KENWOOD

COMPACT HI-FI COMPONENT SYSTEM CLX-70 INSTRUCTION MANUAL

Kenwood Corporation

Declaration of Conformity with regard to the EMC Directive 2004/108/EC

Manufacturer: Kenwood Corporation 2967-3 Ishikawa-machi, Hachioji-shi, Tokyo, 192-8525 Japan

EU Representative's:

Kenwood Electronics Europe BV Amsterdamseweg 37, 1422 AC UITHOORN, The Netherlands













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Before applying power

⚠ Caution : Read this page carefully to ensure safe operation.

Units are designed for operation as follows.

Australia	AC 240 V only
Europe	AC 230 V only

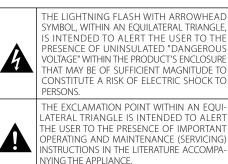
Safety precautions

WARNING : TO PREVENT FIRE OR ELECTRIC SHOCK, DO NOT EXPOSE THIS APPLIANCE TO RAIN OR MOISTURE.





CAUTION: TO REDUCE THE RISK OF ELECTRIC SHOCK, DO NOT REMOVE COVER (OR BACK). NO USER-SERVICEABLE PARTS INSIDE. REFER SERVICING TO QUALIFIED SERVICE PERSONNEL.



The marking of products using lasers



The marking this product has been classified as Class 1. It means that there is no danger of hazardous radiation outside the product. Location: Back panel



⚠ Caution : Read this page carefully to ensure safe operation.

Read These Instructions

– All the safety and operating instructions should be read before the product is operated.

Keep These Instructions

– The safety and operating instructions should be retained for future reference.

Heed All Warnings

– All warnings on the product and in the operating instructions should be adhered to.

Follow All Instructions

– All operating and use instructions should be followed.

1. Clean only with dry cloth

– Unplug this product from the wall outlet before cleaning. Do not use liquid cleaners or aerosol cleaners. Use a damp cloth for cleaning.

2. Attachments

- Only use attachments/accessories specified by the manufacturer.

3. Do not use this apparatus near water

- This product shall not be exposed to dripping and splashing - for example, near a bath tub, wash bowl, kitchen sink, or laundry tub; in a wet basement; or near a swimming pool; and the like. Do not place an object containing liquid, such as a flower vase, on the appliance.

4. Accessories

- Use only with the cart, stand, tripod, bracket, or table specified by the manufacturer, or sold with the apparatus. When a cart is used, use caution when moving the cart/apparatus combination to avoid injury from tip-over.



5. Ventilation

– Slots and openings in the cabinet are provided for ventilation and to ensure reliable operation of the product and to protect it from overheating. Do not block any ventilation openings. Install in accordance with the manufacturer's instructions. The openings should never be blocked by placing the product on a bed, sofa, rug, or other similar surface. This product should not be placed in a built-in installation such as a bookcase or rack unless proper ventilation is provided or the manufacturer's instructions have been adhered to.

6. Power Sources

– This product should be operated only from the type of power source indicated on the product. If you are not sure of the type of power supply to your home, consult your product dealer or local power company.

7. CAUTION - Polarization

– Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding type plug has two blades and a third grounding prong. The wide blade or the third prong are provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.

8. Power Cord Protection

 Protect the power cord from being walked on or pinched particularly at plugs, convenience receptacles, and the point where they exit from the apparatus.

9. Lightning

- Unplug this apparatus during lightning storms or when unused for long periods of time.

10. Overloading

- Do not overload wall outlets, extension cords, or integral convenience receptacles as this can result in a risk of fire or electric shock.

11.Object and Liquid Entry

 Never push objects of any kind into this product through openings as they may touch dangerous voltage points or short-out parts that could result in a fire or electric shock. Never spill liquid of any kind on the product.

12. Servicing

 Do not attempt to service this product yourself as opening or removing covers may expose you to dangerous voltage or other hazards. Refer all servicing to qualified service personnel.

13. Damage Requiring Service

– Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as power-supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.

14. Replacement Parts

– When replacement parts are required, be sure the service technician has used replacement parts specified by the manufacturer or have the same characteristics as the original part. Unauthorized substitutions may result in fire, electric shock, or other hazards.

15. Safety Check

 Upon completion of any service or repairs to this product, ask the service technician to perform safety checks to determine that the product is in proper operating condition.

16. Heat

 Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat. Do not place a flaming object, such as a candle or lantern, or near the product.

17. Power Lines

– An outside antenna system should not be located in the vicinity of overhead power lines or other electric light or power circuits, or where it can fall into such power lines or circuits. When installing an outside antenna system, extreme care should be taken to keep from touching such power lines or circuits as contact with them might be fatal.

Notes:

Item 7 is not required except for grounded or polarized equipment.

Before use

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Unpacking

Unpack the unit carefully and make sure that all accessories are present.

FM indoor antenna	(1)
AM loop antenna	(1)
Remote control unit	
with a built-in button battery	(1)
AC adapter (AC-18335A)	(1)
Power cord (For Europe)	(1)
Power cord (For Australia)	(1)

If any accessories are missing, or if the unit is damaged of falls to operate, notify your dealer immediately. If your unit was shipped to you directly, notify your shipper immediately. Kenwood recommends that you retain the original carton and packing materials in case you need to move or ship the unit in the future.

Keep this manual handy for future reference.

How to read this manual

Most of the functions are designed to be able to operate from the remote control unit.

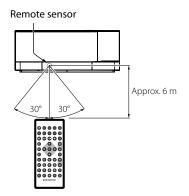
Preparing the remote control unit

Pull the battery sheet out from the remote control unit to the direction of the arrow.



Operation

When the power cord is plugged in, **STANDBY** indicator is lit. The power turns ON by pressing button on the remote control unit pointing at the remote sensor. When the power comes on, press the button you want to operate.



- The supplied battery may have shorter live than ordinary battery due to use during operation checks.
- When the remote-controllable distance gets shorter than before, replace the battery with a new one.
- Placing the remote sensor in direct sunlight, or in direct light from a high frequency fluorescent lamp may cause a malfunction.

