KENWOOD

KOS-A200



EXTERNAL MEDIA CONTROLLER WITH RDS ENCODER

INSTRUCTION MANUAL

CONTRÔLEUR MÉDIA EXTERNE AVEC CODEUR RDS

MODE D'EMPLOI

EXTERNER MEDIA CONTROLLER MIT RDS-KODIERGERÄT

BEDIENUNGSANLEITUNG

EXTERNE MEDIA CONTROLLER MET RDS-ENCODER

GEBRUIKSAANWIJZING

Kenwood Corporation







Contents

| Safety precautions 3 | Menu system | 17 |
|---|--|----|
| Notes 4 | Menu System Transmission Frequency | |
| About USB device 5 | Modulation Level Data Transmission Speed | |
| About AAC, MP3 and WMA 6 | Touch Sensor Tone Touch Sensor Tone Volume | |
| General features 8 | Text Scroll Built-in Auxiliary Input Setting | |
| Loading and Replacing the battery Power Selecting the Source Switching Display | Auxiliary Input Display Setting Firmware version display Search Mode Setting Auto Memory Entry | |
| USB device/Audio file/External disc control features 10 | Switching Seek Mode PTY Watch Select Mode Language Filter Search Mode | |
| Playing USB device Playing External Disc | Accessories/Installation Procedure | 22 |
| Fast Forwarding and Reversing Track/File Search | Installation | 23 |
| Disc Search/Folder Search Direct Track/File Search | Connecting Wires to Terminals | 24 |
| Direct Disc Search Track/File Repeat | Troubleshooting Guide | 26 |
| Disc/Folder Repeat Scan Play | Specifications | 28 |
| Random Play Magazine Random Play All Random Play Folder Select Text/Title Scroll | | |

14

Text Scroll

DAB tuner control features

Primary/Secondary Switching

About DAB Tuner control Service Preset Memory Recalling a Preset Service Program Type (PTY) Function Program Type preset DAB Reception

Safety precautions

AWARNING

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.
- Mounting and wiring this product requires skills and experience. For safety's sake, leave the mounting and wiring work to professionals.

ACAUTION

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.
- Do not use your own screws. Use only the screws provided. If you use the wrong screws, you could 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.

The "AAC" logo is trademark of Dolby Laboratories.

Notes

- No USB device comes with this unit. You need to purchase a commercially available USB device. For the types of available USB devices, refer to <About USB device> (page 5).
- 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.
- 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.
- The reception of tuner may be reduced a little if the KOS-A200 is used.
- If your car stereo does not have muting, there may be some noise before power switch of control unit is ON and OFF. If this happens, turn down the volume of the car stereo.

How to reset your unit

· If the unit fails to operate properly, take off power supply cord plug from the unit. After waiting several seconds, connect power supply cord plug again. The unit returns to factory settings.

Cleaning the Unit

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

This Product is not installed by the manufacturer of a vehicle on the production line, nor by the professional importer of a vehicle into an EU Member State.

Information on Disposal of Old Electrical and Electronic Equipment (applicable for EU countries that have adopted separate waste collection systems)



Products with the symbol (crossed-out wheeled bin) cannot be disposed as household waste.

Old electrical and electronic equipment should be recycled at a facility capable of handling these items and their waste byproducts. Contact your local authority for details in locating a recycle facility nearest to you. Proper recycling and waste disposal will help conserve resources whilst preventing detrimental effects on our health and the environment.

About USB device

Notes on Use of the USB device

This unit can play audio files stored in the flash memory and digital audio player that have a USB port (these devices are referred to as USB devices in this document).

The following restrictions are placed on the types and usage of available USB devices:

Available USB devices

- USB devices belonging to the USB mass storage class.
- · USB devices whose maximum current consumption is 500 mA or less. For the supported formats and USB device types, refer to http://www.kenwood.com/usb/.



· USB Mass Storage Class:

USB devices that the PC can recognize as an external storage without using any special driver or application software.

- · Contact the sales agent as to whether your USB device conforms to the USB mass storage class specs.
- · Using an unsupported USB device can result in abnormal playback or display of the audio file. Even if you use the USB device conforming to the above specs, audio files cannot be played normally depending on the type or condition of the USB device.

About the Connection of the USB device

· When connecting the USB drive, usage of the supplied USB cable is recommended. Normal playback is not guaranteed when a cable other than the USB compatible cable is used. Connecting a cable whose total length is longer than 5 m can result in abnormal playback.



- · Do not directly connect the USB device to the USB connector on the unit. Connect it using a cable.
- You cannot connect a USB device via a USB hub.



- Install the USB device in the place where it will not prevent you from driving your vehicle properly.
- · Do not leave the USB device in the vehicle for a long time. It can deform or damage due to direct sunlight, high temperature, etc.
- · Take backups of the audio files used with this unit. The files can be erased depending on the operating conditions of the USB device.
 - We shall have no compensation for any damage arising out of erasure of the stored data.
- · Leave the cap on when not using an USB device.

