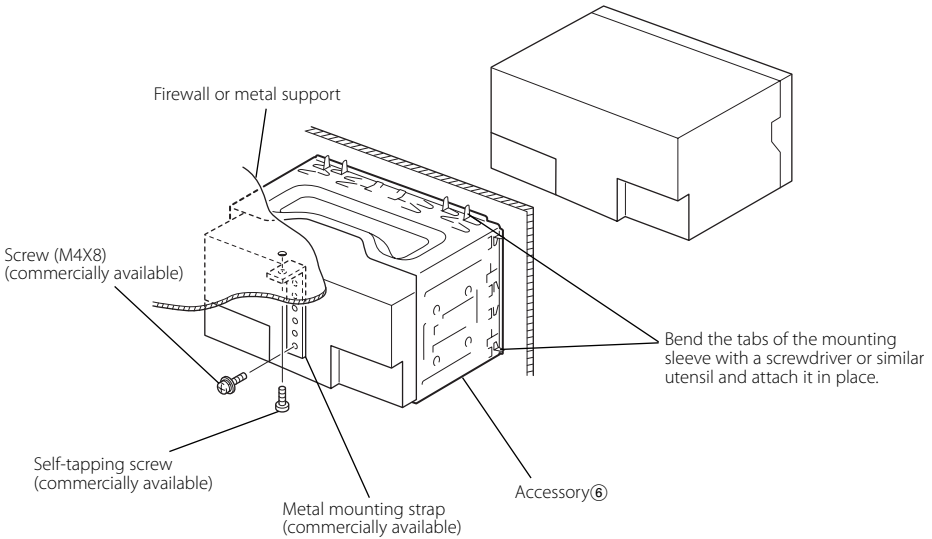


- 3 Fold double-sided adhesive (accessory ③) along the slit and attach it to accessory ② cut-out against the center rib as illustrated. Use 2 pieces of accessory ③ for 1 accessory ② cut-out.
- 4 Attach accessory ② cut-out to the unit.



Installation

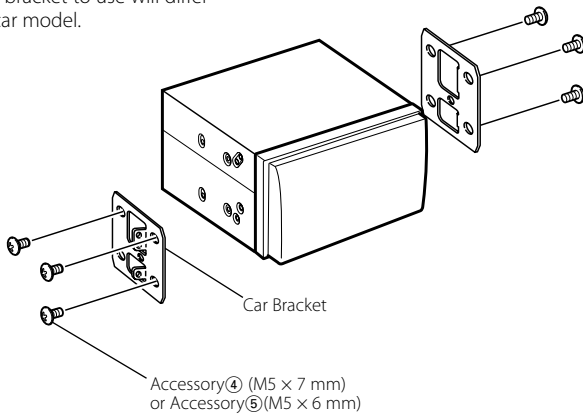
Installing the Unit



Installing in Japanese-Made Cars and General Motors Cars

Install onto the car bracket using the supplied screws (M5 × 6 mm, M5 × 7 mm).

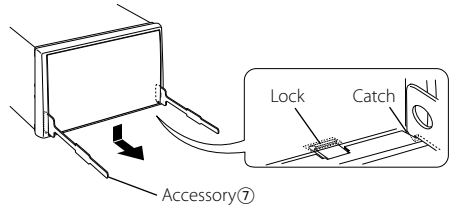
The holes of the car bracket to use will differ depending on the car model.



Removing the Unit

Removing the Hard Rubber Frame (escutcheon)

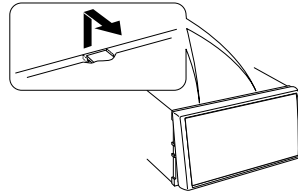
1 Engage the catch pins on the removal tool ⑦ and remove the two locks on the lower level. Lower the frame and pull it forward as shown in the figure.



2 When the lower level is removed, remove the upper two locations.

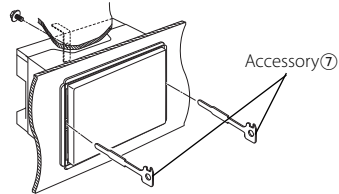


- The frame can be removed from the top side in the same manner.