In such a case, change the location of the system installation to prevent malfunction.

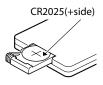
Changing the battery of the remote control unit

Use a commercially available button battery (CR2025).

1 Insert something narrow like a paperclip into the hole 1 and pull out the battery tray.

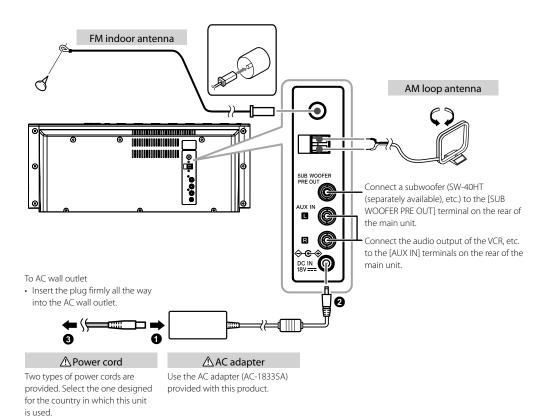


2 Replace the old battery with a new one.



A CAUTION

- Lithium battery.
 Danger of explosion if the battery is incorrectly replaced.
 Replace only with the same or equivalent type.
- The battery pack or batteries shall not be exposed to excessive heat such sunshine, fire or the like.
- Keep battery out of reach of children and in original package until ready to use. Dispose of used batteries promptly. If swallowed contact physician immediately.



The power in this equipment will not be completely cut off from the wall outlet when the standby switch is turned off. Install the equipment so that the wall outlet is easily accessible and, in case of emergency, immediately unplug the power plug from the wall outlet.

Mains plug is used as the disconnect device, It shall remain readily operable and should not be obstructed during intended use.

A CAUTION

Be sure to adhere to the following, or proper ventilation will be blocked causing damage or fire hazard (Main unit and AC adapter).

- Do not place a cloth on the system or place it on a carpet or cushion.
- Do not use the system in a poorly ventilated place.
- Do not place any objects impairing heat radiation onto the top of the unit.
- Leave some space around the unit (from the largest outside dimension including projection) equal to or greater than, shown below.

Top panel : 50 cm /Side panel : 15 cm Back panel : 15 cm

Connecting the FM antenna

- 1 Connect the lead to the [FM 75 Ω] terminal.
- 2 Find the location that gives the best reception.



- 3 Secure the antenna as high up as possible.
- The antenna supplied with the system is a basic antenna for indoor use. For stable signal reception, the use of an outdoor antenna (commercially available) is recommended. Disconnect the indoor antenna first before connecting an outdoor antenna.

<u>A</u>CAUTION

 Since antenna installation necessitates skill and experience, always consult your dealer before installation. The antenna should be placed at a distance from the power distribution wires. Otherwise, an electric shock accident may occur if the antenna falls down.

Connecting the AM antenna

1 Connect the AM antenna cord to the [AM] and [HGND] terminals.



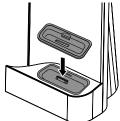
2 Setup the antenna in the position and the direction to be able to receive AM broadcast.



 The antenna supplied with the system is for indoor use. Place it as far away as possible from the system, your TV set, the speaker cords, AC adapter and the power cord, and point it in the direction that provides the best reception.

Connecting the iPod dock adapter

1 Insert the Dock adapter into unit.



2 Connect your iPod/iPhone.



To remove Dock adapter

 Insert a thin object such as the tip of a flat-blade screwdriver into the slit on the dock adapter and lift it to remove.





- Connect an iPod dock adapter, which is provided with your iPod/iPhone or commercially available in iPod dealers, to the iPod dock of this unit. Note that the iPod adapter is not provided with this unit.
- See page 9 for the supported iPod/iPhone models.

About MP3 and WMA

The playable MP3/WMA file (hereafter called **Audio file**) and the media format have the following limitation. The Audio file, which is not conforming to the specification, may not play normally.

Playable Audio file

Playable MP3 file

- File formats: MPEG 1/2 Audio Layer 3 file
- Extension: .mp3
- Transfer bit rate: 8 kbps 320 kbps
- Sampling frequency: 48/ 44.1/ 32/ 24/ 22.05/ 16/ 12/ 11.025/ 8 kHz

Playable WMA file

- File format: Windows Media™ Audio compliant
- Extension: .wma
- Transfer bit rate: 32 kbps 320 kbps
- Sampling frequency: 48/ 44.1/ 32 kHz
- Files created using functions in Windows Media[™] Player 9 or later cannot be played.
 - WMA Professional
 - WMA Lossless
 - WMA Voice



- 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 conditions.
- The unit may not be compatible with upgrade of compression format standard and additional specifications.
- Audio files encoded using VBR (Variable Bit Rate) may use bit rates that fall outside the supported range. Audio files with bit rates outside the supported range cannot be played.

Playable storage media

- · CD-ROM, CD-R, CD-RW
- USB device (USB version 1.1/2.0)
- SD, SDHC, mimi SD, micro SD/SDHC card



- CD-RW discs which are quick formatted by the writing software cannot be used.
- When recording to the maximum CD-R/RW media capacity at once, the writing software is set to "Disc at once".
- For details on the available USB devices, refer to <About USB device> (page 9).
- For details on the available SD/SDHC card, refer to <About SD card> (page 9).

Playable CD-R/RW format

- ISO 9660 Level 1/2
- Joliet

Playable file format of USB device/ SD card

• FAT 16/32

The maximum number of characters for display

- File/Folder name: 30/ 9 characters
- MP3 ID3 TAG/ WMA Contents property: 30 characters WMA Contents property (album name): 14 characters (The information which can be displayed with this unit: title, artist name, and album name)

- 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/ 2.2/ 2.3/ 2.4
- A character that cannot be displayed with this unit is displayed incorrectly or substituted by "-".