About AAC, MP3 and WMA

The playable AAC/MP3/WMA file (hereafter called Audio file) and the media format has the following limitation. The Audio file, which is not conforming to the specification, may not play normally, or the file and folder names may not display correctly.

Playable Audio file

AAC, MP3, WMA



- Attach the correct extension for the Audio file (AAC: ".M4A", MP3: ".MP3", WMA: ".WMA")
- · Do not attach the extensions to files other than the Audio file. If the extension is attached, the file, which is not the Audio file, will play and outputs a loud noise, causing damage to the speaker.
- The files with copy protection cannot be played.
- · Audio files cannot be played depending on the encoding software setting, USB device type, and/or recording
- · The unit may not be compatible with upgrade of compression format standard and additional specifications.
- · For details on the formats used for USB devices and restrictions, refer to http://www.kenwood.com/usb/.

Playable AAC file

• ".m4a" file encoded by AAC-LC format. Refer to http://www.kenwood.mediamanager.jp for the details.

Playable MP3 file

- · MPEG 1/2 Audio Layer 3 file
- Transfer bit rate: 8-320 kbps
- Sampling frequency: 16, 22.05, 24, 32, 44.1, 48 kHz

Playable WMA file

- The file in accordance with Windows Media Audio (Except for the file for Windows Media Player 9 or after which applies the new functions)
- Transfer bit rate: 48-192 kbps
- Sampling frequency: 32, 44.1, 48 kHz

Playable Storage media

USB device



 For details on the available USB devices, refer to <About USB device> (page 5).

Playable file format of USB device

 For the formats supported by USB devices, refer to http://www.kenwood.com/usb/.

The maximum number of characters for display

File/Folder name: 128 characters

MP3 ID3 Tag/ WMA Contents property:

30 characters AAC song information: 60 characters



- · File/Folder name is the number of the characters including the extensions.
- This unit can display the following versions of MP3 ID3 tag: version 1.0/1.1/2.3
- AAC ID3 Tag cannot be displayed.

Limitation of structure for the file and the folder

- Maximum number of directory levels: 8
- Maximum number of folders: 100
- Maximum number of files per folder: 4096

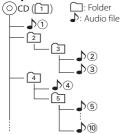
About partition of the USB device

- · While using the USB device, virtual folders are created to control the partition in the USB device. These folders appear in the first level (root) directory as "#:". "#" is an alphabet to identify each partition.
- Even when the USB device does not have partition, "A:" folder is created, and audio files are controlled inside this folder

Playing order of the Audio file

• Audio files are played in the order the files are written. You can specify the order of playback by numbering files in a folder and writing them by folder. (USB device)

Example



Playing order

Playing order after 10 play. → 10, 13, 14, 15...

· File search

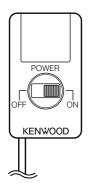
Forward file search during ♪② play. Press the $[\blacktriangleright \blacktriangleright I]$ button $\rightarrow \bigcirc 3$

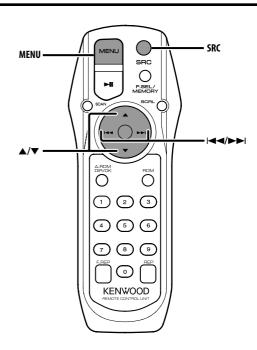
· Folder search

Forward folder search during 10 play. Press the [A] button $\Rightarrow [A]$, [5]...

Folder select

When the selection is set to directory 4, and you want to skip to the folder 2 at the same level. Press the [I◄◄] button → 2 When the selection is set to directory 3, moves the level up by folder select. Press the [▼] button ➡ 2



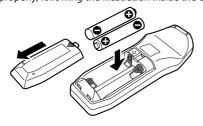


Loading and Replacing the battery

Use two "AA"/ "R6"-size batteries.

Slide the cover while pressing downwards to remove it as illustrated.

Insert the batteries with the + and - poles aligned properly, following the illustration inside the case.



▲WARNING

· Store unused batteries out of the reach of children. Contact a doctor immediately if the battery is accidentally swallowed.



· Do not set the remote control in hot places such as on the dashboard.

Power

Sets the car radio FM station to 88.3 MHz and select the PS (program service name) mode for display.

You can change the transmission frequency. Refer to <Transmission Frequency> (page 18).

Turning ON the Power

Slide the [POWER] switch to ON.

Turning OFF the Power

Slide the [POWER] switch to OFF.

Selecting the Source

Press the [SRC] button.

| Source required | Display |
|------------------------------------|-----------|
| Standby | "STANDBY" |
| DAB (Optional accessory) | "DAB" |
| USB device | "USB" |
| External disc (Optional accessory) | "CD CH" |
| Auxiliary input 1* | "AUX1" |
| Auxiliary input 2* | "AUX2" |



You can select this source when <Built-in Auxiliary Input Setting> (page 19) is set to "ON".

