

SHARP

เครื่องเสียงสเตอริโอมินิคอมโปเนนท์
VIDEO CD MINI SYSTEM

รุ่น
MODEL

CD-BK260V CD-BK2700V

คู่มือการใช้งาน
OPERATION MANUAL

COMPACT
disc
DIGITAL AUDIO

COMPACT
disc
DIGITAL VIDEO

VIDEO CD

NTSC/PAL

MP3

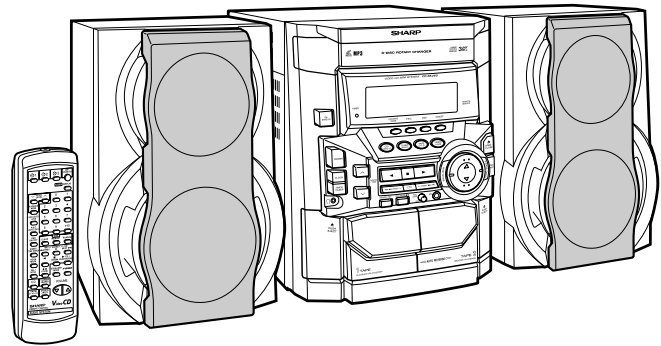
CD-BK260V(FRONT)

1



เครื่องเสียงสเตอริโอมินิคอมโปเนนท์รุ่น CD-BK260V/CD-BK2700V ประกอบด้วย
CD-BK260V/CD-BK2700V (ส่วนตัวเครื่อง), CP-BK260/CP-BK2700 (ลำโพง)

CD-BK260V/CD-BK2700V Video CD Mini System consisting of CD-BK260V/CD-
BK2700V (main unit) and CP-BK260/CP-BK2700 (speaker system).



3⁰⁰⁰
DISC

ภาษาไทย กรุณาดูหน้า T1 ถึง T46

ENGLISH Please refer to pages E-1 to E-46.



01.7.18, 15:32



ENGLISH

Introduction



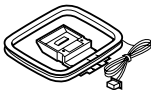
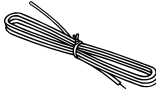
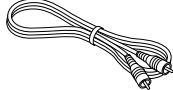
Thank you for purchasing this SHARP product. To obtain the best performance from this product, please read this manual carefully. It will guide you in operating your SHARP product.

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Accessories

Please confirm that the following accessories are included.

 <p>Remote control × 1</p>	 <p>"AA" size battery (UM/SUM-3, R6, HP-7 or similar) × 2</p>	 <p>AM loop aerial × 1</p>	 <p>FM aerial × 1</p>	 <p>Video cable × 1</p>
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Note:

Only the above accessories are included.

Special Notes

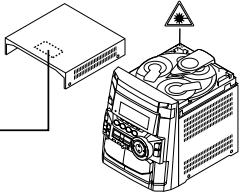
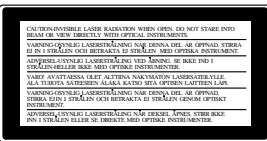
CAUTION

CLASS 1 LASER PRODUCT
APPAREIL À LASER DE CLASSE 1
PRODUCTO LASER DE CLASE 1

- This Video CD Mini System is classified as a CLASS 1 LASER product.
- The CLASS 1 LASER PRODUCT label is located on the rear cover.
- Use of controls, adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.

As the laser beam used in this compact disc player is harmful to the eyes, do not attempt to disassemble the cabinet. Refer servicing to qualified personnel only.

Laser Diode Properties
Material: GaAlAs
Wavelength: 780 nm
Emission Duration: continuous
Laser Output: max. 0.6 mW

- When the ON/STAND-BY button is set at STAND-BY position, mains voltage is still present inside the unit. When the ON/STAND-BY button is set at STAND-BY position, the unit may be brought into operation by the timer mode or remote control.
- Audio-visual material may consist of copyrighted works which must not be recorded without the authority of the owner of the copyright. Please refer to the relevant laws in your country.

Warning:

This unit contains no user serviceable parts. Never remove covers unless qualified to do so. This unit contains dangerous voltages, always remove mains plug from the socket before any service operation and when not in use for a long period.

Warning:

To prevent fire or shock hazard, do not expose this appliance to dripping or splashing. No objects filled with liquids, such as vases, shall be placed on the apparatus.

ENGLISH

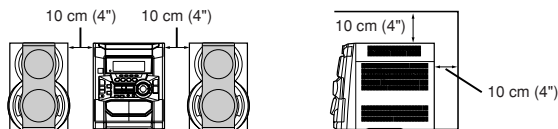
Important Instruction
- Accessories / Special Notes -

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Precautions

■ General

- Please ensure that the equipment is positioned in a well ventilated area and ensure that there is at least 10 cm (4") of free space along the sides, top and back of the equipment.



- Use the unit on a firm, level surface free from vibration.
- Keep the unit away from direct sunlight, strong magnetic fields, excessive dust, humidity and electronic/electrical equipment (home computers, facsimiles, etc.) which generates electrical noise.
- Do not place anything on top of the unit.
- Do not expose the unit to moisture, to temperatures higher than 60°C (140°F) or to extremely low temperatures.
- If your system does not work properly, disconnect the AC power lead from the wall socket. Plug the AC power lead back in, and then turn on your system.
- In case of an electrical storm, unplug the unit for safety.
- Hold the AC power plug by the head when removing it from the wall socket, as pulling the lead can damage internal wires.
- **Do not remove the outer cover, as this may result in electric shock. Refer internal service to your local SHARP service facility.**
- The ventilation should not be impeded by covering the ventilation openings with items, such as newspapers, tablecloths, curtains, etc.
- No naked flame sources, such as lighted candles, should be placed on the apparatus.
- Attention should be drawn to the environmental aspects of battery disposal.
- This unit should only be used within the range of 5°C - 35°C (41°F - 95°F).

Warning:

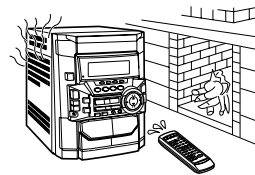
The voltage used must be the same as that specified on this unit. Using this product with a higher voltage other than that which is specified is dangerous and may result in a fire or other type of accident causing damage. SHARP will not be held responsible for any damage resulting from use of this unit with a voltage other than that which is specified.

■ Volume control

The sound level at a given volume setting depends on speaker efficiency, location, and various other factors. It is advisable to avoid exposure to high volume levels, which occurs whilst turning the unit on with the volume control setting up high, or whilst continually listening at high volumes.

■ Condensation

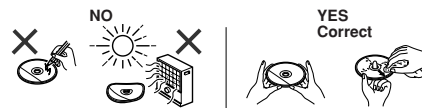
Sudden temperature changes, storage or operation in an extremely humid environment may cause condensation inside the cabinet (CD pickup, tape heads, etc.) or on the transmitter on the remote control. Condensation can cause the unit to malfunction. If this happens, leave the power on with no disc (or cassette) in the unit until normal playback is possible (about 1 hour). Wipe off any condensation on the transmitter with a soft cloth before operating the unit.



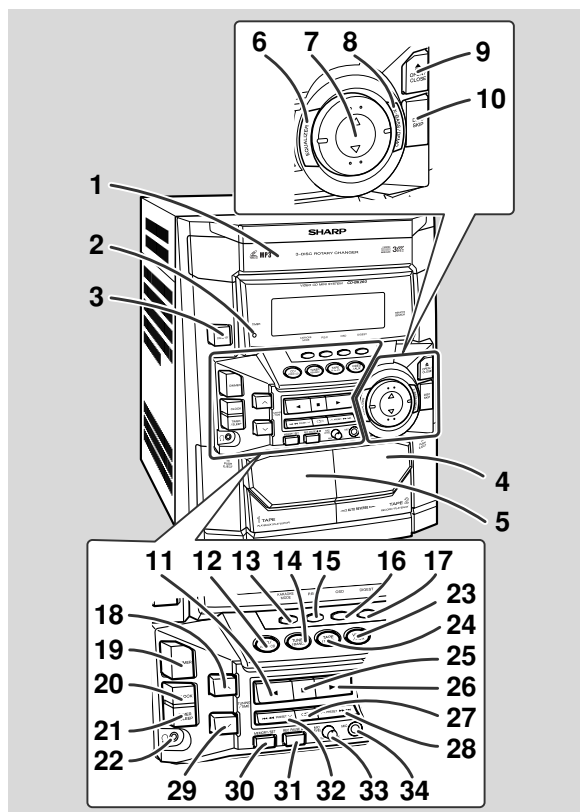
■ Care of compact discs

Compact discs are fairly resistant to damage, however mistracking can occur due to an accumulation of dirt on the disc surface. Follow the guidelines below for maximum enjoyment from your CD collection and player.

- Do not write on either side of the disc, particularly the non-label side from which signals are read. Do not mark this surface.
- Keep your discs away from direct sunlight, heat, and excessive moisture.
- Always hold the CDs by the edges. Fingerprints, dirt, or water on the CDs can cause noise or mistracking. If a CD is dirty or does not play properly, clean it with a soft, dry cloth, wiping straight out from the centre, along the radius.



Controls and Indicators



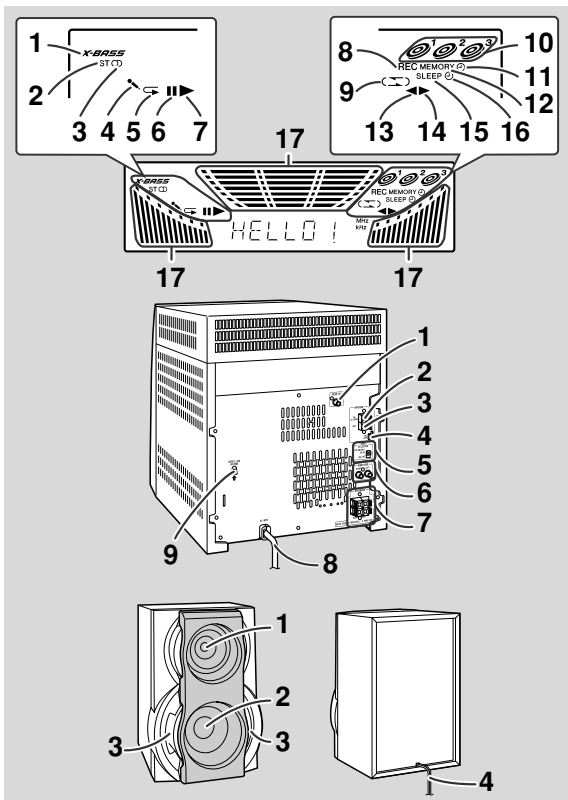
■ Front panel

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27. Tape 2 Reverse Mode Select Button	35
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■ Description of remote control (See page 6.)

