

# KENWOOD

## KDC-CMP59FM

10 DISC MP3 CD AUTOCHANGER / CONTROLLER / FM MODULATOR SYSTEM

### INSTRUCTION MANUAL

CHANGEUR AUTOMATIQUE DE MP3 CD 10 DISQUES / CONTROLEUR /  
SYSTEME A MODULATION DE FM

### MODE D'EMPLOI

SISTEMA DEL MODULADOR DE FM / CONTROLADOR / CAMBIADOR  
AUTOMATICO DE 10 DISCOS MP3 CD

### MANUAL DE INSTRUCCIONES

SISTEMA MODULADOR FM/CONTROLADOR / CHANGER AUTOMÁTICO DE 10  
DISCOS MP3 CD

### MANUAL DE INSTRUÇÕES

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 compact disc auto changer.**

#### **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 KDC-CMP59FM Serial number \_\_\_\_\_

©B64-2223-00 (KW/EW)

COMPACT  
**disc**  
DIGITAL AUDIO

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## ▲ Warning

### ▲ 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-CHO,  
HACHIOJI-SHI  
TOKYO, JAPAN

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

Location : Rear 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.

### NOTE

This Class B digital apparatus complies with Canadian ICES-003.

*The marking of products using lasers  
(Except for some areas)*

**CLASS 1  
LASER PRODUCT**

The label is attached to the chassis/case and says that the component uses laser beams that have been classified as Class 1. It means that the unit is utilizing laser beams that are of a weaker class. There is no danger of hazardous radiation outside the unit.

## Safety Precautions

### ⚠ WARNING

**Take the following precautions to prevent fire and avoid personal injury:**

- When extending the ignition wire, battery wire, or ground wire, use 0.75mm<sup>2</sup> (AWG18) or larger automotive grade wire to avoid wire deterioration or damage to the covering.
- Check that no metal objects (coins, tools, etc.) are left inside the unit to avoid short circuits.
- If you smell or see smoke, turn the power off immediately and consult your Kenwood dealer.
- Do not touch the liquid crystal fluid if the LCD is damaged or broken due to shock. The liquid crystal fluid may be dangerous to your health or even fatal.

If the liquid crystal fluid from the LCD contacts your body or clothing, wash it off with soap immediately.

### ⚠ CAUTION

**Take the following precautions to keep the unit in proper working order.**

- Be sure the unit is connected to a 12V DC power supply with a negative ground connection.
- Do not open the top or bottom cover.
- Do not install the unit in places it is exposed to direct sunlight, high heat or humidity, water may splash over it, or dust exists.

- When replacing a fuse, only use a new one with the prescribed rating. Using a fuse with the wrong rating may cause your unit to malfunction. on hot places such as above the dashboard.
- To prevent a short circuit when replacing a fuse, first disconnect the wiring harness.

### NOTE

- If you have difficulty in installing this unit in your vehicle, contact your Kenwood dealer.
- If it doesn't seem to be working properly, first press the Reset button. If the malfunction persists, consult your Kenwood dealer.



Reset button

- Some car stereos cause the sound of the tuner to make for a moment when an engine is activated.
- The reception of the tuner may be reduced a little if the KDC-CMP59FM is used.
- If the sound is lower than the tuner sound, raise up the volume level of the CD with using the receiver.
- Do not use your own screws. Use only the screws provided. If you use the wrong screws, you could damage the unit.

### Cleaning the Unit

If the front panel gets dirty, turn off the power and wipe the panel with a dry silicon cloth or soft cloth.

### ⚠ CAUTION

Do not use hard cloths or paint thinner, alcohol, or other volatile solvents. These may damage external surfaces or remove indicator characters.

### Lens fogging

In cold climates, there may be a period after you turn on your vehicle's heater when the lens that guides the laser beam used in your CD player fogs up. If this happens, you cannot play compact discs. Take out discs and the fogging will disappear. If it does not return to normal after several hours, contact your Kenwood dealer.

## Safety Precautions

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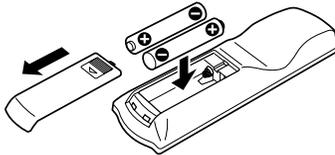
### ▲CAUTION

Do not set the remote on hot places such as above the dashboard.

### **Loading and Replacing the Batteries:**

Use two "AAA" 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.

### NOTE

- The provided batteries are intended for use in operation checking, and their service life may be short.
- When the remote controllable distance becomes short, replace both of the batteries with new ones.

### NOTE

A portion of the operations may not be possible, depending on the unit that is connected.

## Notes on playing MP3

This unit can play MP3(MPEG1, 2, 2.5 Audio Layer 3). Note, however, that the MP3 recording media and formats acceptable are limited. When writing MP3, pay attention to the following restrictions.

### Acceptable media

The MP3 recording media acceptable to this unit are CD-ROM, CD-R, and CD-RW.

When using CD-RW, do full format not quick format to prevent malfunction.

### Acceptable medium formats

The following formats are available for the media used in this unit. The maximum number of characters used for file name including the delimiter (".") and three-character extension are indicated in parentheses.

- ISO 9660 Level 1
- ISO 9660 Level 2
- Joliet
- Romeo

The media reproducible on this unit has the following limitations:

- Maximum number of directory levels: 8
- Maximum number of files per folder: 255
- Maximum number of folders: 50

MP3 written in the formats other than the above may not be successfully played and their file names or folder names are not properly displayed.