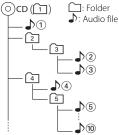
Limitation of structure for the file and the folder

- Maximum number of folders: 255 (including root folder)
- Maximum number of files per folder: 999 (including the number of folders)

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.

Example



• Playing order

Playing order after 1 play:



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.



- 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.

Supported iPod/iPhone

Made for

- iPod nano (6th generation)
- iPod nano (5th generation)
- iPod nano (4th generation)
- iPod nano (3rd generation)
- iPod nano (2nd generation)
- iPod classic
- iPod touch (4th generation)
- iPod touch (3rd generation)
- iPod touch (2nd generation)
- iPod touch (1st generation)
- iPhone 4
- iPhone 3GS
- iPhone 3G
- iPhone

- Be sure to update the software of your iPod/iPhone to the latest version.
- The iPod/iPhone cannot be connected together with its accessories such as the cover or case. Be sure to remove any accessories before connecting the iPod/iPhone.
- When the iPod/iPhone is detached from the iPod dock, the TV Out setting of the iPod/iPhone may sometimes be set to On. Check this setting if the iPod/iPhone cannot display video.

Handling discs

Handling precautions

Hold a CD taking care not to touch the played surface. (The side without the printed label is the playback side.)

Discs playable on the system

This system can play back a CD, CD-ROM, CD-R, CD-RW or the audio part of a CD-EXTRA disc.

Notes on CD-ROM/CD-R/CD-RW discs

If the CD-ROM, CD-R or CD-RW disc in use has a printable label surface, the disc may be unable to be taken out of the system due to sticking of the label surface. To prevent malfunction of the system, do not use such a disc.

Cautions on CD discs

Always use a CD carrying the different marking. A disc without this marking may be unable to be played back correctly.

The disc rotates at a high speed during playback. Never use a cracked, chipped or greatly warped disc. Otherwise, damage or malfunction of the player may result.

Also, do not use a disc with a non-circular shape as this may result in malfunction.

About SD card

Available SD card

- SD, SDHC, mimi SD, micro SD/SDHC card
- An SD card of 512 MB to 32 GB can be used.

SD card (Write protect switch)

The SD card a switch for inhibiting data write in it. Set the switch to "LOCK" when you want to protect the written data. Set the switch to the unlock position before starting recording.



 \square

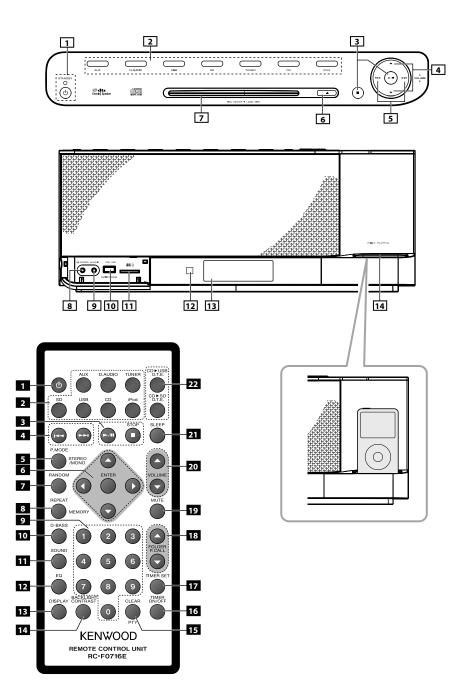
- A special adapter is required for using a mini SD/micro SD card.
- A multimedia card (MMC) cannot be used.

Usable D.AUDIO

To control a Kenwood digital audio player from the main unit or remote control unit, the Kenwood digital audio player connection cable is necessary.

Usable Kenwood digital audio player models		
HDD audio player	Memory audio player/recorder	
HD20GA7	MGR-E8/MGR-A7/M2GD55/	
	M1GD55/M1GC7/M2GC7	

Component names and functions



To switch the system on or to standby mode. To change the time display for CD. To change the information display for audio files. [STANDBY] indicator To change the display for Radio Data System. Red lighting: Ordinary standby mode To change the display for clock. Orange lighting: Timer standby mode 14 BACKLIGHT/CONTRAST button 2 2 Source buttons To switch the display backlight and illumination on TUNER/CD/USB/SD/iPod/D.AUDIO/AUX and off. button To adjust the display contrast. To select the source you want, or to turn the system on 15 **CLEAR/PTY** button to the selected source. To delete the track/file number entered during track. When you select TUNER source, press TUNER button to To carry out PTY search. select the desired waveband FM or AM. 16 TIMER ON/OFF button $3 3 \rightarrow / 1$ button To switch the timer on/off. To start or interrupt playback for CD, audio file, iPod, 17 TIMER SET button iPhone and D.AUDIO. To set the clock. **STOP** ■ button To set the timer. To stop playback for CD, audio file and D.AUDIO. To set the A.P.S. **4 5 |⊲⊲** / **▶▶|** buttons 18 **FOLDER/P.CALL** ▲/▼ buttons To search forward/backward to next/previous track To select an album (folder) of audio files and iPod. for CD. iPhone. To skip tracks for CD. To select a preset radio station for TUNER. To search forward/backward or to skip to the next/ 19 **MUTE** button previous files for audio files and iPod, iPhone. To interrupt and resume sound reproduction. To tune to higher/lower radio frequency or search radio stations for TUNER. 20 4 VOLUME ▲/▼ buttons 5 P.MODE button To increase or decrease the volume. To program tracks/files for CD and audio file. 21 **SLEEP** button STEREO/MONO button To select the sleep time. To switch between stereo mode and mono mode (on 22 CD USB O.T.E. button FM band only) for TUNER. To record from CD to a USB device. 6 **MULTI CONTROL** ▲/▼/ ◀ / ▶ buttons CD > SD O.T.E. button Press to select a setting item. To record from CD to a SD card. **ENTER** button 6 [▲] button Press to enter the selected item To eject the disc. 7 **RANDOM** button 7 Disc slot To playback in random order for CD, audio file and 8 PHONES jack iPod, iPhone. 9 D.AUDIO input terminal 8 **REPEAT** button To repeat one track/file or all tracks/files for CD, audio 10 USB connector file and iPod, iPhone. 11 SD card slot 9 digit 0 - 9 buttons 12 Remote sensor To select a track/file number for CD and audio file. 13 Display To select a preset radio station for TUNER. 10 14 iPod/iPhone applied part connector **D-BASS** button To switch on/off bass enhancement Standby mode 11 **SOUND** button While the STANDBY indicator is lit, a small amount of power is To select the desired DTS Envelo Speaker for the 3D surround effect: DTS Envelo ON:1, ON:2 or OFF. supplied to the system to back up the memory. This is called standby mode. Under the condition, the system can be turned 12 EO button ON by the remote control unit. To select the desired sound effect : POP, CLASSIC, ROCK, JAZZ, GAME or FLAT (off).