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Controls and Indicators (continued)



■ Display

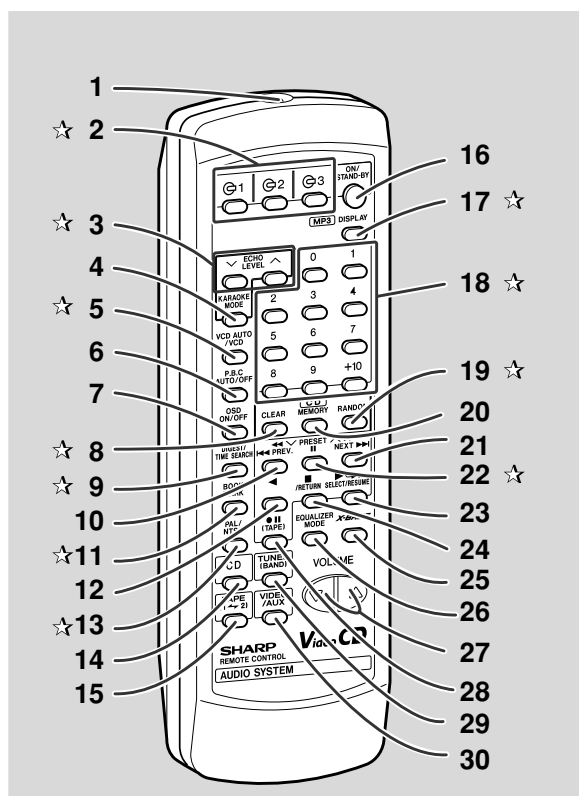
1. Extra Bass Indicator
2. FM Stereo Mode Indicator
3. FM Stereo Receiving Indicator
4. Karaoke Mode Indicator
5. Video CD/CD/MP3 Disc Repeat Play Indicator
6. Video CD/CD/MP3 Disc Pause Indicator
7. Video CD/CD/MP3 Disc Play Indicator
8. Tape 2 Record Indicator
9. Tape Reverse Mode Indicator
10. Video CD/CD/MP3 Disc Number Indicators
11. Timer Play Indicator
12. Memory Indicator
13. Tape 2 Reverse Play Indicator
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■ Rear panel

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■ Speaker system

1. Tweeter
2. Woofer
3. Bass Reflex Duct
4. Speaker Wire

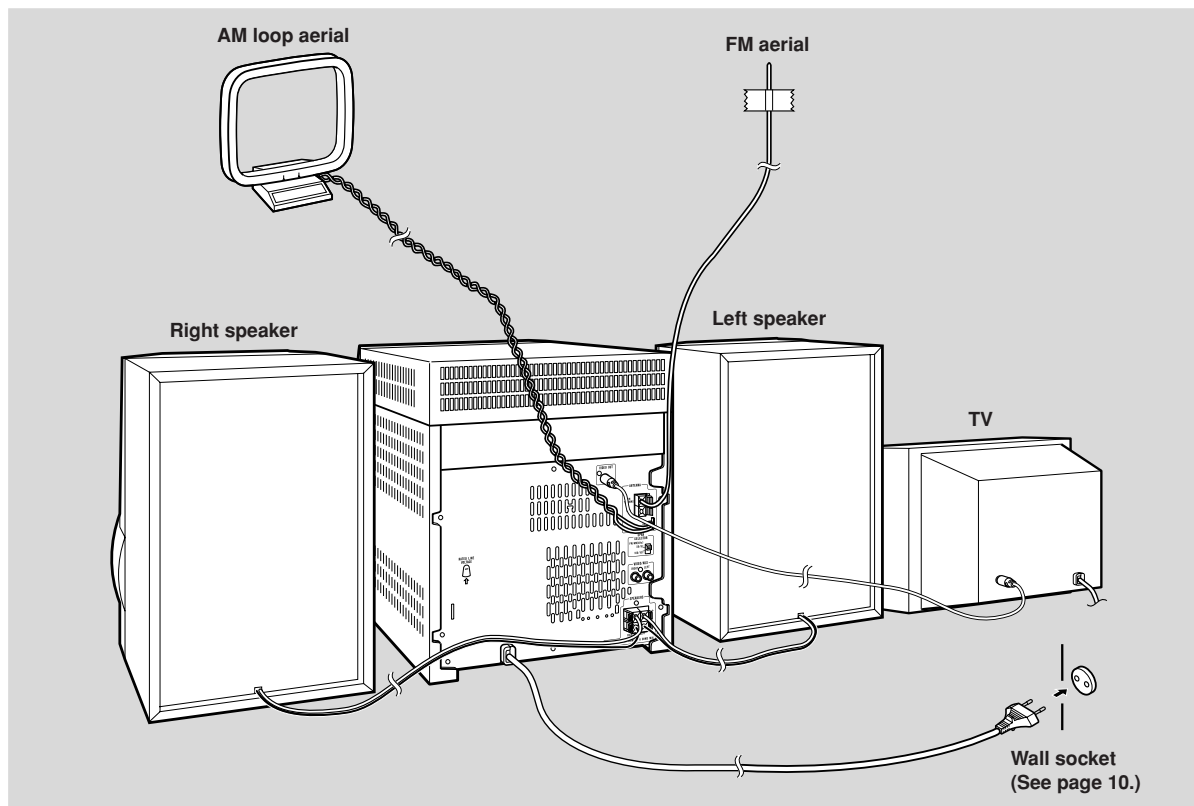


■ Remote control

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19. Video CD/CD/MP3 Disc Random Button	21, 30
20. Video CD/CD/MP3 Disc Memory Button	22, 31
21. Video CD Skip or Next, CD/MP3 Disc Track Up or Fast Forward, Tape 2 Fast Wind, Tuner Preset Up Button	18, 20, 28, 33, 35
22. Video CD/CD/MP3 Disc Pause Button	18, 20, 28, 29
23. Video CD Play or Repeat or Select or Resume, CD/MP3 Disc Play or Repeat, Tape 1 Play, Tape 2 Forward Play Button	17, 19, 21, 27, 30, 34, 35
24. Video CD Stop or Return, CD/MP3 Disc/Tape Stop Button	18, 28, 34, 35
25. Extra Bass Button	13
26. Equalizer Mode Select Button	13
27. Volume Up and Down Buttons	13
28. Tape 2 Record Pause Button	38 - 40
29. Tuner (Band) Button	32
30. Video/Auxiliary Button	43

Buttons with "*" mark in the illustration can be operated on the remote control only.
Other buttons can be operated both on the main unit and the remote control.

System Connections



■ Aerial connection

Supplied FM aerial:

Connect the FM aerial wire to the FM 75 OHMS terminal and position the FM aerial wire in the direction where the strongest signal can be received.

Supplied AM loop aerial:

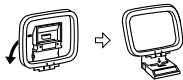
Connect the AM loop aerial wire to the AM LOOP socket. Position the AM loop aerial for optimum reception. Place the AM loop aerial on a shelf, etc., or attach it to a stand or a wall with screws (not supplied).

Note:

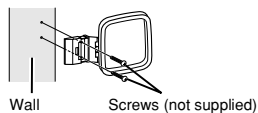
Placing the aerial on the unit or near the AC power lead may cause noise pickup. Place the aerial away from the unit for better reception.

Installing the AM loop aerial:

< Assembling >

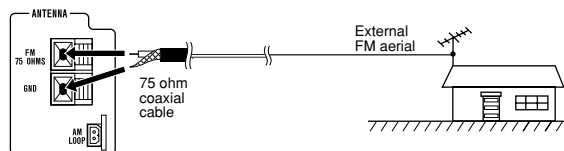


< Attaching to the wall >



External FM aerial:

Use an external FM aerial if you require better reception. Consult your dealer.

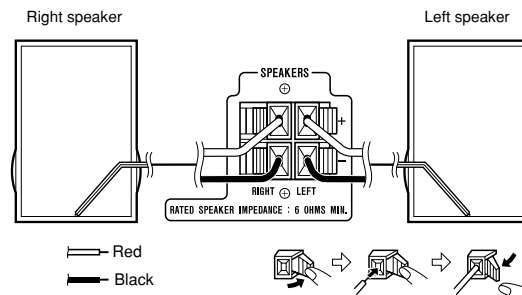


Note:

When an external FM aerial is used, disconnect the supplied FM aerial wire.

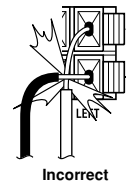
■ Speaker connection

Connect the black wire to the minus (-) terminal, and the red wire to the plus (+) terminal.



Caution:

- Use speakers with an impedance of 6 ohms or more, as lower impedance speakers can damage the unit.
- Do not mistake the right and the left channels. The right speaker is the one on the right side when you face the unit.
- **Do not let the bare speaker wires touch each other.**
- Do not allow any objects to fall into or to be placed in the bass reflex ducts.
- Do not stand or sit on the speakers. You may be injured.



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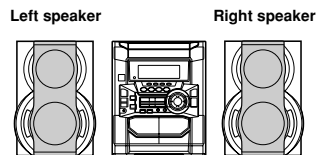
Preparation for Use
- System Connections -

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System Connections (continued)

■ Placing the speaker system

There is no distinction between the right and the left speakers.



Notes:

- The speakers are magnetically shielded. Therefore, they do not affect the display even you use them near the TV. However, some colour variation may occur, depending on the type of TV used.

If colour variation occurs...

Turn off the TV (from the power switch).
After 15 - 30 minutes, turn the TV on again.

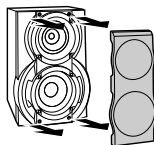
If the colour variation is still present...

Move the speakers further away from the TV.

- If any kind of magnet or an electromagnet is placed too close to the TV and the system, irregular colours may appear on the TV screen.

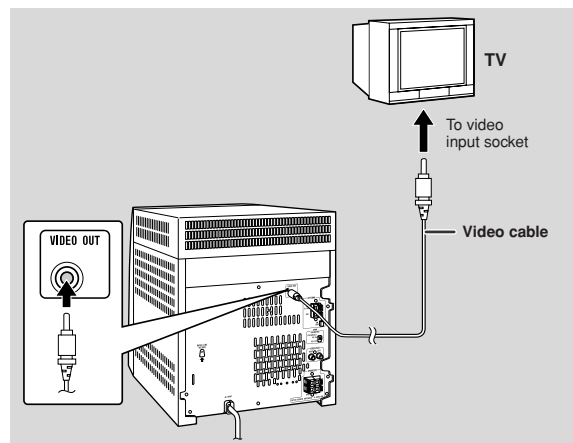
Speaker grilles are removable:

Make sure nothing comes into contact with the speaker diaphragms when you remove the speaker grilles.



■ TV/monitor connection

If the TV/monitor has a video input, connect it to VIDEO OUT socket on the rear of the unit.



Note:

If the TV/monitor does not have a video input, the VIDEO OUT socket on the unit should be connected to a VCR with a video input, which in turn should be connected to the TV/monitor through the TV ANTENNA/CABLE input. (Be sure to turn on the VCR, and set the VCR's input mode to "Auxiliary".)

■ Setting the AC voltage selector

Check the setting of the AC voltage selector located on the rear panel before plugging the unit into a wall socket. If necessary, adjust the selector to correspond to the AC power voltage used in your area.

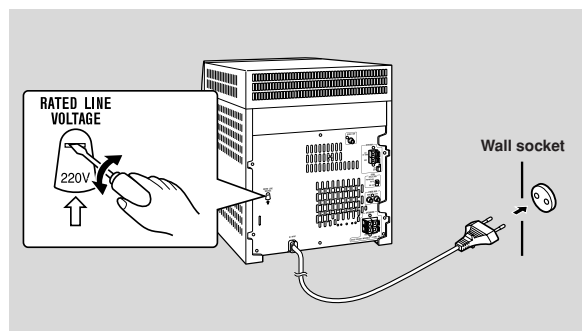
Turn the selector with a screwdriver until the appropriate voltage number appears in the window (110 V, 127 V, 220 V or 230 V - 240 V AC).

■ Connecting the AC power lead

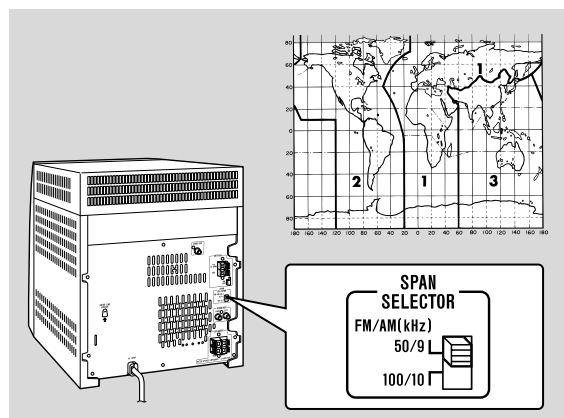
After making all connections, plug the unit. If you plug the unit first, the unit will enter the demonstration mode (see page 12).

Note:

Unplug the AC power lead from the wall socket if the unit will not be in use for a prolonged period of time.



■ Setting the FM/AM span selector



The International Telecommunication Union (ITU) has established that member countries should maintain either a 100 kHz or a 50 kHz interval between broadcasting frequencies of FM stations and 10 kHz or 9 kHz for AM station. The illustration shows the 50/9 kHz zones (regions 1 and 3), and the 100/10 kHz zone (region 2). Before using the unit, set the SPAN SELECTOR switch (on the rear panel) to the interval (span) of your area.

To change the tuning zone:

- 1 Press the ON/STAND-BY button to enter the stand-by mode.
- 2 Set the SPAN SELECTOR switch (on the rear panel) as follows.
 - For 50 kHz FM interval (9 kHz in AM) → 50/9
 - For 100 kHz FM interval (10 kHz in AM) → 100/10
- 3 Whilst pressing down the **▶** button and the X-BASS/DEMO button, press the ON/STAND-BY button until "CLEAR AL" appears.

Caution:

This operation will erase all data stored in memory including clock, timer settings, tuner preset, and CD programme.

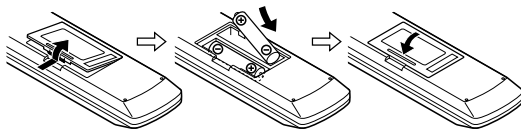
■ Demonstration mode (See page 12.)