### Settings for your MP3 encoder and CD writer

When you use your CD writer to record MP3 up to the maximum disc capacity, disable additional writing. For recording on an empty disc up to the maximum capacity at once, check Disc at Once.

### Entering file and folder names

The unit recognizes and plays only those MP3 which have the MP3 extension (.MP3).

### Writing files into a medium

When a medium containing MP3 data is loaded, the unit checks all the data on the medium. If the medium contains a lot of folders or non-MP3 files, therefore, it takes a long time until the unit starts playing MP3.

In addition, it may take time for the unit to move to the next MP3 file or a Track Search or Album Search may not be performed smoothly.



- Loading such a medium may produce loud noise to damage the speakers.
- Do not attempt to play a medium containing a non-MP3 file with the MP3 extension.  
The unit mistakes non-MP3 files for MP3 data as long as they have the MP3 extension.
- Do not attempt to play a medium containing non MP3.

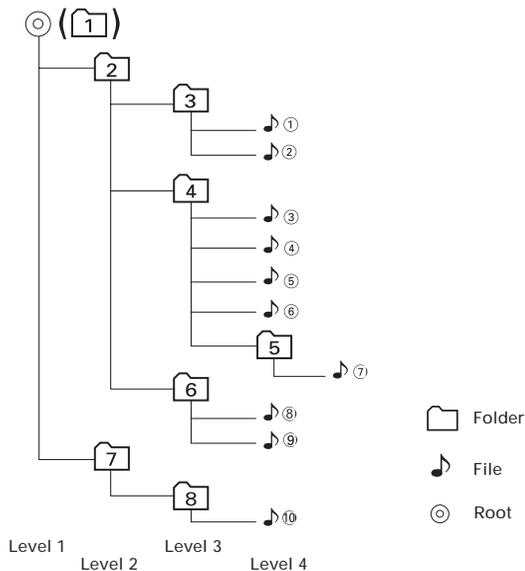
## MP3 playing order

When selected for play, Track Search, or for Folder Search, files and folders are accessed in the order in which they were written by the CD writer.

Because of this, the order in which they are expected to be played may not match the order in which they are actually played. You may be able to set the order in which MP3 are to be played by writing them onto a medium such as a CD-R with their file names beginning with play sequence numbers such as "01" to "99", depending on your CD writer.

For example, a medium with the following folder/ file hierarchy is subject to Track Search, or Folder Search as shown below.

Example of a medium's folder/file hierarchy



## When a Track Search is executed with file ④ being played ...

Current file number	Operation of the button	
	⏮ Button	⏭ Button
④	Beginning of file ④ ▶ ③	⑤ ▶ ⑥

## When Folder Search is selected with file ④ being played to move from folder to folder ...

(Press the ▶/|| button to stop the playback and then to carry out Folder search.)

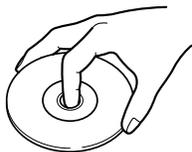
Current folder number	Operation of the button	
	- Button	+ Button
④	③ ▶ ② ▶ ① ▶ ⑧ ...	⑤ ▶ ⑥ ▶ ⑦ ▶ ⑧ ▶ ① ...

## Handling Compact Discs

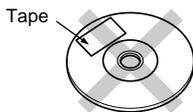
**Playing a CD that is dirty, scratched or warped can cause the sound to skip and the unit to operate incorrectly, resulting in worsened sound quality. Take the following precautions to prevent your CDs from getting scratched or damaged.**

### Handling CDs

- Do not touch the recorded side of the CD (the side opposite the label) when holding it.



- The reflective film on a CD-R or a CD-RW is more fragile than that on an ordinary music CD, and may peel off if scratched. Fingerprints on a CD-R or CD-RW are also more likely to cause skipping when the disc is played. For these reasons, handle the disc very carefully. Detailed handling instructions will appear on the CD-R or CD-RW package: read this information carefully before using the disc.
- Do not stick tape on either side of the CD.



### Storing CDs

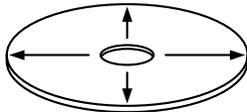
- Do not store CDs in areas exposed to direct sunlight (such as a car seat or the dashboard) or other hot places. A CD-R or CD-RW is more susceptible than a

music CD to damage from high temperatures and humidity, and in some cases, may become unusable if left in the car for long periods of time.

- Remove CDs from the unit when not listening to them for a while, and put them back in their cases. Do not pile up CDs that are removed from their cases or prop them against something.

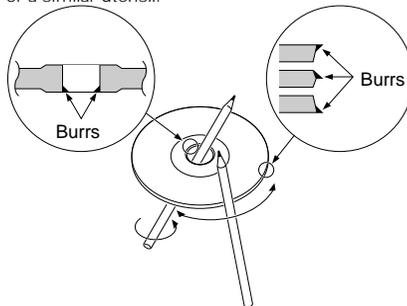
### Cleaning CDs

If a CD has gotten dirty, wipe it off gently using a commercially available cleaning cloth or a soft cotton cloth, starting from the center of the disc and moving outward. Do not clean CDs with conventional record cleaners, anti-static formulas, or chemicals such as paint thinner or benzene.