Switching Display

Changing the information displayed.

- 1 Select the source Press the [SRC] button.
- 2 Enter Menu mode Press the [MENU] button. "MENU" is displayed.
- 3 Enter Switching Display mode Press the [▲] or [▼] button.

"DISP SEL" is displayed.

4 Select the Display item Press the [I◄◄] or [▶▶I] button.

In External disc source

| Information | Display | |
|---------------------------------------|------------|--|
| Disc title (In External disc source) | "D-TITLE"* | |
| Track title (In External disc source) | "T-TITLE"* | |
| Disc number & Track number | "NUMBER" | |

In Audio file source

| Information | Display |
|-----------------------------|----------|
| Song title & Artist name | "TITLE"* |
| Album name & Artist name | "ALBUM"* |
| Folder name | "FOLDER" |
| File name | "FILE" |
| Folder number & File number | "NUMBER" |

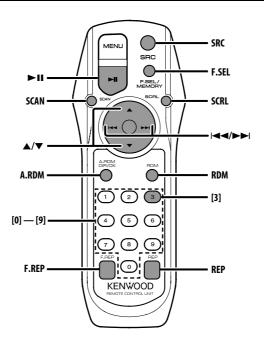
In DAB source

| Information | Display |
|--------------------|-------------|
| Service label | "SERV LBL"* |
| Dynamic label | "DYNAMIC"*1 |
| PTY label | "PTY"*1 |
| Component label | "COMP"* |
| Audio quality | "QUALITY"*1 |
| Ensemble label | "ENSEMBLE"* |
| Region label | "REGION"* |
| Received Frequency | "FREQ" |

5 Exit Switching Display mode Press the [MENU] button.



- * If the contents of the information cannot be displayed, Disc/Track number, Folder/File number or Frequency is displayed.
- *1 If the contents of the information cannot be displayed, "NO TEXT"/"NONE"/"OBSCURE" is displayed.
- Track number at Audio file displays the last 3 digits when it exceeds 1000 songs.



Playing USB device

Playing USB device

- 1 Select a source other than the USB device Press the [SRC] button.
- 2 Connect the USB device.
- 3 Select USB source Press the [SRC] button.

Select the "USB" display.



- Refer to <About AAC, MP3 and WMA> (page 6) for the Audio file you can play.
- For the types of available USB devices and how to connect USB devices, refer to <About USB device> (page 5).
- After you stopped playing a file contained in the USB device, you can restart playing the file from the point where you stopped its playback.
 - Even after removing the USB device, you can restart playing the file from the point where you stopped its playback as long as the files contained in the USB device are all the same.
- Be sure to insert the USB device connector as far as it will go.

Pause and play

Press the [►II] button.

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

Removing the USB device

- 1 Select a source other than the USB device Press the [SRC] button.
- 2 Remove the USB device.



• Removing the USB device with it selected as a source can damage the data stored in the USB device.



 You can remove the USB device safely with the unit power turned off.

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 [►II] button.

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



 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 the [►►I] button.

Release to resume the playback.

Reversing

Hold down the [◄◄] button.

Release to resume the playback.



- You can control this function when <Search Mode Setting> (page 19) is set to "MANUAL".
- There is no sound while the Audio file is being searched.
- You cannot fast Forwarding and Reversing depending on AAC file format.

Track/File Search

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

Press the [I◄◄] or [►►I] button.



 You can control this function when <Search Mode Setting> (page 19) is set to "TRACK". 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.

Press the [▲] or [▼] button.

Direct Track/File Search

Doing Track/File Search by entering the track/file number.

1 Enter the track/file number Press the number buttons.



- · You can select Direct File Search up to 999.
- 2 Do Track/File Search
 Press the [I◄◄] or [▶▶I] button.

Cancelling Direct Track/File Search
Press the [►II] button.

Function of disc changer

Direct Disc Search

Doing Disc Search by entering the disc number.

- 1 Enter the disc number Press the number buttons.
- 2 Do Disc Search Press the [▲] or [▼] button.

Cancelling Direct Disc Search Press the [►II] button.



Input "0" to select disc 10.

USB device/Audio file/External disc control features

Track/File Repeat

Replaying the track/file you are listening to.

Press the [REP] button.

"REP" is displayed, when <Switching Display> (page 9) is select to "NUMBER".

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

In External disc source

| Repeat play | Display |
|--------------|------------|
| Track Repeat | "TRAC REP" |
| OFF | "REP OFF" |

In Audio file source

| Repeat play | Display | |
|-------------|------------|--|
| File Repeat | "FILE REP" | |
| OFF | "REP OFF" | |

Disc/Folder Repeat

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

Press the [F.REP] button.