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Remote Control

■ Battery installation

- 1 **Remove the battery cover.**
- 2 **Insert the batteries according to the direction indicated in the battery compartment.**
When inserting or removing the batteries, push them towards the ⊖ battery terminals.
- 3 **Replace the cover.**



Precautions for battery use:

- Replace all old batteries with new ones at the same time.
- Do not mix old and new batteries.
- Remove the batteries if the unit will not be used for long periods of time. This will prevent potential damage due to battery leakage.

Caution:

- Do not use rechargeable batteries (nickel-cadmium battery, etc.).
- Installing the batteries incorrectly may cause the unit to malfunction.

Notes concerning use:

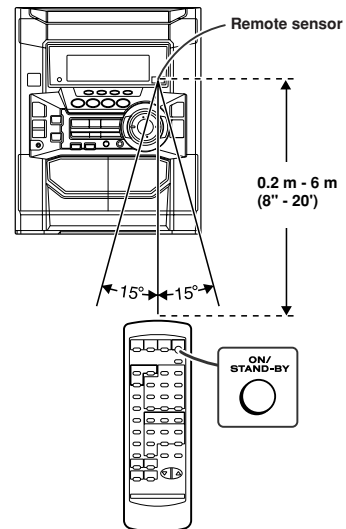
- Replace the batteries if the operating distance is reduced or if the operation becomes erratic. Purchase 2 "AA" size batteries (UM/SUM-3, R6, HP-7 or similar).
- Periodically clean the transmitter on the remote control and the sensor on the unit with a soft cloth.
- Exposing the sensor on the unit to strong light may interfere with operation. Change the lighting or the direction of the unit.
- Keep the remote control away from moisture, heat, shock, and vibrations.

■ Test of the remote control

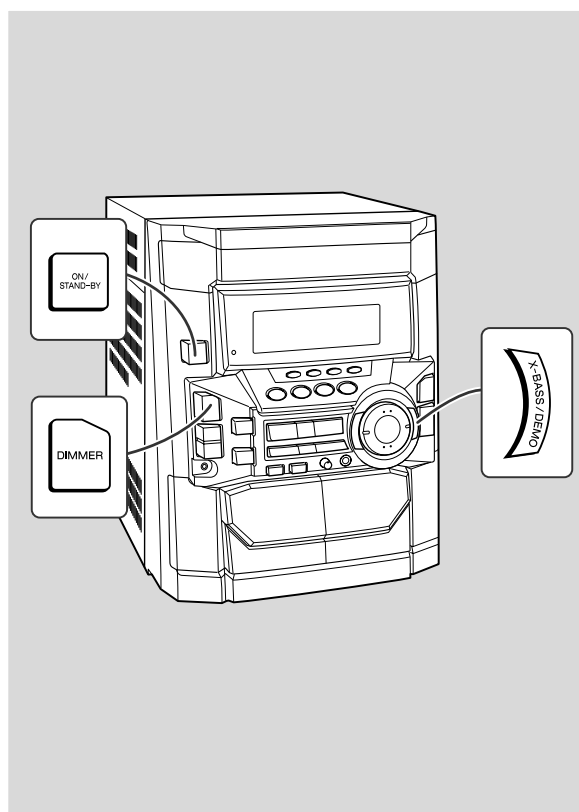
Face the remote control directly to the remote sensor on the unit.

The remote control can be used within the range shown below:

Press the ON/STAND-BY button. Does the power turn on? Now, you can enjoy the music.



General Control



■ Demonstration mode

The first time the unit is plugged, the unit will enter the demonstration mode. You will see words scroll.



■ To cancel the demonstration mode:

When the unit is in the power stand-by mode (demonstration mode), press the X-BASS/DEMO button. The demonstration mode will be cancelled and the display will disappear.

■ To return to the demonstration mode:

When the unit is in the power stand-by mode, press the X-BASS/DEMO button again.

■ Note:

When the power is on, the X-BASS/DEMO button can be used to select the extra bass mode.

■ To turn the power on

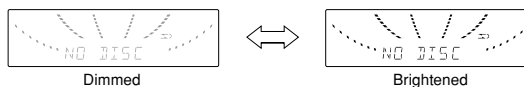
Press the ON/STAND-BY button to turn the power on.

■ To set the unit to stand-by mode:

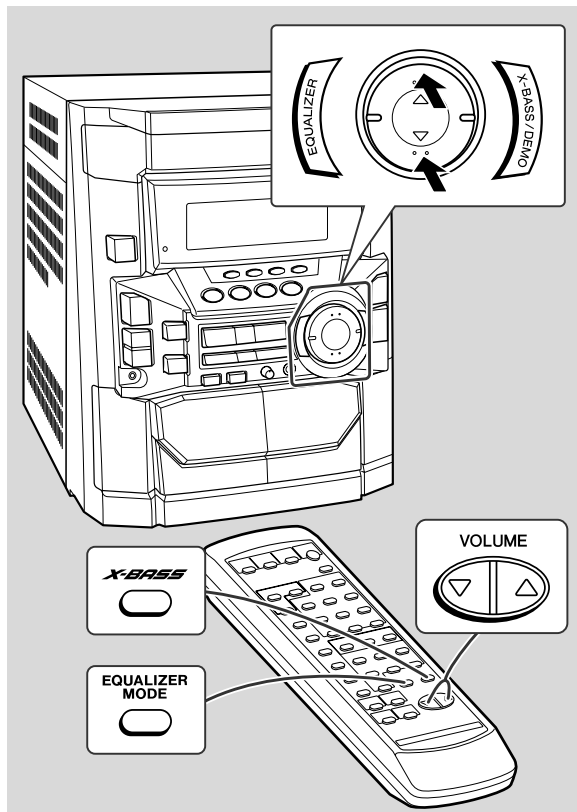
Press the ON/STAND-BY button again.

■ To change the display brightness (2 levels)

You can switch the display brightness by pressing the DIMMER button.



Sound Control



■ Volume control

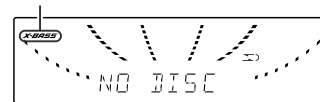
Press the VOLUME Δ button to increase the volume and the VOLUME ∇ button for decreasing.



■ Bass control

When the power is first turned on, the unit will enter the extra bass mode which emphasises the bass frequencies, and "X-BASS" will appear. To cancel the extra bass mode, press the X-BASS/DEMO (X-BASS) button.

X-BASS indicator

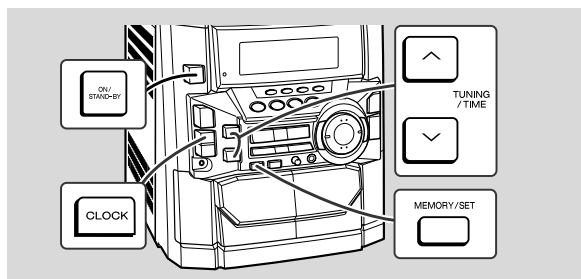


■ Equalizer

When the EQUALIZER (EQUALIZER MODE) button is pressed, the current mode setting will be displayed. To change to a different mode, press the EQUALIZER (EQUALIZER MODE) button repeatedly until the desired sound mode appears.

FLAT	The sound is not modified.
ROCK	Bass and treble are emphasised.
POPS	Bass and treble are slightly emphasised.
JAZZ	Treble is cut a little.
CLASSIC	Treble is reduced a lot.
VOCAL	Vocals (midrange tones) are emphasised.

Setting the Clock



In this example, the clock is set for the 24-hour (0:00) display.

1 Press the ON/STAND-BY button to turn the power on.

2 Press the CLOCK button and within 5 seconds, press the MEMORY/SET button.



3 Press the TUNING/TIME (v or ^) button to select 24-hour or 12-hour display and then press the MEMORY/SET button.



"0:00" → The 24-hour display will appear.
(0:00 - 23:59)

"AM 12:00" → The 12-hour display will appear.
(AM 12:00 - PM 11:59)

"AM 0:00" → The 12-hour display will appear.
(AM 0:00 - PM 11:59)

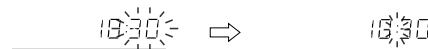
Note that this can only be set when the unit is first installed or it has been reset. [Refer to "Clearing all the memory (reset)" on page 45 for details.]

4 Press the TUNING/TIME (v or ^) button to adjust the hour and then press the MEMORY/SET button.



- Press the TUNING/TIME (v or ^) button once to advance the time by 1 hour. Hold it down to advance continuously.
- When the 12-hour display is selected, "AM" will change automatically to "PM".

5 Press the TUNING/TIME (v or ^) button to adjust the minutes and then press the MEMORY/SET button.



- Press the TUNING/TIME (v or ^) button once to advance the time by 1 minute. Hold it down to change the time in 5-minute intervals.
- The hour will not advance even if minutes advance from "59" to "00".
- The clock begins counting from "0" seconds. (Seconds are not displayed.) The time display will disappear after a few seconds.

To confirm the time display:

Press the CLOCK button.

The time display will appear for about 5 seconds.



Note:

The "CLOCK" or time will flash at the push of the CLOCK button when the AC power supply is restored after a power failure or unplugging the unit. Readjust the clock as follows.

To readjust the clock:

Perform "Setting the Clock" from the beginning. If the time display is flashing, step 3 (for selecting the 24-hour or 12-hour display) will be skipped.

To change the 24-hour or 12-hour display:

- 1 Clear all the programmed contents. [Refer to "Clearing all the memory (reset)" on page 45 for details.]
- 2 Perform "Setting the Clock" from the beginning.

Video CD


Any CD that contains motion pictures can be played.

You can enjoy motion pictures with the sound quality of MDs and the picture quality of VHS tapes.

Digital compression technology allows the continuous playback of up to 74 minutes from a 12 cm disc.

With video CDs, you can select the items you want to watch from the on-screen menu. Discs which support "Playback control" can display still pictures. (See pages 17 - 18.)

The disc symbols are found on the disc labels or jackets.

Symbol	Size	Label sides	Audio recording format	Video recording format
	8 cm (3")	1 side	Digital (max. 20 min)	MPEG 1
	12 cm (5")	1 side	Digital (max. 74 min)	


■ Types of discs

This unit handles video CDs that support PBC (version 2.0). (PBC is an abbreviation of "Playback Control".)

You can enjoy the following two types of playback, depending on the disc.

Disc type	Features
Video CDs without PBC (version 1.1)	Sound and motion pictures can be played using the same control operations as applied to music CDs.
Video CDs with PBC (version 2.0)	In addition to the features shown above (for discs without PBC), PBC CDs have a menu that is displayed on the TV screen. You can play interactive games and make use of other software with the retrieval function (menu playback). You can also display high resolution or normal still pictures.

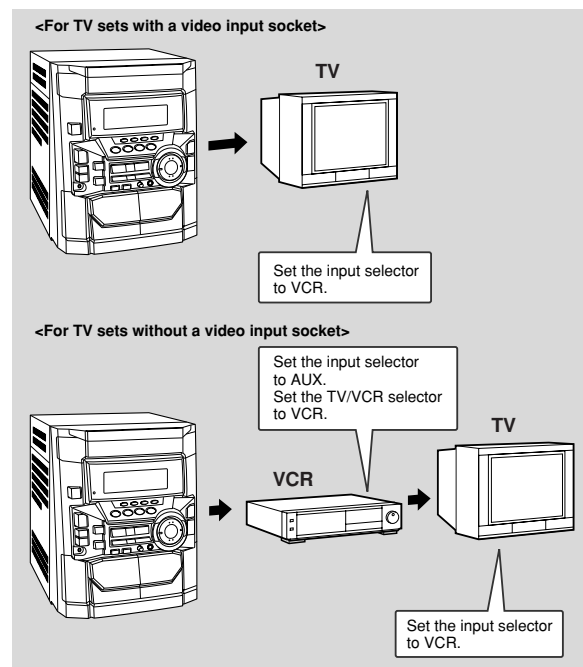
Notes:

- Video CDs are recorded in PAL or NTSC format.
- Analogue system CDVs (12 cm)  cannot be played.
- Photo CDs and CD-ROMs cannot be played.

Preparation for Video CD Playback

■ Adjusting the TV and VCR

The TV and VCR input varies according to connection method. Be sure to make the settings correctly. (Then, follow the playback procedure on pages 17 - 18 to check the settings.)



■ Selecting the video output format

Video CD is recorded in PAL or NTSC format. Select the video output format (NTSC or PAL) according to your TV or VCR.

To select the video output format:

Whilst in the stop mode, press the PAL/NTSC button.