13

DISPLAY button

1 1 U button

Basic function

Switching the system on

Press (¹), TUNER, CD, USB, SD, D.AUDIO, iPod, AUX button.

The **[STANDBY]** LED will go out. The system will switch to the last selected source or the selected source.

Switching the system to standby mode

Press 🕛 button.

[STANDBY] indicator is lit.

Volume control

Press VOLUME \blacktriangle button to increase, or press VOLUME \blacktriangledown to decrease the volume level.

"VOL XX" is displayed. Adjust in the range from 0 (MIN.) to 40 (MAX.).

To switch off the volume temporarily

Press MUTE button.

Playback continues without sound, and "MUTE" is displayed.



 To restore the volume, press MUTE button again or adjust the volume.

Sound control

The sound control system feature enables you to enjoy special sound effects; 3D surround effect, preset equalizer settings and bass enhancement, providing the best music reproduction.

To switch on DTS Envelo Speaker settings

Press SOUND button to select DTS Envelo Speaker for the 3D surround effect: DTS Envelo ON:1, ON:2 or OFF.

When an effect other than OFF is selected, the "DTS" appears on the display.

To switch on preset equalizer settings

Press EQ button to select the desired sound effect: POP, CLASSIC, ROCK, JAZZ, GAME or FLAT (off).

When an effect other than FLAT is selected, the "EQ" icon appears on the display.

To switch on the bass enhancement

Press D-BASS button to adjust the enhancement level: D-BASS 1 to 10 or OFF.

The "EQ" icon appears on the display.



- Pressing [D-BASS] cancels the equalizer settings (EQ).
- Pressing [EQ] cancels the low frequency enhancement (D-BASS) and DTS Envelo Speaker effect (SOUND).
- The DTS Envelo Speaker effect is cancelled when headphones are connected.

Headphones

To listen to your stereo with headphones (separately available), use the 3.5 mm phones jack on the main unit.

Connecting headphones mutes the sound from the speakers.

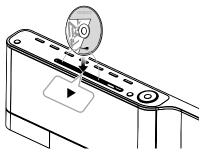
⚠ CAUTION

• Excessive sound pressure from earphones or headphones can cause hearing loss.

Preparation

Inserting a disc

- 1 Press CD button.
- 2 Insert a disc into the disc slot with the label side facing forward.



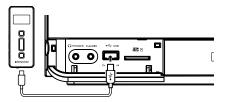
For a CD, the total playtime and total number of tracks will appear in the display. For an audio file-CD, the total album number and total file number will appear on the display.

Removing a disc

 Press [▲] button. "EJECT" is displayed and the disc is ejected.

Inserting a USB device

- 1 Press the 🕛 button to select standby mode.
- 2 Insert a USB device to the USB connector on the front panel.



3 Press USB button.

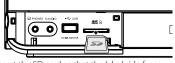
"USB" is displayed. The total album number and total file number will appear on the display.

Removing the USB device

- 1 Press the 🕛 button to select standby mode.
- 2 Remove the USB device.

Inserting an SD card

- **1** Press the \bigcirc button to select standby mode.
- 2 Insert the SD card into the SD card slot until it clicks.



Insert the SD card so that the label side faces up and the side with a cut comes on the right.

3 Press SD button.

The total album number and total file number will appear on the display.

Removing the SD card

- 1 Press the 🕛 button to select standby mode.
- 2 Remove the SD card.

- To ensure good system performance; wait until the unit completely reads the disc/USB device/SD card before proceeding.
- If the disc compartment is not loaded with a disc, "NO DISC" is displayed.
- If the disc is unreadable or there is no playable audio file in the USB device/SD card , "NO DATA" is displayed.
- For audio files, reading time may exceed 10 seconds due to the large number of songs compiled into one disc/ USB device/ SD card.
- The icon "MP3" appears only when an MP3-file is played. The icon "WMA" appears only when an WMA-file is played.

Playing a CD/ audio file

Press ►/II button to start playback.

The track/file number and elapsed playing time of the current track/file appear on the display.

Basic operations

Operation type	Operation
To stop playback	Press STOP button.
To interrupt	Press ▶/ II button.
playback	Press again to resume playback.
To search for a	Press and hold I or >> button for
particular passage	more than 2 seconds.
during playback	Press the ▶/III button when the desired
	passage is located.
To select a track/ file	Press I or I button in play or pause
	mode.
To select a folder	Press FOLDER/P.CALL 🔺 or 🔻 button
(For audio file only)	in play or pause mode.

- For audio file; "DIR:xxx TRK:xxx" appears on the display.
 "DIR:xxx" indicates album number and "TRK:xxx" indicates the file number.
- The digit buttons, 0–9 on the remote control unit can also be used to select a track/file.

Press the digit buttons as shown below:

	CD	Audio file
To select track/file 2	2 and ENTER	2 and ENTER
To select track/file 23	2 and 3	2, 3 and ENTER
To select file 120	_	1, 2 and 0

If the **ENTER** button is not pressed, the search for the selected track/file will start in 5 seconds.

Programming tracks/files

Programming tracks/files of a CD/audio file is possible when playback is stopped. Up to 30 tracks can be stored in the memory in any order.