### Checking New CDs for Burrs

When playing a new CD for the first time, check that there are not any burrs stuck to the perimeter of the disc or in the central hole. CDs with burrs stuck on them may not load properly or may skip while playing. Remove burrs using a ballpoint pen or a similar utensil.



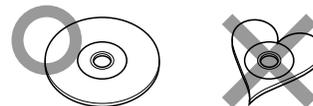
### Do Not Load CD Accessories

Do not use commercially available CD accessories that can be loaded into the CD slot, such as stabilizers, protective sheets, or CD cleaning discs, since they can cause the unit to malfunction.

### ⚠ CAUTION

### Do Not Use Special Shape CDs

- Be sure to use round shape CDs only for this unit and do not use any special shape CDs. Use of special shape CDs may cause the unit to malfunction.



- Be sure to use CDs with disc mark  only for this unit.
- CD-Rs and CD-RWs which have not undergone finalization processing cannot be played. (For more information on finalization processing, refer to the manual for your CD-R/CD-RW writing software or CD-R/CD-RW recorder.) Additionally, depending on the recording status, it may prove impossible to play certain CDs recorded on CD-R or CD-RW.

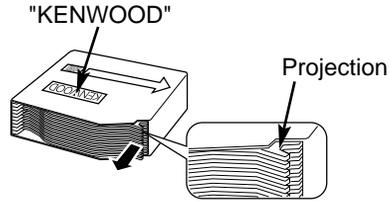
### Do Not Use CDs with Sticker on the Labeled Side

Do not use the CD with the label sticker stuck on it.

Using such a CD may cause the CD to be deformed and the sticker to peel off, resulting in malfunction of the unit.

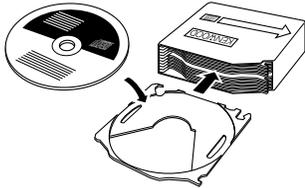
## Loading Compact Discs

1



Make sure the disc magazine is the right way up with the Kenwood logo on the top. Pull the tray out by the projection.

2

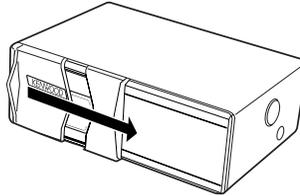


Place the disc on the tray with the label facing upwards. Insert the tray into the disc magazine until it locks. The discs are numbered from the bottom from 1 to 10.

### ▲CAUTION

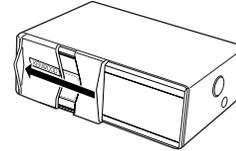
- Take care to insert the tray into the correct grooves in the disc magazine.
- 8-cm discs cannot be used. If an 8-cm disc adapter is used, the disc cannot be ejected.
- Keep all the trays in the magazine even when empty.

3



Open the CD changer door.

5

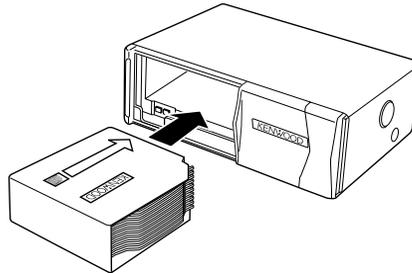


Close the CD changer door.

### NOTE

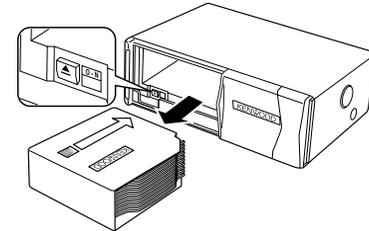
Use the CD changer with its door closed to prevent the entry of dust into the changer.

4



Insert the magazine into the CD changer until it clicks.

6 Magazine ejection



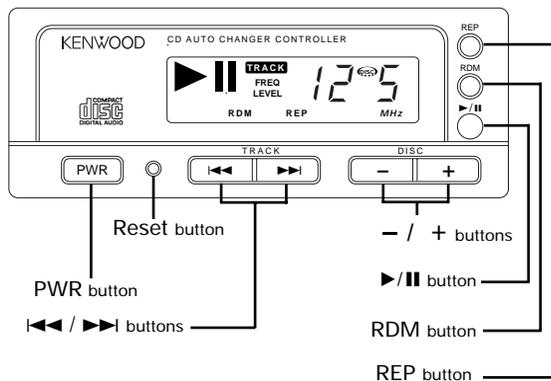
Open the CD changer door, and press the "EJECT" button.

### NOTE

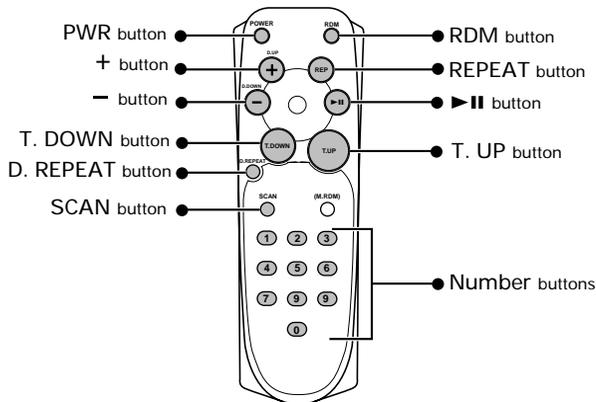
Be sure to open the door completely before pressing the EJECT button. If the door is not completely open, the magazine may hit the door and cause damage or malfunction.