Each time this button is pressed, the format will change in the following order:



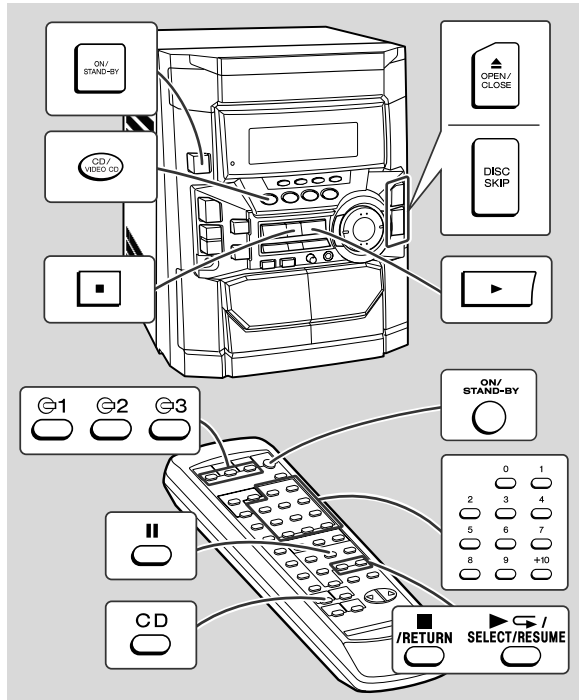
Notes:

- Video CDs are recorded in PAL or NTSC format. When you watch a PAL disc in the NTSC mode or an NTSC disc in the PAL mode, the vertical size of the picture will not be modified.
- If a multi-mode TV is equipped with an input selector switch, set the switch to "MULTI MODE". For the details, refer to the TV operation manual.
- Do not change the video output format during playback. If you do, the picture signal may not be output properly.
- Picture may be distorted when the setting is switched. This is not the malfunction of the unit.
- A few hours after the unit is unplugged, the setting will change back to the state at the factory shipment (default setting). The setting details vary depending on areas.

Playback of a Video CD (CDs) with P. B. C. (Version 2.0)

Playback control:

Video CDs that support "Playback control" can display still pictures. This function can be used with video CD software (video CDs with playback control) that have a playback method recorded on them. You can select items you want to watch from the menu displayed on the TV screen, or you can show still pictures.



- 1 Turn on the TV and set the input selector to "VCR".
 - 2 Press the ON/STAND-BY button to turn the power on.
 - 3 Press the CD/VIDEO CD (CD) button.
 - 4 Press the Δ OPEN/CLOSE button to open the disc tray.
 - 5 Place the video CD(s) with P.B.C. on the disc tray, label side up.
When loading a third disc, press the DISC SKIP button to turn the disc tray, then place the video CD in the open position.
 - Video CDs can be placed in any open position in the disc tray.
 - Be sure to place 8 cm (3") Video CD(s) in the middle of the disc positions.
- 12 cm (5") 8 cm (3")
- 6 Press the Δ OPEN/CLOSE button to close the disc tray.

Total playing time of the video CD whose number is flashing
 - 7 To select the video CD you want to listen to first, press the DISC SKIP button.
 - 8 Press the \blacktriangleright (\blacktriangleleft)/SELECT/RESUME button.

<TV screen>

A menu will appear on the TV and playback will be paused.

9 Select the desired menu number using the direct search buttons on the remote control.

- Playback will begin.
- After playback has finished, the menu will reappear. Select the menu number you want to play.

To interrupt playback:

Press the **II** button on the remote control.
To resume playback from the same point, press the **▶** **⇄**/SELECT/RESUME button.

To stop the current operation and return to the menu:

Press the **■** (RETURN) button for less than 0.5 seconds.

To completely stop the video CD:

Hold down the **■** (RETURN) button for more than 1 second.

To remove the video CDs:

Whilst in the stop mode, press the **▲** OPEN/CLOSE button.
The disc tray will open. Remove the two discs. Then, press the DISC SKIP button to rotate the disc tray and remove the remaining disc.

- If the DISC SKIP button does not allow to rotate the disc tray (you cannot remove the disc), close and open again the tray.

After use:

Press the ON/STAND-BY button to enter the power stand-by mode.

Notes:

- During playback, you can select another disc by pressing either of the DISC SKIP button or one of the **⊖** 1 - **⊕** 3 buttons on the remote control.
- Whilst the disc is being read ("TOC READ" is displayed), another disc cannot be selected even if you press the DISC SKIP button or one of the **⊖** 1 - **⊕** 3 buttons on the remote control.
- Playback control allows a video CD to be played back according to instructions recorded on the disc. The "previous", "next", "return" and "select" operations may function differently, depending on the PBC CDs.
- Some video CDs with playback control may have an "auto pause" recorded on them. When such a disc is played, the screen will stop automatically at the point where an "auto pause signal" has been inserted.
- If the picture looks dirty when a video CD is played back, there may be a scratch on the video CD. Replace it with another video CD in good condition.

The P.B.C. function will not work in the following conditions.

- When repeat, random, programme, bookmark, resume, disc digest, track digest or time search play has been selected and playback begins.
- When track numbers are selected using the direct search, the **^** PRESET **▶▶▶▶** (NEXT **▶▶▶▶**) or **◀◀◀◀** PRESET **∨** (PREV. **◀◀◀◀**) button, and playback begins.

■ To move the menu screen (menu screen with more than 1 page)

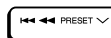
To move to the next menu screen:

Whilst in the stop mode, press the **^** PRESET **▶▶▶▶** button.



To return to the previous menu screen:

Whilst in the stop mode, press the **◀◀◀◀** PRESET **∨** button.



Notes:

- This function may not work, depending on the disc.
- The **◀◀◀◀** PREV. or NEXT **▶▶▶▶** button on the remote control allows you to locate the desired portion.

■ To play without activating the playback control function

You can play a video CD with P.B.C. without activating the playback control function. In this case, the menu screen will not appear, and the disc will be played in the same way as a video CD without P.B.C.

1 Whilst in the stop mode, press the P.B.C. (P.B.C. AUTO/OFF) button to cancel the P.B.C. mode.

The P.B.C. function cannot be cancelled whilst the menu screen is displayed.



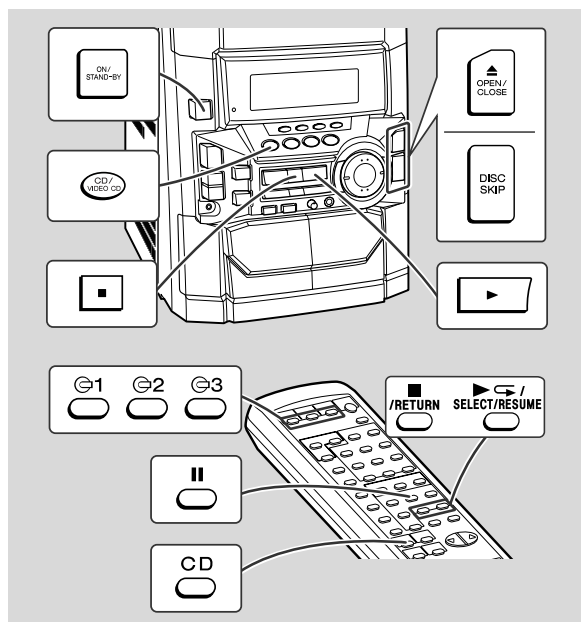
2 Press the **▶ (▶) /SELECT/RESUME) button.**

Playback will begin.

Notes:

- The P.B.C. function can also be cancelled whilst in the playback mode.
- Some video CDs with P.B.C. cannot be played back when the P.B.C. mode is off.
- See pages 19 - 26 to perform various playback functions without activating the P.B.C. function.

Playback of a Video CD (CDs) without P. B. C. (Version 1.1)



- 1 Turn on the TV and set the input selector to "VCR".
- 2 Press the ON/STAND-BY button to turn the power on.
- 3 Press the CD/VIDEO CD (CD) button.

- 4 Press the Δ OPEN/CLOSE button to open the disc tray.
- 5 Place the video CD(s) on the disc tray, label side up.
When loading a third disc, press the DISC SKIP button to turn the disc tray, then place the video CD in the open position.
 - Video CDs can be placed in any open position in the disc tray.
 - Be sure to place 8 cm (3") Video CD(s) in the middle of the disc positions.
- 6 Press the Δ OPEN/CLOSE button to close the disc tray.



Total number of tracks on the video CD whose number is flashing Total playing time of the video CD whose number is flashing

- 7 To select the video CD you want to listen to first, press the DISC SKIP button.
- 8 Press the \blacktriangleright (▶) /SELECT/RESUME button to start playback.



- Playback will begin from track 1 on the disc you have selected to play. After that disc finishes playing, the next disc will automatically start playback.
- When the last track on the third disc has finished playing, the unit will stop automatically.
- When there is no video CD in one of the disc 1 - 3 positions, the next video CD will be played.

Notes:

- During playback, you can select another disc by pressing either of the DISC SKIP button or one of the \odot 1 - \odot 3 buttons on the remote control.
- Whilst the disc is being read ("TOC READ" is displayed), another disc cannot be selected even if you press the DISC SKIP button or one of the \odot 1 - \odot 3 buttons on the remote control.

To interrupt playback:

Press the **II** button on the remote control.
To resume playback from the same point, press the **▶◀/SELECT/RESUME** button.

To stop playback:

Press the **■(■)/RETURN** button.

To remove the video CDs:

Whilst in the stop mode, press the **▲ OPEN/CLOSE** button.
The disc tray will open. Remove the two discs. Then, press the **DISC SKIP** button to rotate the disc tray and remove the remaining disc.
● If the **DISC SKIP** button does not allow to rotate the disc tray (you cannot remove the disc), close and open again the tray.

After use:

Press the **ON/STAND-BY** button to enter the power stand-by mode.

■ To skip to the beginning of a track (skip search)

To move to the beginning of the next track:

Press the **^ PRESET ►►►** button for less than 0.5 seconds during playback.



- You can skip to any track by pressing the **^ PRESET ►►►** button repeatedly until the desired track number appears.

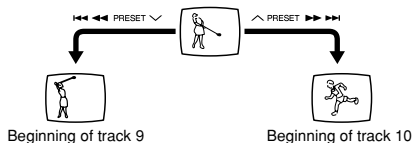
To restart the track being played:

Press the **◄◄◄ PRESET ∨** button for less than 0.5 seconds during playback.



- You can skip to any track by pressing the **◄◄◄ PRESET ∨** button repeatedly until the desired track number appears.

[Example] When the current track is 9



Notes:

- You can skip to the beginning of a track on a single disc only.
- The **◄◄◄ PREV.** or **NEXT ►►►** button on the remote control allows you to locate the beginning of a track.

■ Scan play

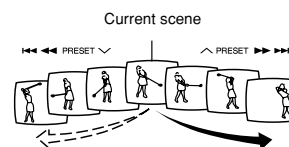
For fast forward:

Press and hold down the **^ PRESET ►►►** button during playback.



For fast reverse:

Press and hold down the **◄◄◄ PRESET ∨** button during playback.



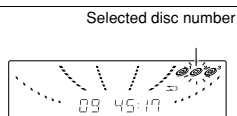
Notes:

- Normal playback will resume when the **◄◄◄ PRESET ∨** or **^ PRESET ►►►** button is released.
- You can locate the desired portion on a single disc only.
- During scan play, colours may fade, pictures may be distorted, or noise bars may be seen.
- Pictures are shown intermittently and no sound is heard during fast forward or fast reverse on video CDs.
- This can be operated by pressing the **◄◄** or **►►** button on the remote control.

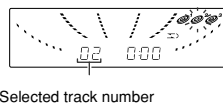
Direct Search System

By using the direct search buttons, the desired tracks can be played.

- 1 Whilst in the stop mode, press the DISC SKIP button to select the desired disc.**



- 2 Use the direct search buttons on the remote control to select the desired track.**



- The direct search buttons allow you to select up to number 10.
- When selecting number 11 or more, use the "+10" button.

A. For example, to choose 13

- 1 Press the "+10" button once.
- 2 Press the "3" button.



B. For example, to choose 30

- 1 Press the "+10" button three times.
- 2 Press the "0" button.

- 3 Press the ► (▶) / SELECT/RESUME button to start playback.**

Playback of the selected track is started. When the end of last track of the disc selected is reached, the next disc will be automatically started.

To stop playback:

Press the ■ (■) / RETURN button.

Notes:

- The selected track can be started simply by pressing the direct search buttons during playback. [It is not necessary to press the ► (▶) / SELECT/RESUME button.]
- A track number higher than the number of tracks on the disc cannot be selected.
- During random play, direct search system is not possible.