1 In stop mode, press P.MODE button to enter program setting.

The icon "PGM" and "P-01 T--"/ "P-01 T---" appears on the display. "T--" indicates track number of the CD. "T---" indicates file number of the audio file. "P-01" indicates program number. The icon "PGM" starts flashing.

- 2 Press MULTI CONTROL ▲ or ▼ button, or digit buttons 0–9 to select the desired track/file.
- **3** Press ENTER button to store the selected track/ file.

The track/file number returns to "T--"/"T---" and the next program number appears on the display.

4 Repeat steps 2 to 3 to select and store other desired tracks/files in this way.

The icon "PGM" appears on the display.

5 Press ►/II button to play the programmed tracks/files.

- "PGM FULL" appears on the display, if you attempt to program more than 30 tracks/files.
- Audio files can only be programmed within the same source.
- Now enter the new track/file number with either method below.
 - Press the MULTI CONTROL ▲ or ▼ button to select the desired track/file.
 - Press the CLEAR button to clear the track/file number programmed. Select the new track/file number using digit buttons "0" to "9" on the remote control unit.
- If you press **REPEAT** button during programmed playback, the current track or all programmed tracks/files is/are played repeatedly.

The icon "REP." or "REP. ALL" and the icon "PGM" appear on the display.

To clear the program

Press P.MODE button.

The icon "PGM" disappears from the display.



- "P" represents PROGRAM.
- The function of program setting cannot be used in PLAY/ $\ensuremath{\mathsf{PAUSE}}$ mode.

Random play

You can play all the tracks/files in random order.

1 During playing, pause or stop mode, press RANDOM button to enable random play mode.

The icon "RDM" appears on the display.

2 To exit random mode, press RANDOM button again.

The icon "RDM" disappears from the display.

Repeat play

You can play the current track/file/album or the whole disc/audio file repeatedly.

Press REPEAT button in play or pause mode.

Every time the button is pressed, the repeat play changes in the following order:

For CD :

Repeat mode	lcon
Repeat a single track	"REP."
Repeat all the tracks *1	"REP. ALL"
Repeat off	—

For audio file :

Repeat mode	lcon
Repeat a single file	"REP."
Repeat one album *2	"REP. ALB."
Repeat all the files *1	"REP. ALL"
Repeat off	_



*1 All tracks/files are repeated continuously.

• *² This function cannot be used in program mode.

Changing the display information

Press DISPLAY button in play or pause mode.

Every time the button is pressed, the display changes in the following order:

For CD :

Information	lcon
Status display	—
The current track elapsed time.	—
The current track remaining time.	"REMAIN"
The whole disc elapsed time.	"TOTAL"
The whole disc remaining time.	"TOTAL REMAIN"
The whole CD time.	_

For audio file :

Information	lcon
Status display	_
Album name and file name.	_
Tag information (Track, album title and	_
artist name).	
Album number and track number.	_

Recording on a USB device or SD card (For CD only)

Records songs in the CD to the USB device or SD card in MP3 format.

1 Insert a USB device to the USB connector or SD card on the front panel.

2 To record all the tracks: Stop playback.

To record a single track: Play the track to be recorded.

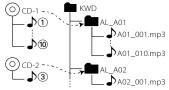
3 Press CD ► USB O.T.E. or CD ► SD O.T.E. button to begin recording.

When you stop the recording

Press ■ stop button.



- During recording, it is not possible to listen to another source.
- The recorded music files and folders accommodating them are numbered automatically. These number can later be modified.
 - Numbers assigned to folders: AL_A01...AL_A99...AL_Z99
 - Numbers assigned to music files: A01_001.mp3, A01_002.
 mp3.../ A99_001.mp3.../ Z99_001.mp3...
 - Example



- Music is encoded according to specification below.
 Format: MP3
 - Transfer bit rate: 192 kbps
- Sampling frequency: 44.1 kHz
- Recordable USB device or SD card
 - USB standard: USB 1.1/2.0
 - SD, SDHC, mimi SD, micro SD/SDHC card
 - An SD card of 512 MB to 32 GB can be used.
 - File system: FAT 16/32

Program recording (For CD only)

Desired CD tracks can be programmed in the desired sequence and recorded onto a USB device or SD card.

- 1 Insert a USB device to the USB connector or SD card on the front panel.
- **2 Program the desired sequence of CD tracks.** See page 14 for programming procedure.
- 3 Press CD ▶ USB O.T.E. or CD ▶ SD O.T.E. button to begin recording.

Tuning in radio stations

- 1 Press TUNER button to select the desired waveband: FM or AM.
- 2 Press and hold I ← or ►►I button to tune in to the desired frequency.



• To tune to a weak station, briefly press I ◄ or ►►I button repeatedly until the display shows the desired frequency or when the best reception has been obtained.

STEREO/MONO

Press the STEREO/MONO button to select mono or stereo mode.

When stereo mode is selected, the icon "STEREO" appears on the display (if current station is FM stereo).



• You are able to select stereo or mono mode in FM band only.

Auto preset

Radio stations can be preset automatically in preset channels.

- 1 Press TUNER button to select the desired waveband: FM or AM.
- 2 Press MEMORY/REPEAT button for more than 2 seconds.

The receivable radio stations are preset automatically.

When the Auto preset operation has completed, the unit enters the condition in which preset station P01 is tuned.

Manual preset

You can store up to 30 for FM and 10 for AM radio stations in the memory. When a preset radio stations selected, the preset number appears on the display.

- 1 Press TUNER button to select the desired waveband: FM or AM.
- 2 Press I ← or ► → button to tune in to the desired frequency.
- **3** Press MEMORY/REPEAT button so that "P -" appears on the display.
- 4 If you want to store the radio station to another preset number, press FOLDER/P.CALL ▲ or ▼, or digit buttons 0–9 to select the desired preset number.
- **5** Press ENTER button again to store the radio station.
- **6** Repeat steps 2 to 5 to store other preset radio stations.