## Buttons

### Display Unit



### Remote



## Operations

Set the car radio FM station to 88.3 MHz. See Page 14 for more information on changing the transmission frequency.

### Playing CD & MP3

#### Play:

Press the PWR button. The power goes ON and the disc play start. When the unit receives any signal from the remote controller, the  mark lights up.

Play indicator  Disc No.

Pause indicator  Track No. / File No.

When the player reaches the end of the last track on the disc you are playing, it will shift automatically to the first track on the next disc. When the player plays the last disc, it will return to the first disc.

The play display blinks during disc replacement. Disc No. 10 is displayed as "0".

#### Power off :

Press the PWR button. The power goes OFF.

#### To listen to the radio :

Press the PWR button. The FM modulator is turned OFF and the radio can be heard.

#### Pause :

Press the  (▶||...Remote) button. Disc play is temporarily paused. If you press the switch once more, the disc is replayed from the paused part.

#### NOTE

- Be sure to turn down the volume whenever you listen to the radio or a cassette tape after stopping the disc play.
- During the disc play is being conducted, you are not able to receive ordinary Radio broadcasting because antenna output is switched into compact disc player's side.

- The MP3 media that this unit can play are CD-ROM, CD-R, and CD-RW.  
The medium formats must be ISO 9660 Level 1, Level 2, Joliet, or Romeo. The methods and precautions to be followed for writing MP3 data are covered in <Notes on playing MP3> (page 6). Check that section before creating your MP3 media.
- It takes time for the unit to check each medium to see if it contains any MP3 file before it starts playing the medium.
- Only two digits of File No. are displayed. For example, "61" may be displayed for the 161st. track.

## Fast Forwarding and Reversing

### **Fast Forwarding :**

Hold down on the ►► button.  
Release your finger to play the disc at that point.

### **Reversing :**

Hold down on the ◀◀ button.  
Release your finger to play the disc at the point.

## Track Search

Selecting the song you want to hear.

Searching for a song on the disc or in the MP3 folder.

### **Making a Reverse Track Search :**

Press the ◀◀ (T. DOWN...Remote) button to display the desired track number.  
Press once to search back to the beginning of the current track, twice to search back to the beginning of the previous track, and so forth.  
Play starts at the beginning of the displayed track number.

#### NOTE

Pressing the ◀◀ (T. DOWN...Remote) button while listening to track 1 will only search back to the beginning of that track. The reverse search is not "recycled" to the last track on the disc.

### **Making a Forward Track Search:**

Press the ►► (T. UP...Remote) button to display the desired track number.  
Press once to fast forward to the next track, twice to fast forward to the track after that, and so forth.  
Play starts at the beginning of the displayed track number.

#### NOTE

You cannot make a forward track search when listening to the last track on a disc.

## Album Search

Selecting the disc you want to hear.

### **Making a Reverse Disc Search :**

Press the — button to display the desired disc number.  
Each time the button is pressed, the displayed disc number decreases by one.  
Play starts at the beginning of the displayed disc.

### **Making a Forward Disc Search :**

Press the + button to display the desired disc number.  
Each time the button is pressed, the displayed disc number increases by one.  
Play starts at the beginning of the displayed disc.

## Operations

### Direct Track Search

*Function of Remote*

Using the remote, directly input the track number that you want to listen to.

- Using the number buttons on the remote, input the number of the track that you want to listen to.  
The selected track number will blink in the display for 10 seconds.  
If you make no further input in the 10-second period, the number entry mode will automatically be canceled.
- Press either the T. DOWN or T. UP button while the track number is blinking.  
The track starts playing.

#### **Canceling Direct Track Search While It Is Operating :**

Press the ►|| button.

#### NOTE

Direct Track Search is enabled for up to 99.

### Direct Album Search

*Function of remote*

Using the remote, directly input the disc number that you want to listen to.

- Using the number buttons on the remote, input the number of the disc that you want to listen to.  
The selected disc number will blink in the display for 10 seconds.  
If you make no further input in the 10-second period, the number entry mode will automatically be canceled.

#### NOTE

- Input "0" to select disc 10.
- If you input more than two numbers all at once, a search will be made only of the last number input.

- Press either the + or – button while the number inputted is blinking.  
The disc starts playing.

#### **Canceling Direct Album Search While It Is Operating :**

Press the ►|| button.

### Track Repeat

Replaying the song you're listening to.

#### **To repeat track :**

Press the REP (REPEAT...Remote) button.

The REP indicator will appear on the display and the Track repeat function will turn on.

The same track is played repeatedly.

#### **To cancel :**

Press the REP (REPEAT...Remote) button.

The REP indicator disappears and the Track repeat function is canceled.

#### NOTE

When disc play stops, Track repeat is canceled.

### Album Repeat

*Function of remote*

Replaying the disc in the Disc changer or MP3 folder you're listening to.

#### **To repeat disc :**

Press the D. REPEAT button.

The D.REP indicator will appear on the display and the Disc repeat function will turn on.

The same disc is played repeatedly.

#### **To cancel :**

Press the D. REPEAT button.

The D.REP indicator disappears and the Disc repeat function is canceled.