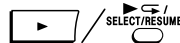
Repeat or Random Play

Repeat Play

All tracks on up to 3 discs, or a programmed sequence can be continuously repeated.

To repeat all tracks on up to 3 discs:

Press the ► (▶) / SELECT/RESUME button twice.



To repeat a desired track:

Perform steps 1 - 5 in the "Programmed Play" section and then press the ► (▶) / SELECT/RESUME button twice.

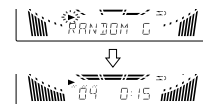
To cancel repeat play:

Press the ► (▶) / SELECT/RESUME button again. "◀" will go out.

Random Play

The tracks on the disc(s) can be played in random order automatically.

Press the RANDOM button on the remote control to begin random play.



To cancel random play:

Press the ► (▶) / SELECT/RESUME button.

Notes:

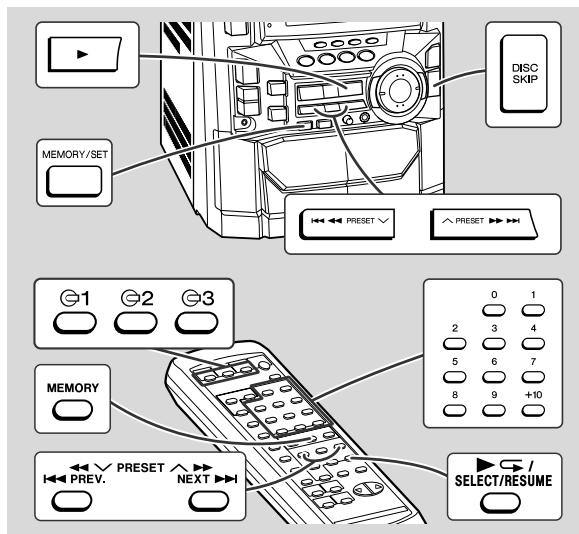
- If you press the NEXT ►| button during random play, you can move to the track selected next by the random operation. On the other hand, the ◀| PREV. button does not allow you to move to the previous track. The beginning of the track being played will be located.
- In random play, the unit will select and play tracks automatically. (You cannot select the order of the tracks.)

Caution:

- After performing repeat or random play, be sure to press the ■ (■) / RETURN button. Otherwise, the disc(s) will play continuously.
- During P.B.C. play, repeat or random play is not possible.

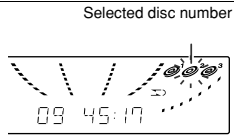
Programmed Play

You can choose up to 32 selections for playback in the order you like.

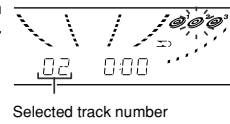


1 Press the DISC SKIP button 3 times for the unit to read the information of each disc to programme them.

2 Whilst in the stop mode, press one of the G1 - G3 buttons on the remote control to select the desired disc.

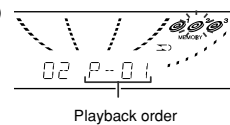


3 Press the direct search buttons on the remote control to select the desired track.



You can also select a track by pressing the PRESET (PREV.) or PRESET (NEXT) button.

4 Press the MEMORY/SET (MEMORY) button to save the track number.



When the track is memorised, "MEMORY" will appear.

5 Repeat steps 2 - 4 for other tracks. Up to 32 tracks can be programmed.

If you make a mistake, the programmed tracks can be cleared by pressing the CLEAR button.

6 Press the SELECT/RESUME button to start playback.

To clear the programmed selections:

Press the CLEAR button on the remote control whilst the "MEMORY" indicator is lit. Each time the button is pressed, one track will be cleared, beginning with the last track programmed. When all the tracks are cleared, "MEMORY" will disappear.



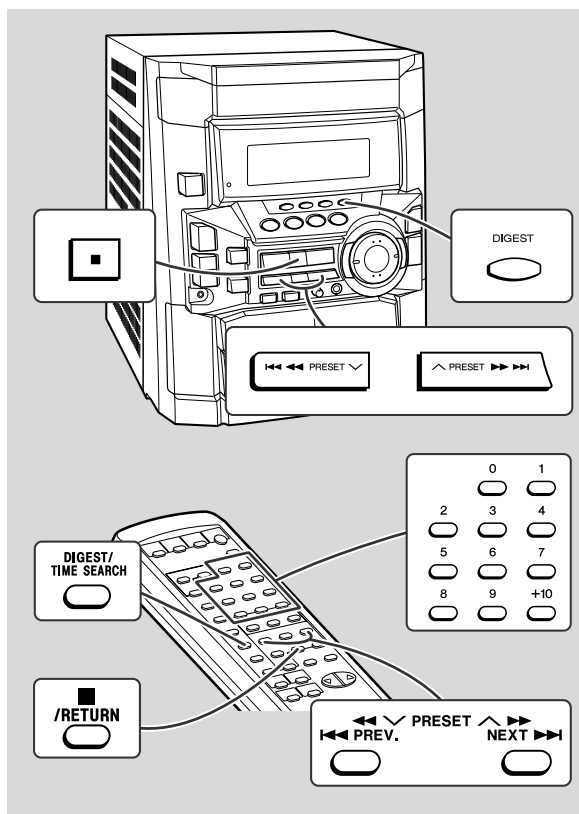
Adding tracks to the programme:

If a programme has been previously stored, the "MEMORY" indicator will be displayed. Then follow steps 2 - 4 to add tracks. The new tracks will be stored after the last track of the original programme.

Notes:

- Opening the disc tray automatically cancels the programmed sequence.
- Even if you press the ON/STAND-BY button to enter the stand-by mode or the function is changed from CD/VIDEO CD to some other function, the programmed selections will not be cleared.
- During programme operation, random play is not possible.
- The programme function will not work in the P.B.C. mode. Whilst the programme function is active, the P.B.C. function will be cancelled automatically.

Digest Selection of Discs and Tracks

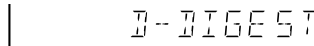
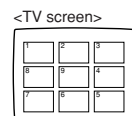


■ Disc digest selection

You can play back a desired track by selecting one from the 9 displayed tracks on the screen.

1 Whilst in the stop mode, press the DIGEST (DIGEST/TIME SEARCH) button.

- Up to 9 tracks will be displayed on the screen.
- Each time a track is displayed, you can hear the first several seconds of the track.

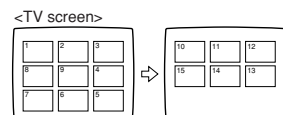


2 Press the direct search buttons on the remote control to select the desired track.

- Playback will be started from the selected track.
- When the last track on the third disc has finished playing, the unit will stop automatically.

When there are more than 9 tracks on the video CD:

Each press of the ^ PRESET >>> (NEXT >>>) button will display the next 9 tracks. Press the <<<< PRESET v (PREV.) button to return to the previous display.



To cancel the disc digest:

Press the ■ (RETURN) button.

Notes:

- The disc digest function is available only in the stop mode.
- This function is not available with an audio CD.

Time Search Selection

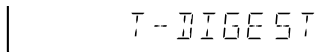
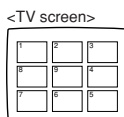
You can play back from the desired scene by specifying the time and the track.

■ Track digest selection

Each track is divided into 9 sections.
You can look at the sections and select the scene you want to start watching from. This function is convenient when you want to start from the middle of an undivided track, for example, a movie.

1 During playback, press the DIGEST (DIGEST/TIME SEARCH) button.

- The track being played back will be divided into 9 sections and playback will be paused.
- Each time a divided section is displayed, you can hear the first several seconds of the section.



2 Press the direct search buttons on the remote control to select the scene you want to watch.

- Playback will be started from the selected scene.
- When the last track on the third disc has finished playing, the unit will stop automatically.

To cancel the track digest operation:

Press the **■** (RETURN) button.

Notes:

- The track digest function works only during playback.
- This operation is not accepted by a short time track (less than one minute), still pictures (menu display, photo, etc.) and audio CDs.
- One track is divided into nine frames of equal playing time.

Caution:

Digest function of discs and tracks will not work during P.B.C. and programme play. Cancel the P.B.C. mode before using this function on a video CD with P.B.C.

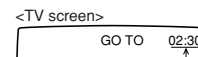
1 Whilst in the playback mode, hold down the DIGEST (DIGEST/TIME SEARCH) button to enter the time search mode.



2 Use the direct search buttons on the remote control to specify the time.

[For example, to select 2 minutes and 30 seconds.]

Press "0", "2", "3", "0" successively.



Selected time

- The point of specified time will be located on the track being played and playback will resume from that point.
- When the last track on the third disc has finished playing, the unit will stop automatically.

To cancel the time search operation:

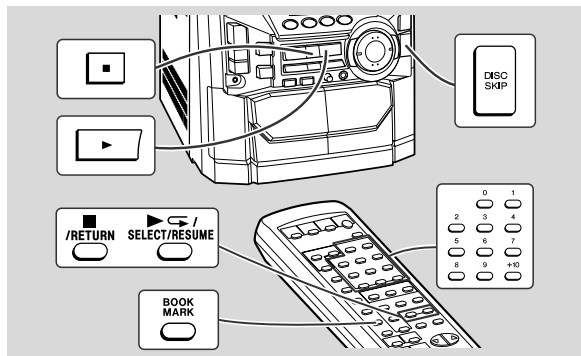
Press the **■** (RETURN) button.

Notes:

- Time search mode will be cancelled automatically if the desired time is not entered within 10 seconds.
- The time search function will not work during P.B.C. and programme play. Cancel the P.B.C. mode before using this function on a video CD with P.B.C.
- This operation is not accepted by still pictures (menu display, photo, etc.).

Bookmark Function

This function marks the desired scene on the video CD to play it back easily. (Up to 9 scenes per disc can be marked.)



■ To create a bookmark

- 1** Press the DISC SKIP button to select the desired disc.
- 2** Press the ► (▶) / SELECT/RESUME button.
- 3** Press the BOOKMARK button on the remote control when the desired scene is displayed.
"B-M" will appear on the TV screen for a few seconds.

<TV screen>

B - MARK

B-M

- 4** Repeat step 3.
 - Up to 9 scenes can be marked.
 - If more than 9 bookmarks are created, bookmarks will be erased in the order they were created.

■ To recall a bookmarked scene

- 1** Whilst in the stop or playback mode, hold down the BOOKMARK button on the remote control for more than 1 second.
"BOOKMARK DIGEST" will appear before the marked scenes and numbers are displayed on the TV screen. Each time a bookmarked scene is displayed, you can hear the first several seconds of the scene. After displaying every scene, this unit will enter the pause mode automatically.
- 2** Press the direct search buttons on the remote control to select the scene you want to play back.
 - Playback will begin from the selected scene.
 - When the third disc has finished, the unit will stop automatically.

<TV screen>

B - DIGEST

1	2	3
5	4	

To cancel the bookmark function:

Press the ■ (■) / RETURN button.

Notes:

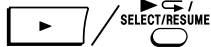
- This function works only with video CDs.
- Even if the unit is set to the stand-by mode or the function is changed from CD/VIDEO CD (CD) to some other function, the marks will not be erased.
- Opening the disc tray automatically erases the marks.
- Marks created on one of the discs 1 - 3 will be erased when creating marks on other discs.
- The bookmark function will not work during P.B.C. and programme play. Cancel the P.B.C. mode before using this function on a video CD with P.B.C.
- This function is invalid with still pictures (menu display, photo, etc.) and audio CD.
- Every marked scene will be erased automatically when the programme is memorised.

Resume Play

This function is to restart playback from the point where it has stopped.

During the stop mode, hold down the ► (▶) / ◀/SELECT/RESUME button for more than 1 second.

Playback will begin at the point where playback has stopped.



Notes:

- Resume play cannot be activated when the function is changed from CD/VIDEO CD (CD) to another or the unit is set to the power stand-by mode.
- Resume play cannot be performed in the P.B.C. mode.
- Resume play cannot be performed whilst opening the disc tray or after changing the disc.

To Play Back the Video CD Manually

Usually this unit detects the video CD and plays back pictures and sounds. In case this unit fails to judge it correctly, you can play back the video CD manually.

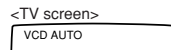
1 Press the VCD AUTO/VCD button until "VCD ON" appears on the TV screen.



2 Press the ► (▶) / ◀/SELECT/RESUME button.

To return to the mode detecting the video CD automatically:

Press the VCD AUTO/VCD button until "VCD AUTO" appears on the TV screen.