Removing the Unit

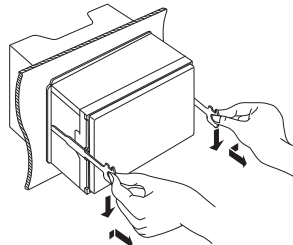
- 1 Refer to the section <Removing the Hard Rubber Frame> and then remove the hard rubber frame.
- 2 Remove the Hex-head screw with integral washer (M4X8) on the back panel.
- 3 Insert the two removal tools ⑦ deeply into the slots on each side, as shown.



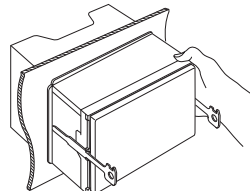
4 Lower the removal tool towards the bottom, and pull out the unit halfway while pressing towards the inside.



- Be careful to avoid injury from the catch pins on the removal tool.



5 Pull the unit all the way out with your hands, carefully not to drop it.



Troubleshooting Guide

Some functions of this unit may be disabled by some settings made on this unit.

! Cannot switch to Aux source.

- ▶ AUX is not turned on. ⓘ <Built-in Auxiliary input Setting> (page 20)

! • Cannot set up the subwoofer. • Cannot set up subwoofer phase. • No output from the subwoofer. • Cannot set up the low pass filter.

- ▶ • Preout is not set to subwoofer. ⓘ <Switching preout> (page 18)
- <Subwoofer Output> (page 8) is not set to On.

! Cannot set up the subwoofer phase.

- ▶ Low pass filter is set to Through. ⓘ <Audio Setup> (page 8)

! • Cannot register a security code. • Cannot set up Display.

- ▶ <Demonstration mode Setting> (page 21) is not turned off.

! Cannot play audio files.

- ▶ <CD Read Setting> (page 20) is set to "2".

What might seem to be a malfunction in your unit may just be the result of slight misoperation or miswiring. Before calling service, first check the following table for possible problems.

General

? The Touch Sensor Tone doesn't sound.

- ✓ The preout jack is being used.
ⓘ The Touch Sensor Tone can't be output from the preout jack.

Tuner source

? Radio reception is poor.

- ✓ The car antenna is not extended.
ⓘ Pull the antenna out all the way.
- ✓ The antenna control wire is not connected.
ⓘ Connect the wire correctly, referring to the section on <Connecting Wires to Terminals> (page 25).

Disc source

? The specified disc does not play, but another one plays instead.

- ✓ The specified CD is quite dirty.
ⓘ Clean the CD.
- ✓ The disc is loaded in a different slot from that specified.
ⓘ Eject the disc magazine and check the number for the specified disc.
- ✓ The disc is severely scratched.
ⓘ Try another disc instead.

Audio file source

? The sound skips when an Audio file is being played.

- ✓ The media is scratched or dirty.
ⓘ Clean the media, referring to the CD cleaning of the section on <Handling CDs> (page 5).
- ✓ The recording condition is bad.
ⓘ Record the media again or use another media.

HD Radio source

? No sound can be heard, or the volume is low.

- ✓ The preset broadcast station is not transmitting in the mode that was set with <Receive mode Setting> (page 19).
ⓘ Please set <Receive mode Setting> to "AUTO".
- ✓ In digital AM broadcasting, receive mode switches between stereo and monaural too often.
ⓘ Receiving condition is bad or unstable. Stereo is chosen when receiving condition is good, and it switches to monaural when the condition becomes bad.
- ✓ HD Radio tuner is connected to KCA-S220A or other units.
ⓘ Connect the HD Radio tuner directly to this unit.

Troubleshooting Guide

The messages shown below display your systems condition.