• During preset, if no button is pressed within 20 seconds, the system will exit preset mode automatically.

Tuning to a preset radio station

Press FOLDER/P.CALL \blacktriangle or \blacktriangledown , or digit buttons 0–9 to select the desired preset number.

The preset number and radio frequency appear on the display.



Press the digit buttons as shown below:

	FM	AM
To select 1	1 and ENTER	1 and ENTER
To select 2	2 and ENTER	2 and ENTER
To select 10	1, 0 and ENTER	1, 0 and ENTER

Using Radio Data System

Radio Data System is a system that transmits useful information (in the form of digital data) for FM broadcasts along with the broadcast signal. Tuners and receivers designed for Radio Data System reception can extract the information from the broadcast signal for use with various functions, such as automatic display of the station name.

Radio Data System functions

PTY (Program TYpe Identification) Search:

Automatically tunes to a station that is currently broadcasting the specified program type (genre).

PS (Program Service Name) Display:

Automatically displays the station name transmitted by the Radio Data System station.

Radio Text function:

Displays the radio text data transmitted by some Radio Data System stations when you press the **DISPLAY** button. There is "NO TEXT" display if no text data is transmitted.



• Some functions and function names may differ in certain countries and areas.

Changing the Radio Data System display information

While receiving a Radio Data System station, pressing the **DISPLAY** button changes the contents of the display.

Every time the button is pressed, the display changes in the following order:

Information
PS (Program Service name) display
PTY (Program TYpe) display
RT (Radio Text) display
Frequency display and preset number display

Tuning by Program Type (PTY search)

This function lets you set the tuner to automatically search for stations which are currently broadcasting the type of program (genre) you want to listen to.

- 1 Press TUNER button to select FM.
- 2 Press PTY button.

If the current station is with Radio Data System, the program type of the station is displayed.

3 Press FOLDER/P.CALL ▲ or ▼ button to select your desired program type.

Program type table

Program Type Name	Display
News	"NEWS"
Current Affairs	"AFFAIRS"
Information	"INFO"
Sport	"SPORT"
Education	"EDUCATE"
Drama	"DRAMA"
Culture	"CULTURE"
Science	"SCIENCE"
Varied Speech	"VARIED"
Pop Music	"POP M"
Rock Music	"ROCK M"
Easy Music	"EASY M"
Light Classical Music	"LIGHT M"
Serious Classical Music	"CLASSICS"
Other Music	"OTHER M"
Weather	"WEATHER"
Finance	"FINANCE"
Children's Program	"CHILDREN"
Social Affairs	"SOCIAL"
Religion	"RELIGION"
Phone In	"PHONE IN"
Travel	"TRAVEL"
Leisure	"LEISURE"
Jazz Music	"JAZZ"
Country Music	"COUNTRY"
National Music	"NATION M"
Oldies Music	"OLDIES"
Folk Music	"FOLK M"
Documentary	"DOCUMENT"

4 Press PTY button to start searching.



- Under certain receiving conditions, it may take more than 1 minute to complete the search.
- If the desired program type cannot be found, "NO PROGRAM" is displayed, then after several seconds the display returns to the original display.

Using the AUX

Playing an external component

An external component can be connected to AUX IN of this unit and played back.

1 Connect an external component.

Connect an external component to the [AUX IN] connector on the rear of this unit.

- 2 Press AUX button.
- **3** Start playing the connected external component.

Using the iPod/iPhone

Inserting an iPod/iPhone

1 Connect a iPod/iPhone to the iPod applied part.

2 Press iPod button.

The icon "iPod" appears on the display.

Playing an iPod/iPhone

Press ►/II button to start playback.

Basic operations

Operation type	Operation
Call to iPod/iPhone	Press 🗲 button. Call to iPod/iPhone
menu display	menu display.
	Press to \blacktriangle or $ullet$ button enter the
	selected iPod/iPhone menu item and
	press ENTER button
To interrupt	Press ▶/ III button.
playback	Press again to resume playback.
To search for a	Press and hold I or >>> button.
particular passage	Release to resume the playback.
during playback	
To select a song	Press I 🖛 or 🍽 button.
To select a album *1	Press FOLDER/P.CALL 🔺 or 🔻 button.

*1 The operation varies depending on the model of iPod/iPhone

Model other than iPod		iPod touch/iPhone	
touch/iPhone			
The operation is available when one of the following items is selected.		The album is switched to the next album found by following the alphabetical order of track names.	
Browse item Selection			
Artists, Composers	All Albums		Track-A1 Album-A
Albums, Compilations	All Songs		Track-B1 Album-B Track-B2 Album-B
Genres	All Artists		Track-C1 Album-C イ

Repeat play

You can play the current song or the all songs repeatedly.

Press REPEAT button.

Each press switches the selection of iPod/iPhone play mode.

Random play

You can play all the album in random order.

Press RANDOM button.

Each press switches the selection of iPod/iPhone play mode.



The displayed icon may not match the actual operation with certain iPod/iPhone models.

Using the D.AUDIO

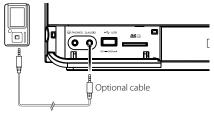
Playback of Digital Audio Player

Kenwood digital audio player can be connected to play audio files in it.

1 Connect an the player.

Connect a Kenwood digital audio player to the [D.AUDIO] connector using an optional cable or adapter. Also read the instruction manual for the connected component.

Kenwood digital audio player



- 2 Press D.AUDIO button.
- **3** Turn the connected player ON and start playing it.

Basic operations

Operation type	Operation
To stop playback	Press STOP button.
To interrupt	Press ▶/III button.
playback	Press again to resume playback.
To search for a	Press and hold I or >> button for
particular passage	more than 2 seconds.
during playback	
To select a track/ file	Press I or I button in play or pause
	mode.
To select a folder	Press FOLDER/P.CALL or button
	in play or pause mode.



• Some control operations may be unavailable depending on the connected player.