"DREP"/"FREP" is displayed, when <Switching Display> (page 9) is select to "NUMBER". Each time you press the button, the Repeat Play alternates between the modes shown in the tables below

In External disc source

| Repeat play | Display | |
|-------------------------------|------------|--|
| Disc Repeat (In Disc Changer) | "DISC REP" | |
| OFF | "REP OFF" | |

In Audio file source

| Repeat play | Display |
|---------------|------------|
| Folder Repeat | "FOLD REP" |
| OFF | "REP OFF" |

Scan Play

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

1 Start Scan Play

Press the [SCAN] button.

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

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

Press the [SCAN] button.

Random Play

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

Press the [RDM] button.

"RDM" is displayed, when <Switching Display> (page 9) is select to "NUMBER".

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

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



 When you press the [►►] button, the next random song starts.

Function of disc changer

Magazine Random Play

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

Press the [A.RDM] button.

"MRDM" is displayed, when <Switching Display> (page 9) is select to "NUMBER".

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 press the [►►I] button, the next random song starts.

Function of Audio file

All Random Play

Playing randomly from all of the Audio files recorded in the media.

Press the [A.RDM] button.

"ARDM" is displayed, when <Switching Display> (page 9) is select to "NUMBER".

When the random mode is ON, "ALL RDM" is displayed.

Cancelling the All Random Play Press the [A.RDM] button.



• When you press the [►►I] button, the next random song starts.

Function of Audio file

Folder Select

Quickly selecting the folder you want to hear.

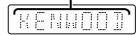
1 Enter Folder Select mode Press the [F.SEL] button.

"F-SELECT" 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

Press the [▲] or [▼] button.

With the [▲] button you move 1 level down and with the [▼] button 1 level up.

Selecting a folder in the same level Press the [I◄◄] or [▶▶I] button.

With the [I◄◄] button you move to the previous folder, and with the [►►] button to the next folder

Returning to the top level Press the [3] button.

Scrolling the folder name display

Press the [SCRL] button.

3 Decide the folder to play Press the [►II] button.

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

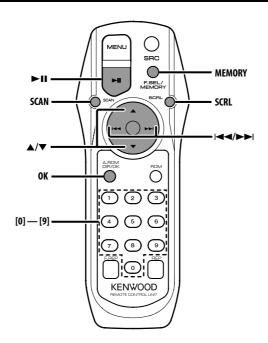
Cancelling the Folder Select mode

Press the [F.SEL] button.

Text/Title Scroll

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

Press the [SCRL] button.



About DAB Tuner control

Refer to A group on the Instruction manual of DAB Tuner KTC-9090DAB (optional accessory) for the control method of DAB Tuner function. However, the following control methods of the function for this unit may be differed from the Instruction manual; therefore, refer to the following supplemental instruction.

Service Preset Memory

Putting the services in the memory.

1 Select the preset band Press the [▲] button.

Each time you press the button, the preset band switches between BAND1, BAND2, and BAND3.

- 2 Select the service to put in the memory Press the [I◀◀] or [▶▶I] button.
- 3 Enter memory mode Press the [MEMORY] button. "PRESET" is displayed.

4 Select a preset number Press the desired [1] — [6] button.

5 Put the service in the memory Press the [OK] button.

"MEMORY" is displayed. On each band, 1 service can be put in the memory on each [1] — [6] button.

Recalling a Preset Service

Recalling the services in the memory.

- 1 Select the preset band Press the [▲] button.
- 2 Recall the service Press the desired [1] — [6] button.

Program Type (PTY) Function

This function permits desired program types from within the received Ensemble to be searched and monitored.

1 Enter PTY Mode Press the [►II] button.



• This function cannot be used during the interruption of the announcement/ PTY Watch.

2 Select the program type Press the [▲] or [▼] button.

Each time you press the button, the program type changes.

Refer to the instruction manual of DAB tuner for <Program Type Display>.

3 Search a service of the selected program type

Press the [I◄◀] or [▶▶I] button.

When you want to search for other service, press [I◀◀] or [▶▶I] button again.



· If the selected program type is not found, the message ("NO PTY", etc.) is displayed. When searching for a service of another program type, repeat procedures 2 and 3.

Switching to Another Service:

Repeat procedure 3.

Another service of the same program type will be searched.

Cancelling Search In the Middle:

Press the [►II] button.

Searching by program type and language

1 Press the button while in program type selection mode

Press the [SCAN] button.

2 Selecting a language Press the [▲] or [▼] button.

As for the available languages, refer to the instruction manual of DAB tuner for <Language Filter Search Mode>

3 Searching by the selected program type and language

Press the [I◄◄] or [▶▶I] button.

4 Exiting: Press the [SCAN] button.

Languages to be displayed

Select English, French, German, Dutch, Spanish, Portuguese, Norwegian or Swedish in < Language Filter Search Mode> (page 21) to display in the selected language.

Program Type preset

Putting the Program Type in the Preset memory and quick recall.

Presetting the Program Type

1 Select the Program Type to preset Refer to <Program Type (PTY) Function> (page

2 Receive the Program Type to be preset Press the [MEMORY] button.

"PRESET" is displayed.