EJECT:	<ul style="list-style-type: none">• No disc magazine has been loaded in the changer. The disc magazine is not completely loaded.• No CD in the unit.	LOAD:	Discs are being exchanged in the Disc changer.
NO DISC:	No disc has been loaded in the disc magazine.	READING:	The unit is reading the data on the disc.
TOC ERR:	<ul style="list-style-type: none">• No disc has been loaded in the disc magazine.• The CD is quite dirty. The CD is upside-down. The CD is scratched a lot.	IN (Blink):	The CD player section is not operating properly. ↔ Reinsert the CD. If the CD cannot be ejected or the display continues to flash even when the CD has been properly reinserted, please switch off the power and consult your nearest service center.
E-05:	The disc is unreadable.	PROTECT:	The speaker wire has a short-circuit or touches the chassis of the vehicle, and then the protection function is activated. ↔ Wire or insulate the speaker cable properly and press the reset button.
BLANK:	Nothing has been recorded on the MD.	NA FILE:	An Audio file is played with a format that this unit can't support. ↔ ----
NO TRACK:	No tracks are recorded on the MD, although it has a title.	COPY PRO:	A copy-protected file is played. ↔ ----
E-15:	Media was played that doesn't have data recorded that the unit can play.	DEMO MODE:	The Demonstration mode has been selected. ↔ The <Demonstration mode Setting> (page 21) is ON. Turn it OFF.
NO PANEL:	The faceplate of the slave unit being connected to this unit has been removed.		
E-77:	The unit is malfunctioning for some reason. ↔ Press the reset button on the unit. If the "E-77" code does not disappear, consult your nearest service center.		
E-99:	Something is wrong with the disc magazine. Or the unit is malfunctioning for some reason. ↔ Check the disc magazine. And then press the reset button on the unit. If the "E-99" code does not disappear, consult your nearest service center.		
HOLD:	The protective circuit in the unit activates when the temperature inside the automatic disc changer exceeds 60°C (140°F), stopping all operation. ↔ Cool down the unit by opening the windows or turning on the air conditioner. As the temperature falls below 60°C (140°F), the disc will start playing again.		

Specifications

Specifications subject to change without notice.

FM tuner section

- Frequency range (200 kHz space)
 - : 87.9 MHz – 107.9 MHz
- Usable sensitivity (S/N = 30dB)
 - : 9.3dBf (0.8 μ V/75 Ω)
- Quieting Sensitivity (S/N = 50dB)
 - : 15.2dBf (1.6 μ V/75 Ω)
- Frequency response (\pm 3.0dB)
 - : 30 Hz – 15 kHz
- Signal to Noise ratio (MONO)
 - : 70 dB
- Selectivity (\pm 400 kHz)
 - : \geq 80 dB
- Stereo separation (1 kHz)
 - : 40 dB

AM tuner section

- Frequency range (10 kHz space)
 - : 530 kHz – 1700 kHz
- Usable sensitivity (S/N = 20dB)
 - : 28 dB μ (25 μ V)

CD player section

- Laser diode
 - : GaAlAs
- Digital filter (D/A)
 - : 8 Times Over Sampling
- D/A Converter
 - : 1 Bit
- Spindle speed
 - : 1000 – 400 rpm (CLV 2times)
- Wow & Flutter
 - : Below Measurable Limit
- Frequency response (\pm 1 dB)
 - : 10 Hz – 20 kHz
- Total harmonic distortion (1 kHz)
 - : 0.008 %
- Signal to Noise ratio (1 kHz)
 - : 105 dB
- Dynamic range
 - : 93 dB
- MP3 decode
 - : Compliant with MPEG-1/2 Audio Layer-3
- WMA decode
 - : Compliant with Windows Media Audio
- AAC decode
 - : AAC-LC ".m4a" files

Audio section

- Maximum output power
 - : 50 W x 4
- Full Bandwidth Power (at less than 1% THD)
 - : 22 W x 4
- Speaker impedance
 - : 4 – 8 Ω
- Tone action
 - Bass : 100 Hz \pm 8 dB
 - Middle : 1 kHz \pm 8 dB
 - Treble : 10 kHz \pm 8 dB
- Preout level / Load (during disc play)
 - : 2500 mV/10 k Ω
- Preout impedance
 - : \leq 600 Ω

Auxiliary input

- Frequency response (\pm 1 dB)
 - : 20 Hz – 20 kHz
- Input Maximum Voltage
 - : 1200 mV
- Input Impedance
 - : 100 k Ω

General

- Operating voltage (11 – 16V allowable)
 - : 14.4 V
- Current consumption
 - : 10 A
- Installation Size (W x H x D)
 - : 182 x 112 x 160 mm
 - 7-3/16 x 4-7/16 x 6-5/16 inch
- Weight
 - : 4.1 lbs (1.85 kg)

KENWOOD