Adjusting the display brightness (BACKLIGHT)

The brightness of the display backlight can be adjusted and how the display backlight and illuminations of this unit are lit can be selected.

- **1** Press BACKLIGHT/CONTRAST button.
- 3 Press MULTI CONTROL ◀ or ▶ button to select the backlight setting and press ENTER button to store the setting.

Setting	Function
BACKLIGHT: 1	Both the display backlight and
	illuminations are turned on.
BACKLIGHT: 2	The display backlight is turned on and
	the illuminations are turned off.
BACKLIGHT: 3	The display backlight is turned off and
	the illuminations are turned on.
BACKLIGHT: 4	Both the display backlight and
	illuminations are turned off.

When the setting completes, "COMPLETE" is displayed and the unit exits the setup mode automatically.

Adjusting the display contrast (CONTRAST)

The contrast of the display can be adjusted.

- **1** Press BACKLIGHT/CONTRAST button.

Setting	Function
10	_
2 🗆	_
3 🗆 🗆 🗆	Adjusting for 5 steps
4 0000	
5 0000	

When the setting completes, "COMPLETE" is displayed and the unit exits the setup mode automatically.

Setting Auto Power Save (A.P.S.)

A.P.S. stands for Auto Power Save, which is the function that switches this unit OFF when it has not been controlled for more than 30 minutes while its power is ON and the CD and other inputs are in stop mode.

- **1** Press TIMER SET button.

Setting	Function
A.P.S. ON	A.P.S. mode is ON.
A.P.S. OFF	A.P.S. mode is OFF.

When the setting completes, "COMPLETE" is displayed and the unit exits the setup mode automatically.

When the A.P.S. is ON...

A.P.S. is activated when this unit is in either condition below.

- When the input source is TUNER, AUX, D.AUDIO or iPod, the volume level is 0 and no button has been pressed for 30 minutes.
- When the input source is CD, USB or SD, the CD player or USB device or SD is in stop mode and no button has been pressed for 30 minutes.



 When the A.P.S. is activated, the display shows flashing "A.P.S." from about one minute before this unit is switched OFF.

Clock/timer operation

Clock setting

- 1 Press TIMER SET button.

"CLOCK SETTING" appears on the display.

- **3** Press ENTER button. The hour indication will start flashing.
- 4 Press MULTI CONTROL ▲ or ▼ button to set the hours and press ENTER button. The minute indication starts flashing.

The finitude indication starts hashing.

5 Press MULTI CONTROL ▲ or ▼ button to set the minutes and press ENTER button.

When the setting completes, "COMPLETE" is displayed and the unit exits the setup mode automatically.

- The clock setting will be erased when the power cord is disconnected or a power failure occurred.

Timer setting

The system can switch on to CD, USB, SD, TUNER or iPod automatically at a preset time, serving as an alarm to wake you up.

Important!

Before setting the timer, ensure that the clock is set correctly.

- **1** Press TIMER SET button.
- **3** Set the time to start playback.

The icon "ON" starts flashing.

Press MULTI CONTROL \blacktriangle or \checkmark button to set timer start hours and press ENTER button to store the setting. Repeat the same procedure to set the minutes.

The icon "OFF" starts flashing.

4 Repeat the step 3 to set the time to stop the timer (off time).

The icon "TIMER" flashes and the source display appears.

5 Press MULTI CONTROL ▲ or ▼ button to select the desired source and press ENTER button to store the setting.

The source switches as follows : "CD" \rightarrow "USB" \rightarrow "SD" \rightarrow "iPod" \rightarrow "TU FM" \rightarrow "TU AM" \rightarrow ... When a radio source (FM/AM) is selected, select the preset station number after the above.

- 6 Press MULTI CONTROL ▲ or ▼ button to set volume level and press ENTER button to store the setting.

Play mode	Function
PLAY	The playback begins at the level set
	with VOLUME.
AI PLAY	The volume is increased gradually until
	the level set with VOLUME.

When the setting completes, "COMPLETE" is displayed and the unit exits the setup mode automatically.

The icon "TIMER" appears on the display. The timer is now set.

8 Switch the system to standby mode.

The STANDBY/TIMER indicators also light orange.

Ð

- When reached the preset timer, the selected source will play or switch to standby mode after the timer has been activated.
- The **MULTI CONTROL** ◀ or ▶ button can be used to move across the setting items.

To activate/deactivate the timer

Press TIMER ON/OFF button.

If activated, the icon "TIMER" appears on the display.



• The timer off will not be activated if the starting and stopping time are the same.

Sleep timer setting

If the sleep timer is activated, the system will switch to standby mode after the selected time has expired.

Each press of the SLEEP button decreases the timer period by 10 minutes. The sleep timer can be set up to 90 minutes.

The icon "SLEEP" appears on the display.

The display will change to sleep time display and change as follows: 90 min \rightarrow 80 min \rightarrow 70 min \rightarrow 60 min \rightarrow 50 min

→ 40 min → 30 min → 20 min → 10 min → OFF → ...

While sleep mode is in active:

To deactivate the sleep timer

Press SLEEP button or press \bigcup button to turn the power off.



 If timer off and the sleep off are all activated, the system will switch to standby mode by the earlier timer set.

In case of difficulty

Resetting the Microcomputer

The microcomputer may malfunction (unit cannot be operated, or shows an erroneous display) if the power cord is unplugged while the power is ON, or due to some other external factor. If this happens, execute the following procedure to reset the microcomputer and return the unit to its normal operating condition.

When the power is off (standby mode), press the [AUX] and [I=4=] buttons on the main unit until "FACTORY RESET " is appears. Unplug the AC cord and plug it back in if "RESET FINISHED" appears.

• Please note that resetting the microcomputer will clear the contents of the memory and return the unit to the state it was in when it left the factory.

Check that following guide for problem resolution.

General

No sound.

- ightarrow Plug in AC cord securely.
- → Set the VOLUME control to proper sound level.
- ➡ Make sure the source is set to the source you want to operate.
- ➡ Pull out the headphones plug from the headphones jack.