3 Select a preset number Press the desired [1] — [6] button.

4 Preset the Program Type Press the [OK] button.

Recalling the preset Program Type

1 Enter PTY mode

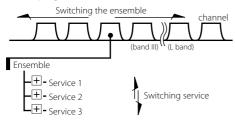
Refer to <Program Type (PTY) Function> (page

2 Select a preset number

Press the desired [1] — [6] button.

DAB Reception

In DAB, select Ensemble and then choose Service (Audio programme).



1 Select the ensemble or service Press the [SCAN] button.

"FREQ"/"SERVICE" is displayed.

| Display | Setting |
|-----------|------------------------------|
| "FREQ" | Selecting the ensemble mode. |
| "SERVICE" | Selecting the service mode. |

2 Switching the ensemble or service Press the [I◀◀] or [▶▶I] button.

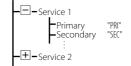


- · Switching the Service causes a break-off of the sound for about one second.
- · There is no switching to data service.

Primary/Secondary Switching

The Primary and Secondary can be switched with services that are composed of more than one service components.

Ensemble



Press the [▼] button.

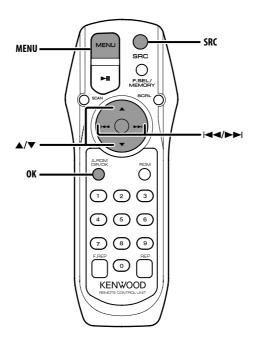


- The Primary is selected automatically when the service is switched or the unit is turned off.
- The Primary/ Secondary switching is not available when the service has only one service component or its Secondaries consist of data services.

Text Scroll

Scrolls the displayed service label and other

Press the [SCRL] button.



Menu System

Setting beep sound during operation, etc. functions.

The Menu system basic operation method is explained here. The reference for the Menu items and their setting content is after this operation explanation.

1 Enter Menu mode Press the [MENU] button.

"MENU" is displayed.

2 Select the menu item

Press the [▲] or [▼] button.

Example: When you want to set the beep sound, select the "BEEP" display.

3 Set the menu item

Press the [I◄◄] or [▶▶I] button.

Example: When "BEEP" is selected, each time the button is pressed it switches "BEEP ON" or "BEEP OFF". Select 1 of them as the setting.

You can continue by returning to step 2 and setting other items.

4 Exit Menu mode Press the [MENU] button.



· When other items those applicable to the basic operation method above are displayed, their setting content chart is entered. (Normally the setting listed at the top of the chart is the original setting.)

In Standby mode

Transmission Frequency

Setting the transmission frequency.

1 Select Transmission Frequency setting mode Press the [▲] or [▼] button.

Select the "FREQ" display.

2 Set the Transmission Frequency Press the [I◄◄] or [▶▶I] button.

| Display | Setting |
|-------------|-----------------------------|
| "FREQ 87.9" | 87.9 MHz |
| "FREQ 88.1" | 88.1 MHz |
| "FREQ 88.3" | 88.3 MHz (Original setting) |
| "FREQ 88.5" | 88.5 MHz |
| "FREQ 88.7" | 88.7 MHz |
| "FREQ 88.9" | 88.9 MHz |
| "FREQ 89.1" | 89.1 MHz |
| "FREQ 89.3" | 89.3 MHz |
| "FREQ 89.5" | 89.5 MHz |
| "FREQ 89.7" | 89.7 MHz |
| "FREQ 89.9" | 89.9 MHz |

3 Enter Transmission Frequency Press the [OK] button.



· If there is a strong broadcast station signal near the current frequency, radio interference may occur. If it occurs, change the frequency.

Modulation Level

Setting the modulation level of transmitter.

| Display and Setting | |
|------------------------------|--|
| "MOD LV1" | |
| "MOD LV2" (Original setting) | |
| "MOD LV3" | |



· When you play sources, if the volume is low compared with that for FM increase the modulation level. If the volume is high and there is distortion, decrease the modulation level.

Data Transmission Speed

Setting the data transmission speed of RDS.

| Display and Setting | |
|--------------------------------|--|
| "SCL-SPD 1" | |
| "SCL-SPD 2" | |
| "SCL-SPD 3" (Original setting) | |
| "SCL-SPD 4" | |
| "SCL-SPD 5" | |



Sets the value that a text is displayed correctly by car

In Standby mode

Touch Sensor Tone

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

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

Touch Sensor Tone Volume

Adjust the operation check sound level (beep sound).

| Display and Setting | |
|-------------------------------|--|
| "BEEP LV1" | |
| "BEEP LV2" | |
| "BEEP LV3" (Original setting) | |
| "BEEP LV4" | |
| "BEEP LV5" | |



- · The touch sensor tone volume can be set for each
- · AUX1 and AUX2 cannot be set a different value.