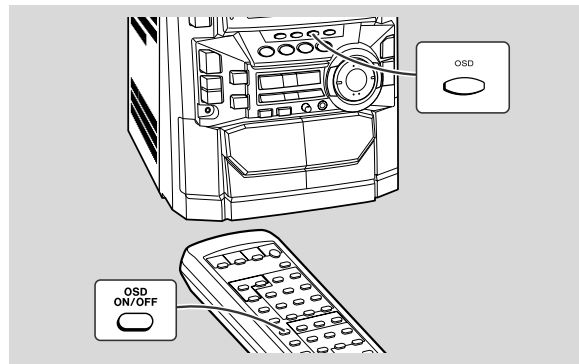


Notes:

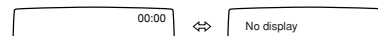
- This setting will be cancelled when you change the discs.
- Whilst in the "VCD ON" state, you cannot play back audio CDs.

Changing the TV Screen Display

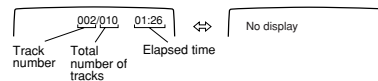
You can check the operation of the main unit by the on-screen display.



Each time the OSD (OSD ON/OFF) button is pressed during playback or in the stop mode, the display will change as follows:
[During stop mode]



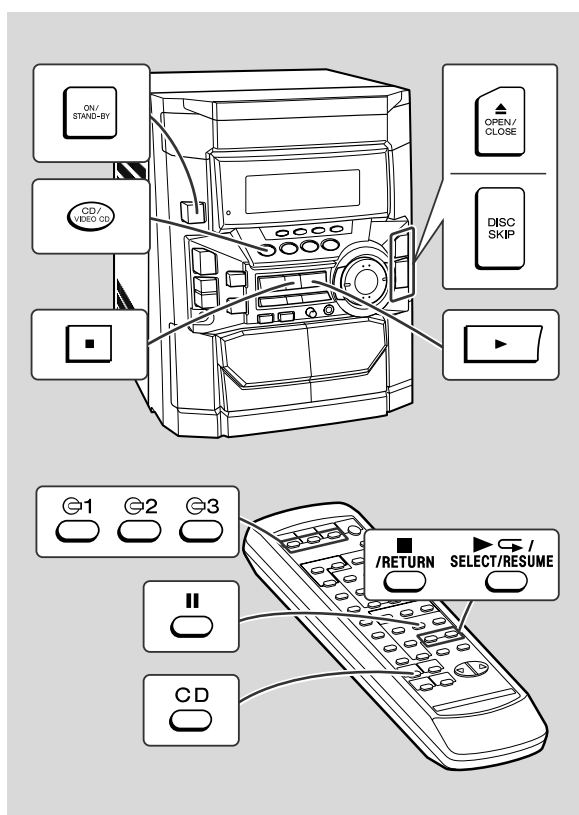
[During playback]



Note:

The displays may differ depending on the discs.

Listening to a CD (CDs)



- 1** Press the ON/STAND-BY button to turn the power on.
- 2** Press the CD/VIDEO CD (CD) button.
- 3** Press the Δ OPEN/CLOSE button to open the disc tray.
- 4** Place the CD(s) on the disc tray, label side up.
When loading a third disc, press the DISC SKIP button to turn the disc tray, then place the CD in the open position.
 - CDs can be placed on any open position on the disc tray.
 - Be sure to place 8 cm (3") CD(s) in the middle of the disc positions.
- 5** Press the Δ OPEN/CLOSE button to close the disc tray.



Total number of tracks on the CD whose number is flashing

Total playing time of the CD whose number is flashing

- 6** To select the CD you want to listen to first, press the DISC SKIP button.
- 7** Press the \blacktriangleright (▶) /SELECT/RESUME button to start playback.



- Playback will begin from track 1 on the disc you have selected to play. After that disc finishes playing, the next disc will automatically start playback.
- When the last track on the third disc has finished playing, the CD player will stop automatically.
- When there is no CD in one of the disc 1 - 3 positions, that position will be skipped and the next CD will be played.

To interrupt playback:

Press the **II** button on the remote control.
To resume playback from the same point, press the **▶◀/SELECT/RESUME** button.

To stop playback:

Press the **■ (RETURN)** button.

To remove the CDs:

Whilst in the stop mode, press the **▲ OPEN/CLOSE** button.
The disc tray will open. Remove the two discs. Then, press the **DISC SKIP** button to rotate the disc tray and remove the remaining disc.
● If the **DISC SKIP** button does not allow to rotate the disc tray (you cannot remove the disc), close and open again the tray.

After use:

Press the **ON/STAND-BY** button to enter the power stand-by mode.

The following playback functions are the same as video CD operations.

Direct Search System	Page
Repeat or Random Play21
Programmed Play22

Notes:

- Whilst in the "VCD ON" state, you cannot play back audio CDs.
- During playback, you can select another disc by pressing either of the **DISC SKIP** button or one of the **⊖ 1 - ⊕ 3** buttons on the remote control.
- Whilst the disc is being read ("TOC READ" is displayed), another disc cannot be selected even if you press the **DISC SKIP** button or one of the **⊖ 1 - ⊕ 3** buttons on the remote control.

Caution:

- Do not place two CDs in one disc tray.
- Do not push the disc tray whilst it is moving.
- Do not turn the disc tray by hand. This may cause malfunctions.
- If the power fails whilst the tray is open, wait until the power is restored.
- If the disc tray is stopped forcibly, "ER-CD10" will appear in the display and the unit will not function. If this occurs, press the **ON/STAND-BY** button to enter the power stand-by mode and then turn the power on again.
- If TV or radio interference occurs during CD operation, move the unit away from the TV or radio.
- If a disc is damaged, dirty, or loaded upside down, the disc will be skipped.

■ To locate the beginning of a track

To move to the beginning of the next track:

Press the **^ PRESET ▶▶▶▶** button for less than 0.5 seconds during playback.



- You can skip to any track by pressing the **^ PRESET ▶▶▶▶** button repeatedly until the desired track number appears.

To restart the track being played:

Press the **◀◀◀ PRESET ∨** button for less than 0.5 seconds during playback.



- You can skip to any track by pressing the **◀◀◀ PRESET ∨** button repeatedly until the desired track number appears.

Notes:

- You can locate the beginning of a track on a single disc only.
- The **◀◀◀ PREV.** or **NEXT ▶▶▶** button on the remote control allows you to locate the beginning of a track.
- If you hold down the **◀◀◀ PRESET ∨ (◀◀◀ PREV.)** button for less than 0.5 seconds during playback of an MP3 disc, the beginning of the previous track is located instead of the current track.

■ To locate the desired portion

For fast forward:

Press and hold down the **^ PRESET ▶▶▶▶** button during playback.



For fast reverse:

Press and hold down the **◀◀◀ PRESET ∨** button during playback.



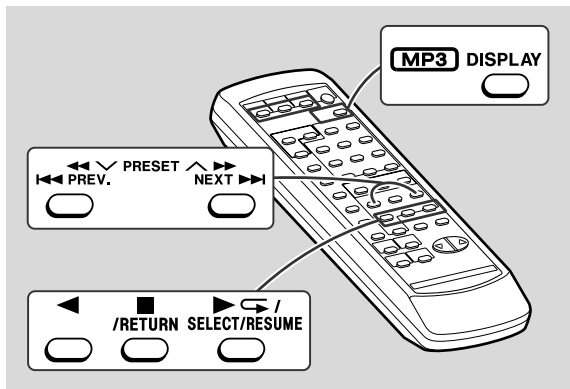
Notes:

- Normal playback will resume when the **◀◀◀ PRESET ∨** or **^ PRESET ▶▶▶▶** button is released.
- The **◀◀** or **▶▶** button on the remote control allows you to locate the desired portion.

Listening to MP3 Disc

■ MP3

MP3 is a form of compression. It is an acronym which stands for Mpeg 1 Audio Layer 3. MPEG layer 3 is a type of audio code which is processed by significant compression (up to 12 : 1) from the original audio source with very little loss in sound quality.



■ Normal play

Refer to "Listening to a CD (CDs)" (27 - 28 pages).

■ Selecting and listening to the desired track

1 Whilst in the stop mode, press the **DISC SKIP** button on the main unit to select the desired disc.

Selected disc number

The diagram shows the 'DISC SKIP' button on the remote control. To its right, a display shows '101 MP3' with a CD icon and a play button icon.

2 Press the **MP3 DISPLAY** button to display the folder name.

3 Select the desired folder by pressing the **PREV.** or **NEXT** button.

4 Press the **MP3 DISPLAY** button to display the track name.

5 Select the desired track by pressing the **PREV.** or **NEXT** button.
The direct search buttons also allow you to select the track.

6 Press the **SELECT/RESUME** button to begin playback.

To interrupt playback:

Press the **II** button on the remote control.

To resume playback from the same point, press the **SELECT/RESUME** button.

To stop playback:

Press the **RETURN** button.

The following playback functions are the same as CD operations.

	Page
To locate the beginning of a track	28
To locate the desired portion	28

Note:

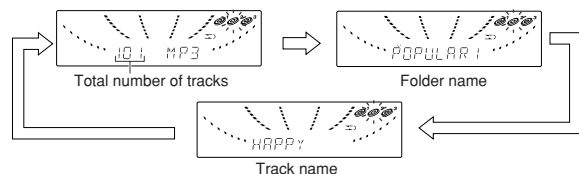
Due to the structure of its disc information, it takes longer to read an MP3 disc than a normal CD (approximately 20 to 90 seconds).

■ To change the display

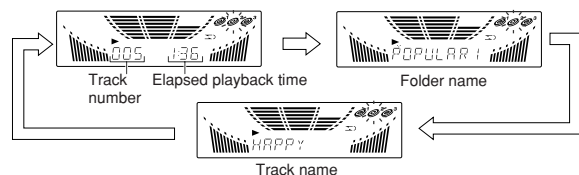
Whilst in the stop mode or playback mode, press the MP3 DISPLAY button. Each time the button is pressed, the display will change as follows.



[When in the stop mode]



[When in the playback mode]



Repeat or Random Play

■ Repeat Play

All tracks on up to 3 discs, or a programmed sequence can be continuously repeated.

To repeat all tracks on up to 3 discs:

Press the ► (▶) / ◀/SELECT/RESUME button twice.



To repeat a desired track:

Perform steps 1 - 5 in the "Programmed Play" section (page 31) and then press the ► (▶) / ◀/SELECT/RESUME button twice.

To cancel repeat play:

Press the ► (▶) / ◀/SELECT/RESUME button again. "C" will go out.

■ Random Play

The tracks on the disc(s) can be played in random order automatically.

Press the RANDOM button on the remote control to begin random play.



To cancel random play:

Press the ► (▶) / ◀/SELECT/RESUME button.

Notes:

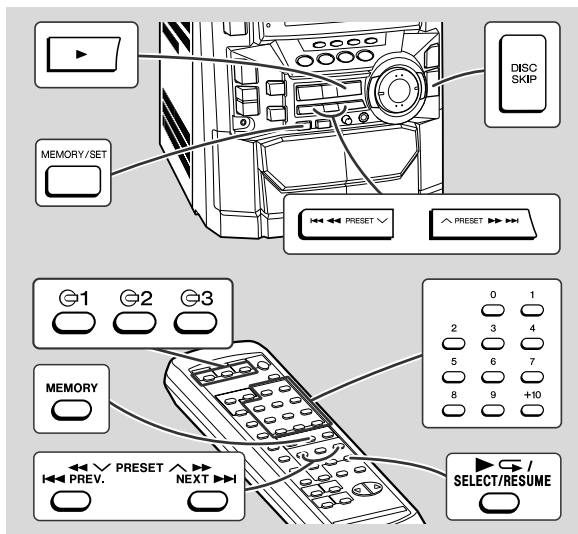
- If you press the NEXT ►► button during random play, you can move to the track selected next by the random operation. On the other hand, the ◀◀ PREV. button does not allow you to move to the previous track. The beginning of the track being played will be located.
- In random play, the unit will select and play tracks automatically. (You cannot select the order of the tracks.)

Caution:

After performing repeat or random play, be sure to press the ■ (■)RETURN button. Otherwise, the disc(s) will play continuously.

Programmed Play

You can choose up to 32 selections for playback in the order you like.



1 Press the DISC SKIP button 3 times for the unit to read the information of each disc to programme them.

2 Whilst in the stop mode, press one of the G1 - G3 buttons on the remote control to select the desired disc. Selected disc number



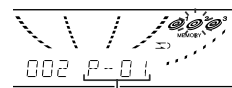
3 Press the direct search buttons on the remote control to select the desired track.