The system does not operate by pressing any buttons.

→ Unplug the AC cord and plug it back in.

This unit is turned OFF spontaneously.

➡ A.P.S. is set to ON. Set it to OFF.

CD player operation "NO DISC" is displayed.

- Insert a disc correctly (label side facing forward).
- ➡ Clean the disc.
- → Use a new or readable disc.
- ➡ Wait until the moisture condensation at the lens has cleared.

Disc cannot be ejected.

➡ Press and hold [▲] button until "EJECT" appears.

USB operation

"NO USB" is displayed.

- → Press 🕁 button again after press 🕁 button.
- ➡ Insert the USB device properly.

"NOT SUPPORT" is displayed.

→ Press 🕁 button again after press 🕁 button.

Cannot play.

➡ Check if the USB mass storage classcompatible digital audio player is turned ON.

iPod/iPhone operation

"NO iPod" is displayed.

➡ Insert the iPod/iPhone properly.

Does not function properly.

- Disconnect the iPod/iPhone and connect it again.
- ➡ Check the software version of the iPod/iPhone. If it is not the latest one, update it.

SD operation

"NO SD" is displayed.

- → Press 🕁 button again after press 🕁 button.
- ➡ Insert the SD card properly.

"NOT SUPPORT" is displayed.

→ Press 🕁 button again after press 🕁 button.

Cannot play.

→ Insert an SD card containing music files.

D.AUDIO operation

Kenwood digital audio player cannot be controlled from the main unit or remote control unit.

- Connect using the connection cable (separately available).
- → Check if a compatible model is connected.

Radio reception

Noise in radio.

- ➡ Tune to a correct frequency.
- ightarrow Adjust the direction of the FM antenna.
- ➡ Adjust the position and direction of the AM antenna.
- ➡ Increase the distance between the system and TV or VCR.

Remote control unit

Does not function properly.

- Replace the batteries.
- ➡ Remove the obstacles.
- → Move closer to the system when using the remote control and make sure that you are pointing at unit's remote sensor.

Maintenance

Cleaning the cabinet

 Use a soft cloth slightly moistened with a mild detergent solution. Do not use a solution containing alcohol, spirits, ammonia or abrasive.

Cleaning discs

- When a disc becomes dirty, clean it with a cleaning cloth, wipe the disc from the center out. Do not wipe in circular motion.
- Do not use solvents such as benzene, thinner commercially available cleaners, or antistatic spray intended for analogue records.

Caution on condensation

Condensation (of dew) may occur inside the unit when there is a great difference in temperature between this unit and the outside. This unit may not function properly if condensation occurs. In this case, leave the unit for a few hours and restart the operation after the condensation has dried up.

Be specially cautious against condensation in the following circumstances:

When this unit is carried from one place to another across a large difference in temperature, when the humidity in the room where this unit is installed increases, etc.

Copyright information

Materials recorded from broadcasting, CDs, discs or other recorded materials (music tapes, karaoke tapes, etc.) are protected by the copy right just like the verses and melodies of songs.

The copyright law prescribes that the permission from the copyright owners is required to sell, distribute, transfer or lend the materials recorded from the above recorded materials or to use them on a commercial basis (including background music in shops, etc.).

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



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

Old electrical and electronic equipment and batteries 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.

Pb

Proper recycling and waste disposal will help conserve resources whilst preventing detrimental effects on our health and the environment.

Notice: The sign "Pb" below the symbol for batteries indicates that this battery contains lead.

- Windows Media is a trademark of Microsoft Corporation registered in the U.S. and other countries.
- SDHC logo is a trademark of SD-3C,LLC.
- "Made for iPod," and "Made for iPhone" mean that an
 electronic accessory has been designed to connect
 specifically to iPod, or iPhone, respectively, and has been
 certified by the developer to meet Apple performance
 standards. Apple is not responsible for the operation of
 this device or its compliance with safety and regulatory
 standards. Please note that the use of this accessory
 with iPod, or iPhone may affect wireless performance.
- iPhone, iPod, iPod classic, iPod nano, and iPod touch are trademarks of Apple Inc., registered in the U.S. and other countries.
- Manufactured under license from DTS Licensing Limited. DTS is a registered trademark & the DTS Logos and Symbol are trademarks of DTS, Inc. © 1996-2009 DTS, Inc. All Rights Reserved.

Other system names and product names are generally trademarks or registered trademarks of their developers. However, note that the text in this manual does not use the TM and $\$ markings to them.

Specifications

Amplifier section

Rated output power

Tuner section

FM tuner section	
Tuning frequency range	87.5 MHz ~ 108.0 MHz
AM tuner section	
Tuning frequency range	531 kHz ~ 1,602 kHz

CD player section

Laser	Semiconductor laser
Laser power class	Class 1 (IEC)
Over sampling	8 fs (352.8 kHz)
D/A conversion	1 Bit

USB interface

USB standard	USB 1.1/2.0
Maximum supply current	
File system	FAT 16/ 32

SD card interface

Format SD memory card
Usable SD cards
SD/SDHC, miniSD, microSD/SDHC card
File systemFAT 16/ 32

Speakers

Enclosure	
Speaker configuration	
Full range	70 mm, cone type

General

Provided AC adapter DC 18 V (AC 230 -	240 V, 50 Hz)
Power consumption (Incl. AC adapter)	30 W
Power consumption in standby mode	
Dimensions	W : 465 mm
	H : 188 mm
	D : 105 mm
Weight (net)	2.7 kg

Notes:

- Kenwood follows a policy of continuous advancements in development. For this reason specifications may be changed without notice.
- Sufficient performance may not be exhibited at extremely cold locations (where water freezes).

Memory back up function

Please note that the following items will be deleted from the unit's memory if the power cord is disconnected from the AC outlet.

- Input selector settings
- Volume level
- Sound control (preset equalizer, bass enhancement)
- Tuner setting

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 dealer for information or service on this product.

Model_____ Serial Number_____