Text Scroll

Setting the displayed text scroll.

| Display | Setting | |
|------------|-----------------------------------|--|
| "SCL MANU" | Doesn't scroll. | |
| "SCL AUTO" | Scrolls when the display changes. | |



- The text scrolled is listed below.

 - Folder name/ File name/ Song title/ Artist name/ Album name
 - MD title
 - Text for the DAB source including Channel name,

In Standby mode

Built-in Auxiliary Input Setting

Set the Built-in Auxiliary Input function.

| Display | Setting | |
|--------------------------|---|--|
| "AUX1 OFF"/"AUX2 OFF" | When selecting the source there's no Auxiliary Input. | |
| "AUX1 ON"/"AUX2 ON" | When selecting the source there's Auxiliary Input. | |

In AUX1/AUX2 mode

Auxiliary Input Display Setting

Selecting the display when alternating to Auxiliary input source.

1 Select Auxiliary input display setting mode Press the [▲] or [▼] button.

Select the "NAME SET" display.

2 Select the Auxiliary input display Press the [I◄◀] or [▶▶I] button.

Each time you press the button, the display alternates as listed below.

- "AUX1"/"AUX2"
- "DVD"
- "PORTABLE"
- · "GAMF"
- · "VIDEO"
- "TV"

3 Exit Auxiliary input display setting mode Press the [MENU] button.

USB mode

Firmware version display

Displaying the firmware version with the unit.

1 Select the firmware version display mode Press the [▲] or [▼] button.

Select the "F/W VER" display.

2 Display the firmware version Press the [I◄◄] or [▶▶I] button.

In USB/ Audio file/ External disc mode

Search Mode Setting

Sets the search mode function for USB device. Audio file and External disc.

1 Select the Search mode Press the [▲] or [▼] button.

Select the "SRCH SEL" display.

2 Set the Search mode Press the [I◄◀] or [▶▶I] button.

| Display | Operation | |
|----------|---|--|
| "TRACK" | Sets Track/File Search function. | |
| "MANUAL" | Sets Fast Forwarding/Reversing Search function. | |

Menu system

In DAB mode

Auto Memory Entry

Putting stations with good reception in the memory automatically.

1 Select the Auto memory Entry mode Press the [▲] or [▼] button.

Select the "A-MEMORY" display.

2 Enter Auto memory Entry mode Press the [OK] button.

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

In DAB mode

Switching Seek Mode

Sets the seeking mode.

1 Select the Seek mode Press the [▲] or [▼] button.

Select the "SEEK SEL" display.

2 Set the Seek mode Press the [I◀◀] or [▶▶I] button.

Each time you press the button, the Seek mode alternates between the operations shown in the table below.

| Tuning mode | Display | Operation |
|--------------------------|----------|---|
| Auto Ensemble Seek | "AUTO1" | An Ensemble in good receiving condition can be selected and received. |
| Preset Service Recall | "AUTO2" | Services registered can be recalled in the order of the Pre-set number. |
| Manual | "MANUAL" | Channels are switched one after another. |

In DAB mode

PTY Watch Select Mode

After registering a desired programme type, when the programme in the registered type starts in the Ensemble being received, the Service is automatically switched.

1 Select the PTY Watch Select mode Press the [▲] or [▼] button. Select the "PTY WATCH" display.

2 Enter PTY Watch Select mode Press the [OK] button.

3 Set the PTY Watch Select mode Press the [▲] or [▼] button.

As for available program types, refer to the instruction manual of DAB tuner for < Program Type Display>.

4 Exit menu mode Press the [MENU] button.

In DAB mode

Language Filter Search Mode

Audio programmes only in the desired language can selectively be received in the Ensemble.

1 Select the Language Filter Search mode Press the [▲] or [▼] button.

Select the "LANG SEL" display.

2 Enter Language Filter Search mode Press the [OK] button.

3 Switching the setting Press the [▲] or [▼] button.

As for available language types, refer to the instruction manual of DAB tuner for <Language Filter Search Mode>.

4 Searching for a programme in the selected language

Press the [I◄◄] or [▶▶I] button.



· If no programme in the selected language is found, "Language n/a"/ "NO COMPO" is displayed. For searching another programme in another language, repeat procedures 2 and 3.

Switching to another programme:

Repeat procedure 4.

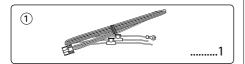
Searching for another programme in the newly selected language starts.

Cancelling Search In the Middle:

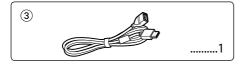
Exit menu mode Press the [MENU] button.