Selected track number

You can also select a track by pressing the PRESET (PREV.) or PRESET (NEXT) button.

4 Press the MEMORY/SET (MEMORY) button to save the track number.



Playback order

When the track is memorised, "MEMORY" will appear.

5 Repeat steps 2 - 4 for other tracks. Up to 32 tracks can be programmed.

If you make a mistake, the programmed tracks can be cleared by pressing the CLEAR button.

6 Press the SELECT/RESUME button to start playback.

To clear the programmed selections:

Press the CLEAR button on the remote control whilst the "MEMORY" indicator is lit. Each time the button is pressed, one track will be cleared, beginning with the last track programmed. When all the tracks are cleared, "MEMORY" will disappear.



Adding tracks to the programme:

If a programme has been previously stored, the "MEMORY" indicator will be displayed. Then follow steps 2 - 4 to add tracks. The new tracks will be stored after the last track of the original programme.

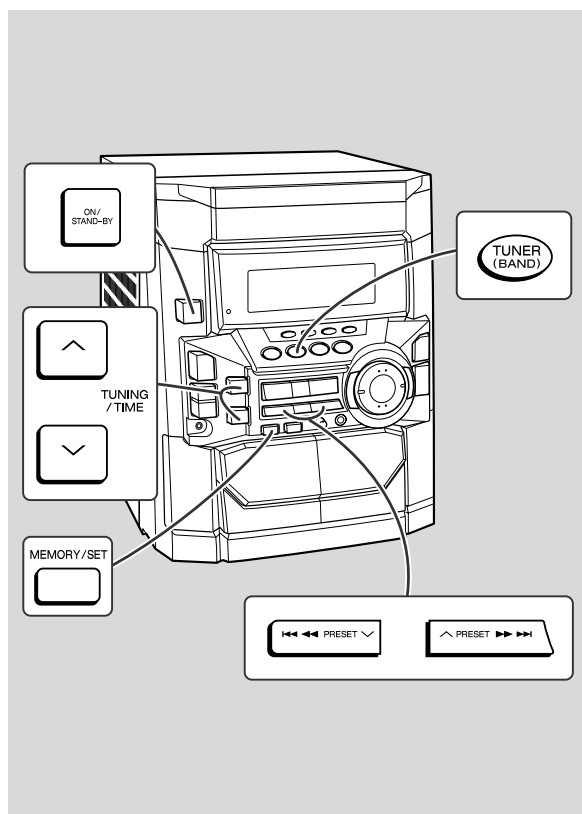
Notes:

- Opening the disc tray automatically cancels the programmed sequence.
- Even if you press the ON/STAND-BY button to enter the stand-by mode or the function is changed from CD/VIDEO CD (CD) to another, the programmed selections will not be cleared.
- During programme operation, random play is not possible.

Caution:

If you change the folder or track name display whilst programming, another disc cannot be selected.

Listening to the Radio

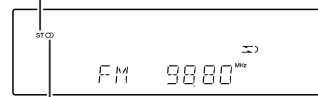


- 1** Press the ON/STAND-BY button to turn the power on.
 - 2** Press the TUNER (BAND) button repeatedly to select the desired frequency band (FM or AM).
 - 3** Press the TUNING/TIME (∨ or ∧) button to tune in to the desired station.
 - Manual tuning:**
Press the TUNING/TIME button as many times as required to tune in to the desired station.
 - Auto tuning:**
When the TUNING/TIME button is pressed for more than 0.5 seconds, scanning will start automatically and the tuner will stop at the first receivable broadcast station.
- Notes:**
- When radio interference occurs, auto scan tuning may stop automatically at that point.
 - Auto scan tuning will skip weak signal stations.
 - To stop the auto tuning, press the TUNING/TIME button again.

To receive an FM stereo transmission:
Press the TUNER (BAND) button to display the "ST" indicator.

- "ST" will appear when an FM broadcast is in stereo.

FM stereo mode indicator



FM stereo receiving indicator

- If the FM reception is weak, press the TUNER (BAND) button to extinguish the "ST" indicator. The reception changes to monaural, and the sound becomes clearer.

After use:
Press the ON/STAND-BY button to enter the power stand-by mode.

Listening to the Memorised Station

■ Memorising a station

You can store 40 AM and FM stations in memory and recall them at the push of a button. (Preset tuning)

1 Perform the steps 1 - 3 in "Listening to the Radio" on page 32.

2 Press the MEMORY/SET button to enter the preset tuning saving mode.

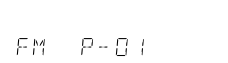


3 Within 30 seconds, press the \lll PRESET \vee or \wedge PRESET \ggg button to select the preset channel number.



Store the stations in memory, in order, starting with preset channel 1.

4 Within 30 seconds, press the MEMORY/SET button to store that station in memory.



If the "MEMORY" and preset number indicators go out before the station is memorised, repeat the operation from step 2.

5 Repeat steps 1 - 4 to set other stations, or to change a preset station.

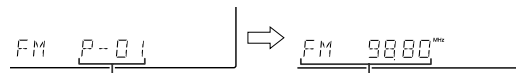
When a new station is stored in memory, the station previously memorised will be erased.

Note:

The backup function protects the memorised stations for a few hours should there be a power failure or the AC power lead disconnection.

■ To recall a memorised station

Press the \lll PRESET \vee or \wedge PRESET \ggg button for less than 0.5 seconds to select the desired station.



Preset channel

Frequency and frequency band

This can be operated by pressing the PRESET (\vee or \wedge) button on the remote control.

■ To scan the preset stations

The stations saved in memory can be scanned automatically. (Preset memory scan)

1 Press the \lll PRESET \vee or \wedge PRESET \ggg button for more than 0.5 seconds.

- The preset number will flash and the programmed stations will be tuned in sequentially, for 5 seconds each.
- This can be operated by pressing the PRESET (\vee or \wedge) button on the remote control.

2 Press the \lll PRESET \vee or \wedge PRESET \ggg button again when the desired station is located.

■ To erase entire preset memory

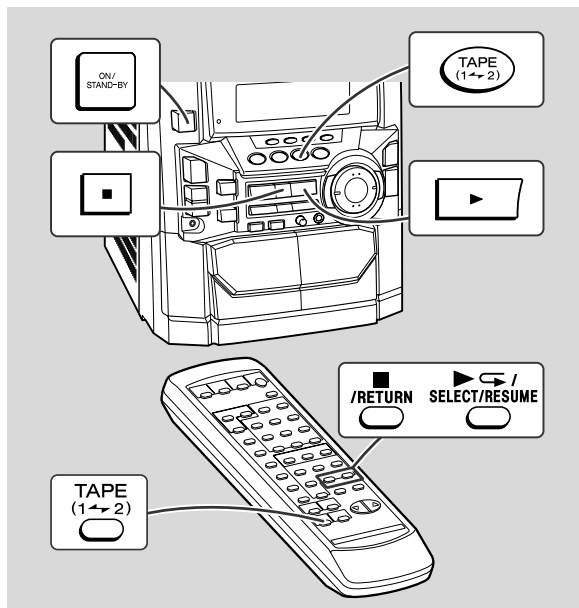
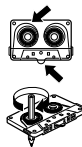
- 1 Press the ON/STAND-BY button to enter the stand-by mode.
- 2 Whilst pressing down the TUNER (BAND) button and the X-BASS/DEMO button, press the ON/STAND-BY button until "TUNER CL" appears.

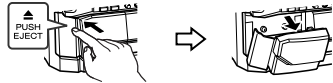



Listening to a Cassette Tape (TAPE 1)

Before playback:

- For playback, use normal or low-noise tapes for the best sound. (Metal or CrO₂ tapes are not recommended.)
- Do not use C-120 tapes or poor-quality tapes, as they may cause malfunctions.
- Before loading a tape into the cassette compartment, tighten the slack with a pen or a pencil.



- 1 Press the ON/STAND-BY button to turn the power on.
 - 2 Press the TAPE (1 → 2) button to select TAPE 1.
 - 3 Open the cassette door by pushing the area marked "▲ PUSH EJECT".
- 
- 4 Load a cassette into the TAPE 1 cassette compartment with the side to be played facing toward you.
- 
- 5 Press the ► (▶) /SELECT/RESUME button to start playback.

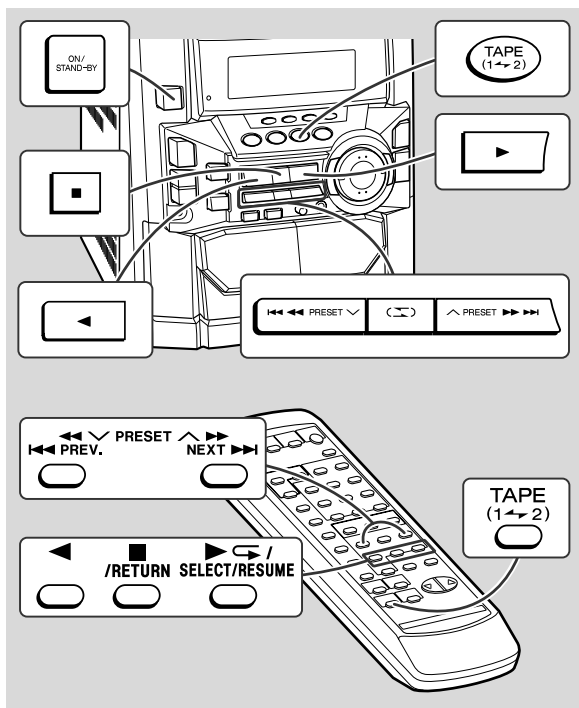
To stop playback:

Press the ■ (■) /RETURN button.

Note:

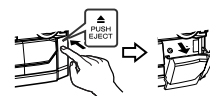
You cannot fast-forward or rewind the cassette in the TAPE 1 compartment.

Listening to a Cassette Tape (TAPE 2)



- 1** Press the ON/STAND-BY button to turn the power on.
- 2** Press the TAPE (1 ↔ 2) button to select TAPE 2.

- 3** Open the cassette door by pushing the area marked "▲ PUSH EJECT".



- 4** Load a cassette into the TAPE 2 cassette compartment with side A facing you.



- 5** Press the button to choose one side or both sides.

- ... To listen to both sides.
- ... For endless repeat play of both sides.
- ... To listen to one side.



- 6** Press the (SELECT/RESUME) button to listen to side A, or the button for side B.

To play both sides () , start from side A. When playback starts from side B, side A will not be played.

To stop playback:

Press the (RETURN) button.

Fast forward/rewind on side A:

To advance the tape, press the PRESET (▶▶) button. To rewind it, press the PRESET (◀◀) button.

Fast forward/rewind on side B:

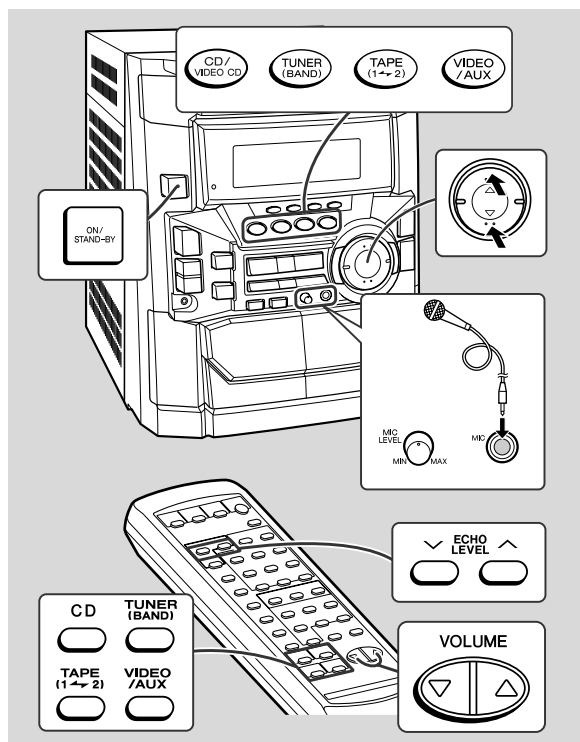
To advance the tape, press the PRESET (◀◀) button. To rewind it, press the PRESET (▶▶) button.

Caution:

- To remove the cassette, press the (RETURN) button, and then open the compartment.
- Before changing from one tape operation to another, press the (RETURN) button.
- If a power failure occurs during tape operation, the tape head will remain engaged with the tape and the cassette door will not open. Wait until power is restored.