#### NOTE

- When disc play stops, Disc repeat is canceled.
- Folder Repeat only is enabled in MP3, but Disk Repeat is disabled.

## Track Scan

### Function of remote

Playing the first part of each song on the disc or MP3 folder you are listening to and searching for the song you want to listen to.

#### Starting the Track Scan:

Press the T.SCAN button. The SCN indicator will appear on the display and the player will play the first 10 seconds of each track in succession.

#### Stopping to Listen to the Track Being Scanned :

Press the ►|| or T.SCAN button.

The SCN indicator disappears and the Track scan is canceled. Normal playback starts.

#### NOTE

- When disc play stops, Track scan is canceled.
- When all tracks on the disc you are listening to are scanned, Track scan is canceled.
- Scanning within a folder is enabled in MP3, but scanning in the entire disk is disabled.

## Random Play

Play all the songs on the disc or MP3 folder in random order.

- 1 Press the RDM button to switch the random play function on and off.  
The RDM indicator lights up when the random play function is turned on.  
The display of the track number changes continuously as the next track is being selected.  
When the track has been selected, play starts.

#### NOTE

When all the tracks on a certain disc have been played using the random play function, the next disc on the changer starts playing (with the random play function still turned on).

- 2 To change the track being heard, press the ►►| (T. UP...Remote) button.  
Another track is selected and played.

#### NOTE

- The random play function is cancelled when you stop playing a disc.
- Random selection within a folder is enabled in MP3, but random selection in the entire disk is disabled.
- Magazine Random Play is disabled in this unit.

## Folder Search (Function of MP3)

Selecting the folder you want to listen to.

### 1 Enter Folder Search mode

Press the ►|| (►||...Remote) button.

During Folder Search mode the folder information is displayed as shown below.



Folder No.

### 2 Select the folder

Press the + or - button.

With the - button you move to the previous folder, and with the + button to the next folder.

### 3 Decide the folder to play

Press the ►|| (►||...Remote) button.

The Folder Search mode releases, and the MP3 in the folder being displayed is played.



See <Notes on playing MP3> (page 7) for details of the search action in the Folder search mode.

## Operations

### Changing the Transmission Frequency

#### 1 To set the frequency change mode

Press the REP button for at least three seconds. The FREQ indicator will light up and the currently set frequency will be displayed.



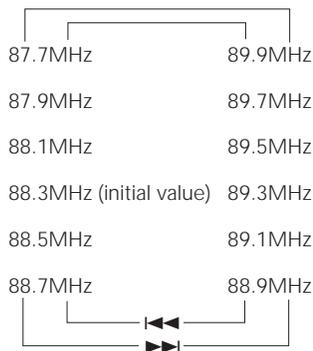
#### NOTE

- The initial value is 88.3MHz.
- If this function is on, the functions other than power on / off, reset, and modulation level / dynamic control, cannot be operated.
- This function is not available when the random play, repeat play, or scan play function is on. Before using this function, cancel the other functions. This function cannot be used while loading a disc (while the play indicator is blinking).

#### 2 To change the frequency

Press either the ◀◀ or ▶▶ button.

Each time you press the ◀◀ or ▶▶ button, the mode switches as follows :



#### NOTE

Some car radios cannot receive a 87.7 MHz frequency.

#### To cancel :

Press the REP button on the display unit for at least three seconds.

The FREQ indicator will go off and the frequency change will take effect.

The frequency change mode is automatically canceled if you do nothing for 15 seconds.

## Modulation level / Dynamic control

### 1 To set the control mode

Press the RDM button on the display unit for at least three seconds.

The LEVEL indicator will light up and the currently set modulation level will be displayed.

Modulation level



Number for prevention of distortion setting

#### NOTE

- If this function is on, the functions other than power on / off, reset, and changing the transmission frequency, cannot be operated.
- This function is not available when the random play, repeat play, or scan play function is on. Before using this function, cancel the other functions. This function cannot be used while loading a disc (while the play indicator is blinking).

### 2 To change the modulation level

Press either the ◀◀ or ▶▶ button.

Each time the ◀◀ or ▶▶ button is pressed, the modulation level changes in the range from 1 to 4. As the number increases, the modulation level increases. The initial setting is 2.

#### NOTE Dynamic control

The unit comes with the prevention of distortion function to reduce sound distortion.

If the sound is distorted severely, press the + button on the display unit and then set the function to "2" (ON). If the prevention of distortion function is set to "2" (ON), the sound extension is reduced.

The initial setting is "1" (OFF).

#### CAUTION

If a disc with a high recording level is used, the sound may distort even if the prevention of distortion function is set to "2" (ON). In this case, reduce the modulation level.

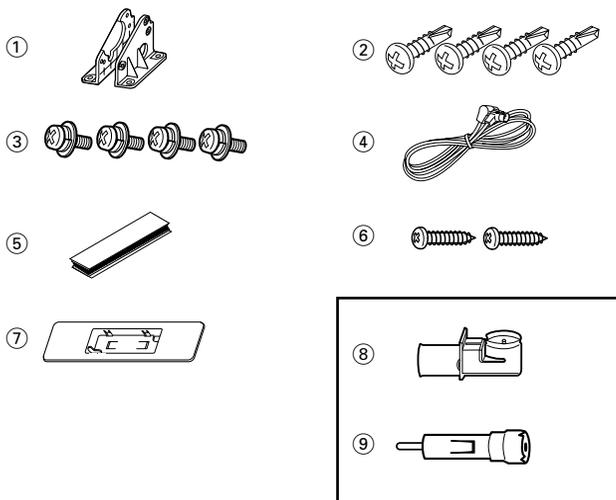
#### To cancel :

Press the RDM button on the display unit for at least three seconds.