Accessories/Installation Procedure

Accessories

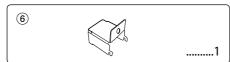


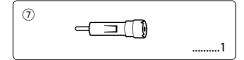


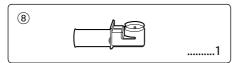














Installation Procedure

- 1. To prevent a short circuit, remove the key from the ignition and disconnect the

 battery.
- 2. Make the proper input and output wire connections for each unit.
- 3. Connect the wiring harness wires in the following order: ground, battery, ignition.
- 4. Connect the wiring harness connector to the
- 5. Install the unit in your car.
- 6. Reconnect the

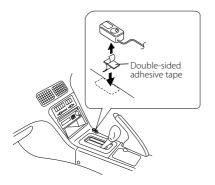
 battery.



- · Only use antenna conversion adapters (ISO-JASO) when the antenna cord has an ISO plug.
- · If your vehicle's ignition does not have an ACC position, or if the ignition wire is connected to a power source with constant voltage such as a battery wire, the power will not be linked with the ignition (i.e., it will not turn on and off along with the ignition). If you want to link the unit's power with the ignition, connect the ignition wire to a power source that can be turned on and off with the ignition key.
- If the fuse blows, first make sure that the wires have not caused 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 short circuits, also do not remove the caps on the ends of the unconnected wires or the terminals.
- After the unit is installed, check whether the brake lamps, indicators, wipers, etc. on the car are working properly.

Installation for Remote control sensor

- **1** Wipe off the installation location with a cleaning
- **2** Secure the Remote control sensor (Accessory (2)) in the specified place with the double-sided adhesive tape.

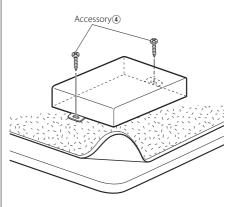




- Install the Remote control sensor on a flat surface. If it is installed on a curved surface, the tape adhesion may weaken and the controller may come off.
- Do not install the Remote control sensor in places (such as on the dashboard) where it is exposed to direct sunlight and the temperature becomes high. Otherwise, the Remote control sensor will become deformed and unusable.
- · Install the Remote control sensor in places that do not obstruct driving. Install the Remote control sensor temporarily and verify that the handle, shift knob, and side brake can be operated smoothly.

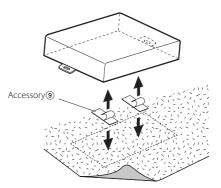
Installation for FM modulator Unit

• Installation using the self-tapping screws Use screws (Accessory 4) to fix FM modulator Unit onto an audio board or another.

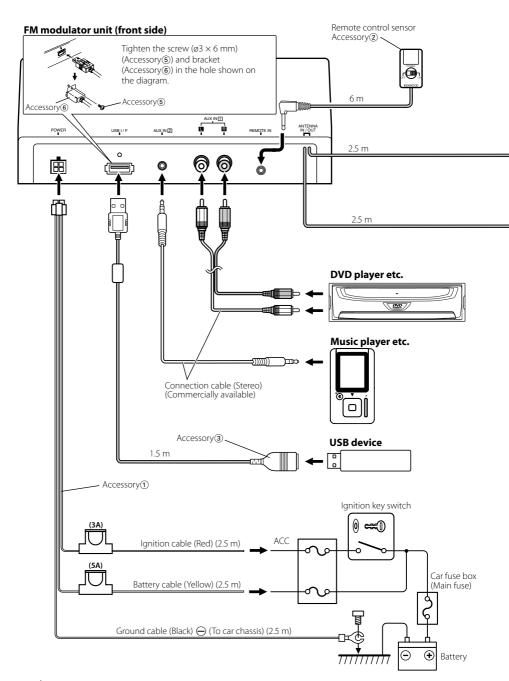


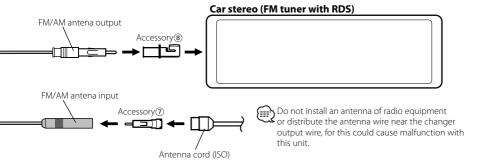
Installation using the velcro tapes

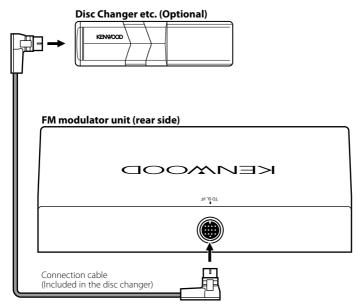
Remove the backing from the Velcro strips (Accessory(9)) and attach it to the bottom of the FM modulator Unit. Install the FM modulator Unit on the carpet.



Connecting Wires to Terminals







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.

Troubleshooting Guide

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 power does not turn ON.

- ✓ The fuse has blown.
 - After checking for short circuits in the wires, replace the fuse with one with the same rating.
- ✓ The Remote control sensor wiring harness is connected incorrectly.
 - Connect the wire correctly, referring to the section on <Connecting Wires to Terminals> (page 24).

? There's a source you can't switch.

- ✓ The Disc changer isn't connected.
 - Connect the Disc changer. If the Disc changer isn't connected to it's input terminal, you can't switch to an external disc source.

? The memory is erased when the ignition is turned OFF.