The LEVEL indicator will go off and the modulation level change will take effect. The control mode is automatically canceled if you do nothing for 15 seconds.

## Accessories

### External view



Europe sales area only.

#### ▲CAUTION

The use of any accessories except for those provided might result in damage to the unit. Make sure only to use the accessories shipped with the unit, as shown above.

## 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 wiring harness wires in the following order: ground, battery, ignition.
4. Install the unit in your car.
5. Reconnect the  $\ominus$  battery.
6. Press the reset button.

#### ▲WARNING

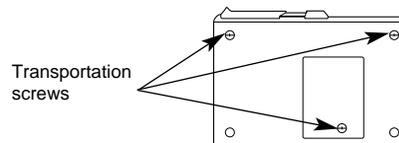
When drilling a hole in the car chassis to install the unit, check first that nothing is on the other side.

#### ▲CAUTION

- 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.
- Do not let unconnected wires or terminals touch metal on the car or anything else conducting electricity. To prevent a short circuit, 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, blinkers, wipers, etc. on the car are working properly.
- Insulate unconnected wires with vinyl tape or other similar material.
- Some disc changers need conversion cords for connection. See the section on "Safety Precautions" for details.

### ■ Removing the transportation screws

Remove all 3 transportation screws for protecting the internal mechanism before you start to install the unit.



#### NOTE

After removing the transport screw, retain it carefully and attach it again before transporting the unit again.

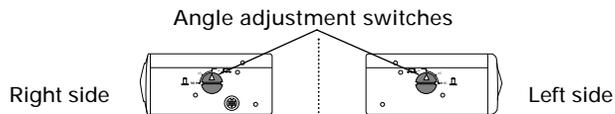
## Installation Procedure

### ■ Angle adjustment switches

The angle adjustment switches on the both sides of the unit are to be set according to the angle of installation of the CD auto changer. Set both of the two switches to the same position. If the switches are not set properly, sound skip or other malfunction may occur.

Set the angle adjustment switches with a coin or other flat object.

Change the switch step by step by detaching and reusing the object at the end of each step.



	0°~5°	40°~50°	85°~90°
Installation angle			
Angle adjustment switch position			

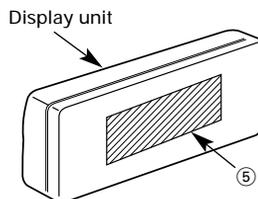


- It is not possible to install at an angle of 40°~50° if only ① is used.

## Installation

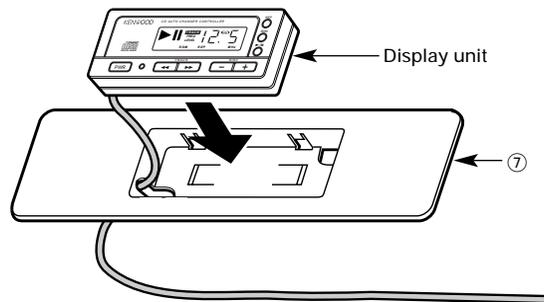
### ■ Installation of Display unit

- Installation without using the trim mount plate ⑦



Attach one velcro to the slanted-line of the the display units as shown above, and attach the other velcro to the parts where you wish to attach the display units. Then, put velcros together and install the display units.

- Installation using the trim mount plate ⑦



Pass the wire from the display unit through the hole on the trim mount plate and push fit the display unit into the trim mount plate until it locks.

#### ▲CAUTION

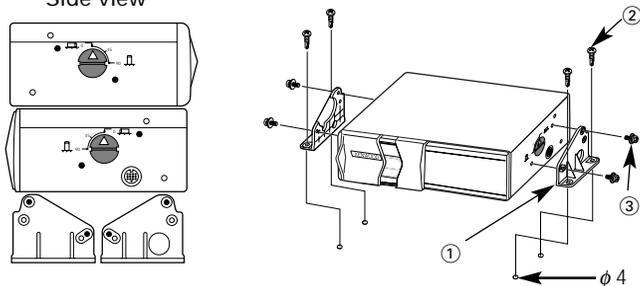
- Be sure not to place the unit on such place as where it is exposed to direct sunlight and temperature eventually rises. It results in the deformation of the case.
- Depending on the installing location, the display unit may not be able to receive the signals from the controller unit. Install them after confirming that the signals can be received.
- Install the unit in such a way that it does not disturb driving.

## Installation

### ■ Horizontal installation

Use the holes marked (●) to install the unit.

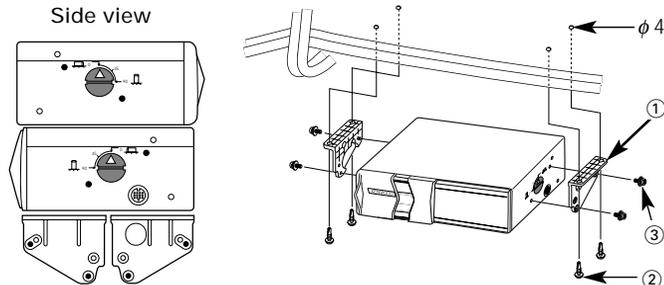
Side view



### ■ In case of hanging in the trunk

Use the holes marked (●) to install the unit.

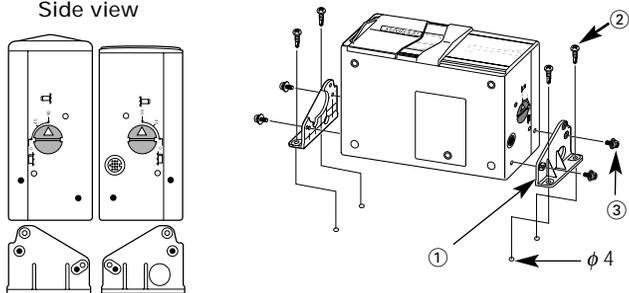
Side view



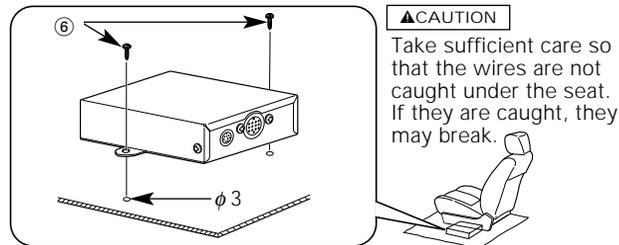
### ■ Vertical installation

Use the holes marked (●) to install the unit.

Side view

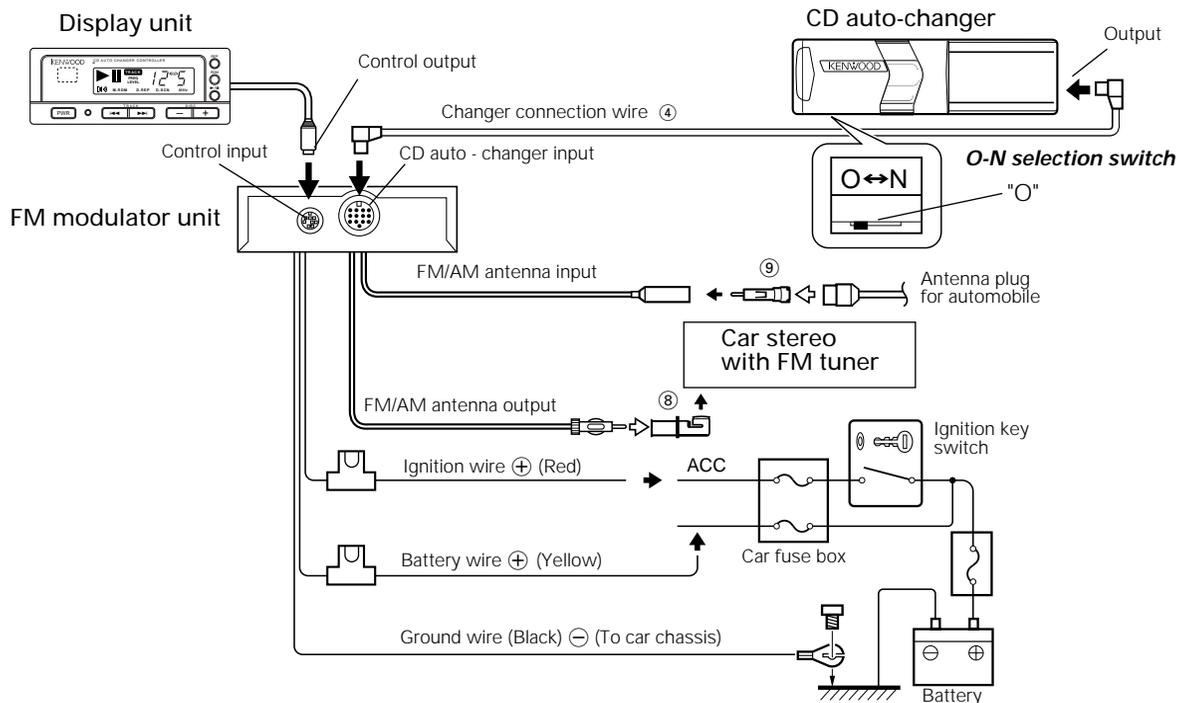


### ■ Installation of FM modulator unit



Install the FM modulator unit beneath the front seat using Metal fixture and Bind head screw as shown in the above figure.

# Connecting Wires to Terminals



## ▲WARNING

To prevent fire when the ignition wire (Red) or battery wire (Yellow) is short-circuited by coming into contact with the vehicle chassis (ground), only connect the power supply after making the fuse box connections.

## ▲CAUTION

Be sure to press the reset button after installation.

## NOTE

Do not install an antenna of radio equipment or distribute the antenna wire near the changer output wire, for this could cause malfunction with this unit.

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.
- ✓ No ACC position on vehicle ignition.
  - ☞ Connect the same wire to the ignition as the battery wire.

#### ? Nothing happens when the buttons are pressed.

- ✓ The computer chip in the unit is not functioning normally.
  - ☞ Press the reset button on the unit (page 4).