- ✓ The ignition and battery wire are incorrectly connected
 - Connect the wire correctly, referring to the section on <Connecting Wires to Terminals> (page 24).

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

- ✓ The radio volume is sets to the minimum level. Turn the radio volume up.
- The input/output wires or wiring harness are connected incorrectly.
 - Reconnect the input/output wires or the wiring harness correctly. See the section on <Connecting Wires to Terminals> (page 24).

? The sound quality is poor or distorted.

- ✓ The signal levels differ depending in sources. Change the <Modulation Level>(page 18)
 - setting.
- ✓ There is a strong broadcast station signal near the setting transmission frequency.
 - Change the <Transmission Frequency>(page 18) setting.

? Traffic information, PTY, RDS broadcasting cannot be received.

- ✓ This unit turned on the power.
 - Turn off the power of the unit.

? The text isn't displayed correctly.

Change the <Data Transmission Speed> (page 18) settina.

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.

? Direct Search can't be done.

- ✓ Another function is ON
 - Turn Random Play or other functions OFF.

? Track Search can't be done.

- ✓ For the discs/folders first or last song.
 - For each disc/folder, Track Search can't be done in the backward direction for the first song or in the forward direction for the last

Audio file source

? Cannot play an Audio file.

- The media is scratched or dirty.
 - Clean the media.

? The sound skips when an Audio file is being

- ✓ The media is scratched or dirty.
 - Clean the media.
- The recording condition is bad.
 - Record the media again or use another media.

? The Audio file track time isn't displayed correctly.

- - There are times when it isn't displayed correctly according to the Audio file recording conditions.

USB device source

? The USB device is not detected.

- ✓ The USB connector is disconnected.
 - Connect the connector of the USB device properly.

? The USB device does not play its audio files.

- The USB connector is disconnected.
 - properly.

The messages shown below display your systems condition.

EJECT: No disc magazine has been loaded in

the changer. The disc magazine is not completely loaded.

Load the disc magazine properly.

No CD in the unit.

Insert the CD. NO DISC: No disc has been loaded in the disc

magazine.

Doad a disc into the disc magazine.

TOC ERR: No disc has been loaded in the disc magazine.

> Load a disc into the disc magazine. The CD is quite dirty. The CD is upsidedown. The CD is scratched a lot.

Clean the CD and load it correctly.

READ ERR: · The number of files or folders which are stored in the connected USB device is

above the limitation.

•The file system of the connected USB

device is broken.

Copy the files and folders for the USB device again referring to www. kenwood.com/usb/. If the error message is still displayed, initialize the USB device or use other USB devices.

F-05: The CD is upside-down.

➡ Load the CD correctly.

BI ANK: Nothing has been recorded on the MD.

NO TRACK: No tracks are recorded on the MD.

although it has a title.

NO PANEL: The faceplate of the slave unit being

connected to this unit has been removed.

⇒ Replace it.

The unit is malfunctioning for some reason. F-77:

Reset 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 reset the unit. If the "E-99" code does not disappear, consult your nearest

service center.

LOAD: Discs are being exchanged in the Disc

changer.

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

plaving again.

NA FILE: An Audio file is played with a format that

this unit can't support.

➪ -----

COPY PRO: A copy-protected file is played.

➪ -----

NO DVICE: The USB device is selected as a source

although no USB device is connected.

Change the source to any source other than USB. Connect an USB device, and change the source to USB again.

NA DVICE: An unsupported USB device is connected.

> For the supported USB devices, refer to <About USB device> (page 5).

NO MUSIC/ E-15:

· Media was played that doesn't have data recorded that the unit can play.

•The connected USB device contains no playable audio file.

Use media that has data recorded that the unit can play.

USB FRR: The connected USB device is rated a current capacity higher than the allowable

Check the USB device with reference to <About USB device> (page 5).

Some trouble may have occurred to the

connected USB device.

Remove the USB device and then reconnect it. When the same message displays again, use another USB device.

Specifications

Specifications subject to change without notice.

FM modulator section

Modulating Frequency (200 KHz STEP) : 87.9/ 88.1/ 88.3/ 88.5/ 88.7/ 88.9/ 89.1/89.3/89.5/89.7/89.9 MHz

RDS Encode

RDS encode

: Compliant with CENELEC RDS Standard EN50067

USB Interface

USB Standard

: USB1.1/ 2.0

File System

: FAT16/32 Maximum Supply current

: 500 mA

MP3 decode

: Compliant with MPEG-1/2 Audio Layer-3

WMA decode

: Compliant with Windows Media Audio

AAC decode

: AAC-LC ".m4a" files

Audio Input

Input Maximum Voltage

: 1200 mV

Input impedance

: ≥22 kΩ

General

Operating voltage (11 - 16V allowable)

: 14.4 V

Current consumption

: 5 A

Installation Size (W x H x D)

 $: 185 \times 31 \times 135 \text{ mm}$

Weight

: 800 g