### Disc source

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

- ✓ The specified CD is quite dirty.
  - ☞ Clean the CD.
- ✓ The CD is upside-down.
  - ☞ Load the CD with the labeled side up.
- ✓ 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.

#### ? The specified track will not play.

- ✓ Random play or magazine random play has been selected.
  - ☞ Turn off random play or magazine random play.

#### ? Cannot play CD-R or CD-RW.

- ✓ Finalization processing is not being conducted for CD-R/CD-RW.
  - ☞ Conduct finalization processing with CD recorder.

#### ? Direct Track Search and Direct Album Search can't be done.

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

#### ? Track Search can't be done.

- ✓ For the albums first or last song.
  - ☞ For each album, Track Search can't be done in the backward direction for the first song or in the forward direction for the last song.

### MP3 source

#### ? Cannot play an MP3.

- ✓ Not conforming to ISO 9660 Level 1/2, Joliet, and Romeo.
    - ☞ Use a medium conforming to ISO 9660 Level 1/2, Joliet, and Romeo.
- 

- ✓ The MP3 has no or invalid track name extension.
    - ☞ Add the ".MP3" extension to the MP3 track name.
- 

- ✓ The media is scratched or dirty.
    - ☞ Clean the media, referring to the section on <CD cleaning> (page 8).
- 

#### ? Noise or no sound generated when an MP3 is played.

- ✓ The track has the MP3 track name extension while it is not an MP3.
    - ☞ Do not use the ".MP3" extension in non-MP3.
- 

#### ? Takes time before the unit starts playing MP3.

- ✓ The medium contains many albums, tracks, and hierarchical levels.
    - ☞ The unit checks all tracks on the loaded medium first. If the medium has many tracks recorded, it may take a long time for the unit before it starts playing MP3.
- 

#### ? Fails to play MP3 in the intended order.

- ✓ The MP3 tracks were not written by the CD writer in the order in which you wanted them to be played.
    - ☞ Depending on the CD writer, you may be able to set the order in which MP3 tracks are to be played by writing them onto a medium with their track names beginning with play sequence numbers such as "01" to "99".
- 

#### ? The sound skips when an MP3 is being played.

- ✓ The media is scratched or dirty.
    - ☞ Clean the media, referring to the section on <CD cleaning> (page 8).
  - ✓ The recording condition is bad.
    - ☞ Record the media again or use another media.
- 

#### ? Can't enter Folder Search mode.

- ✓ There's no folder recorded in the MP3 media.
    - ☞ Use a media with levels.
- 

#### ? The songs in the selected folder aren't played in Folder Search mode.

- ✓ There are no MP3 in the selected folder.
    - ☞ Make sure there's recorded content in the MP3 media.
- 

#### ? The MP3 track search takes time.

- ✓ Many tracks are recorded on the media.
    - ☞ When the media directory is complex, the track search can take time.
-

The following messages are displayed when certain problems are occurring in your system. Take the recommended actions.

- 01 E:** No disc magazine has been loaded in the changer. The disc magazine is not completely loaded.  
⇨ Load the disc magazine properly.
- 02 E:** No disc has been loaded in the disc magazine.  
⇨ Load a disc into the disc magazine.
- 04 E:** No disc has been loaded in the disc magazine.  
⇨ Load a disc into the disc magazine.  
The CD is quite dirty. The CD is upside-down. The CD is scratched a lot.  
⇨ Clean the CD and load it correctly.
- 77 E:** The unit is malfunctioning for some reason.  
⇨ Press the reset button on the unit. If the "77 E" code does not disappear, consult your nearest service center.
- 99 E:** 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 "99 E" code does not disappear, consult your nearest service center.
- 0d E:** 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.

#### Disc section

Laser Diode.....	GaAlAs ( $\lambda=780$ nm)
Digital Filter (D/A).....	8 Times Over Sampling
D/A Converter.....	1 bit
Spindle speed .....	1000 ~ 400 rpm (CLV)
Wow & Flutter.....	Below Measurable Limit
Frequency Response ( $\pm 1$ dB) .....	10 Hz ~ 20 kHz
Modulating Frequency (200KHz STEP) .....	87.7, 87.9, 88.1, 88.3, 88.5, 88.7, 88.9, 89.1, 89.3, 89.5, 89.7, 89.9, MHz

#### General

Operating Voltage.....	14.4 V (11 ~ 16 V)
Current consumption.....	1.4 A
Operating Temperature.....	-10 ~ 50 °C

#### Size (W × H × D)

CD changer .....	250 × 80 × 176 mm (9-13/16 × 3-1/8 × 6-13/16 in.)
Controller .....	43 × 135 × 22 mm (1-11/16 × 5-5/16 × 7/8 in.)
Display unit .....	105 × 40 × 18 mm (4-1/8 × 1-9/16 × 11/16 in.)
FM modulator unit.....	150 × 30 × 80 mm (5-7/8 × 1-3/16 × 3-1/8 in.)
Trim mount plate.....	188 × 58 × 2 mm (7-3/8 × 2-5/16 × 1/16 in.)

#### Weight

CD changer.....	2.0 kg (4.4 lbs)
Controller.....	0.050 kg (0.11 lbs)
Display unit.....	0.125 kg (0.28 lbs)
FM modulator unit .....	0.600 kg (1.3 lbs)