Playing Karaoke

You can enjoy karaoke to video CDs, CDs, MP3 Discs, radio, cassettes, and other external devices by connecting a separately available microphone to this unit.



- 1** Set the MIC LEVEL control to MIN to protect the speakers from shock noise and to avoid disturbing noises.
- 2** Connect the microphone to the MIC socket.
 - Use a microphone with a 6.3 mm (1/4") plug, an impedance of 600 ohms.
 - Use a standard plug adaptor when using a microphone with a 3.5 mm (1/8") diameter plug.
- 3** Press the ON/STAND-BY button to turn the power on.
- 4** Press one of the CD/VIDEO CD (CD), TUNER (BAND), TAPE (1 – 2), VIDEO/AUX buttons to select the audio source and play it.
If you wish to record, start recording in the TAPE 2 compartment. (Refer to pages 38 - 40 for details.)
- 5** Adjust the volume of the audio source using the VOLUME buttons.
- 6** Turn the MIC LEVEL control towards MAX to increase the microphone volume and towards MIN to decrease it.
- 7** Press the ECHO LEVEL ^ button on the remote control to increase the microphone echo, and the ECHO LEVEL v button to decrease it.

Notes:

- When you sing too loud through the microphone, your voice may be distorted depending on the devices connected. If this happens, lower the microphone volume.
- If an extremely sensitive microphone is used, howling may be generated.
- Unidirectional microphone is more appropriate for vocal use.

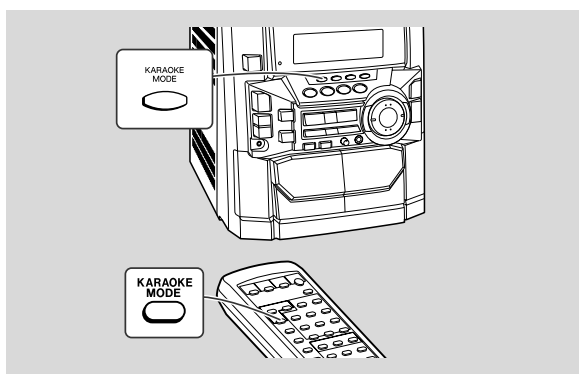
If squealing occurs:

- Reduce the microphone volume.
- Change the direction of the microphone.
- Reduce the volume of the main unit.
- Move the microphone away from the speakers.

Caution:

- When not using the microphone, remove it from the MIC socket.
- When connecting or disconnecting the microphone, set the MIC LEVEL control to MIN.

Playing Karaoke (continued)



■ To change the audio mode

Sound of the playback source can be switched among the STEREO, L-CH, R-CH, and V-CANCEL (VOCAL CANCEL) modes. The audio mode function is used when the left and right channels have individual signals from each other.

Press the KARAOKE MODE button until the desired audio mode is displayed.

Each time the KARAOKE MODE button is pressed, the mode will change as follows:



STEREO	Sounds on the left and right channels are played.
L-CH	Sounds on the left channel only are played.
R-CH	Sounds on the right channel only are played.
V-CANCEL	The main vocal is lowered.

Notes:

- The initial audio mode setting is "STEREO".
- In any mode other than the STEREO mode, "K" will appear.
- The setting will remain unchanged when you change the disc, you set the unit to the stand-by mode or the function is changed from the CD/VIDEO CD (CD) to another function.
- When playing a sound multiplexed disc on which a vocal and music have been separately recorded, select the audio mode as desired.

■ To change general stereo source to karaoke source

Even ordinary discs and tapes not recorded specifically for karaoke can be used for karaoke just by toning down the main vocal.

Press the KARAOKE MODE button until "V-CANCEL" appears in the display.

"K" will appear.

Notes:

- Use discs recorded in stereo. The function will not work with mono sources.
- With some discs and tapes the original vocals may still be heard.

Notes on sound multiplexed karaoke discs:

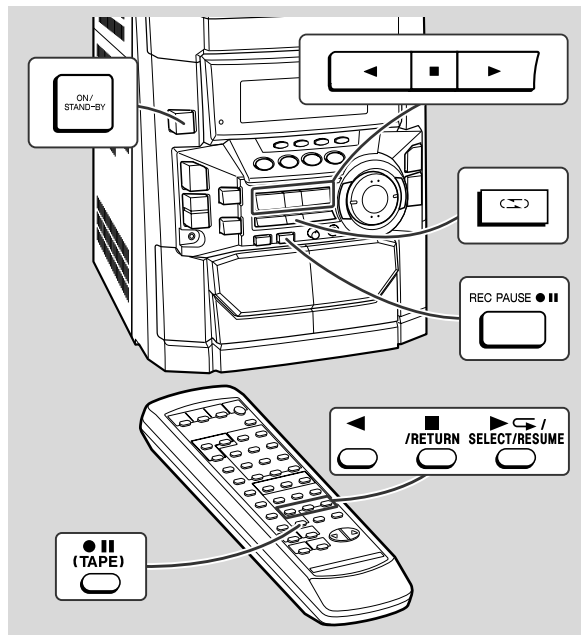
Sound multiplexed karaoke discs are discs on which the main vocal and the BGM (Background music) have been recorded on one of the two channels and only the BGM on the other.


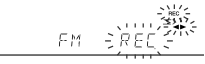
- The function will not work properly with discs which do not belong to this group.
- Discs on which vocal has been recorded on the left channel and music on the right may not play properly.

Recording from the Radio

Before recording:

- When recording important selections, make a preliminary test to ensure that the desired material is properly recorded.
- SHARP is not liable for damage or loss of your recording arising from malfunction of this unit.
- The volume and sound controls can be adjusted with no effect on the recorded signal (Variable Sound Monitor).
- **For recording, use only normal tapes. Do not use metal or CrO₂ tapes.**



- 1 Tune in to the desired station. (See page 32.)**
- 2 Load a cassette into the TAPE 2 cassette compartment with side A facing you.**
Wind past the leader of the tape, on which recording cannot be performed.
- 3 Press the button to choose one side or both sides.**

 - ▷ ... To record on both sides.
 - ◁ ... To record on only one side.
- 4 Press the REC PAUSE button.**
Recording will be paused.

- 5 Press the ▷ (▷) /SELECT/RESUME button to record on side A, or the ◁ button for side B.**
To record on both sides, begin on side A. (If recording is started from side B, the tape will not switch over to side A.)

To interrupt recording:

Press the REC PAUSE button. To resume recording, press the same recording button you pressed in step 5. Other buttons do not allow resuming.

To stop recording:

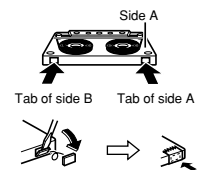
Press the RETURN button.

Note:

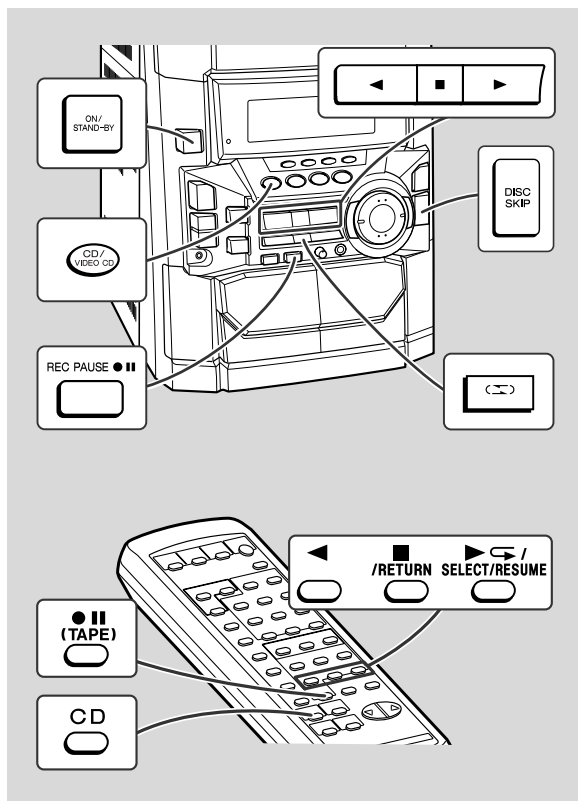
If you hear a whistling noise whilst recording an AM station, move the AM loop aerial.

Erase-prevention tab of cassette tapes:

- When recording on a cassette tape, make sure that the erase-prevention tabs are not removed. Cassettes have removable tabs that prevent accidental recording or erasing.
- To protect the recorded sound, remove the tab after recording. Cover the tab hole with adhesive tape to record on the tape without the tab.



Recording from a CD (CDs)



You can record 3 CDs continuously.

- 1 Press the ON/STAND-BY button to turn the power on.**
- 2 Load a cassette into the TAPE 2 cassette compartment with side A facing you.**
Wind past the leader of the tape, on which recording cannot be performed.
- 3 Press the CD/VIDEO CD (CD) button and load the desired disc.**
- 4 Press the button to choose one side or both sides.**
 - ... To record on both sides.
 - ... To record on only one side.
- 5 Press the DISC SKIP button to select the disc to be recorded first.**
- 6 Press the REC PAUSE (TAPE) button.**
Recording will be paused.
- 7 Press the (SELECT/RESUME) button to record on side A, or the button for side B.**
 - To record on both sides, begin on side A. (If recording is started from side B, the tape will not switch over to side A.)
 - Recording is started from the selected CD. When the playback of the last disc is finished or the end of the tape is reached, the CD and the cassette will stop automatically.
 - CD playback will start approximately 5 seconds after the tape starts.

To perform programmed recording:

- 1 Programme discs and tracks. (See pages 22, 31.)
- 2 Press the REC PAUSE (TAPE) button.
- 3 Press the (SELECT/RESUME) button to record on side A, or the button for side B.

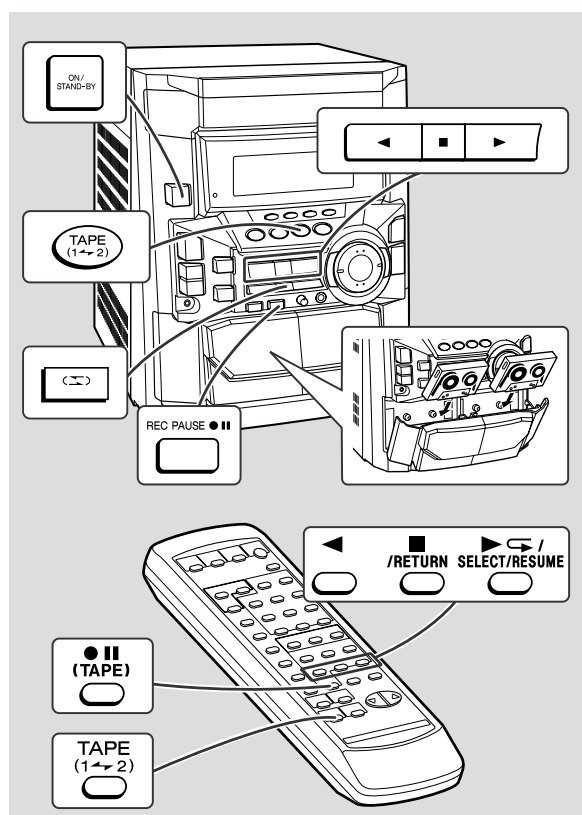
To stop recording:

Press the (RETURN) button.
The CD and tape will stop.

Auto restart function:

If the recording side is switched from side A to B during recording, the system will record the interrupted track on side B from its beginning. The recording will be made without cutting the beginning of the track on side B.

Dubbing from Tape to Tape



You can record from TAPE 1 to TAPE 2.

- 1** Press the ON/STAND-BY button to turn the power on.
- 2** Load a prerecorded cassette into the TAPE 1 cassette compartment. Insert a blank tape into the TAPE 2 cassette compartment.
It is recommended that the recording tape is the same length as the master tape.
- 3** Press the TAPE (1 ↔ 2) button until "TAPE 1" appears on the display.
The reverse mode will be set to "←".
- 4** Press the REC PAUSE ●|| (●|| (TAPE)) button.
Recording will be paused.
- 5** Press the ► (► ◀/SELECT/RESUME) button.

To stop dubbing:

Press the ■ (■/RETURN) button.
TAPE 1 and TAPE 2 will simultaneously stop.

■ Erasing recorded tapes

- 1 Load the tape to be erased into the TAPE 2 cassette compartment with the side to be erased facing toward you.
- 2 Press the TAPE (1 ↔ 2) button until "TAPE 2" appears on the display.
- 3 Set the ◀ button to "←" to erase only one side and to "→" to erase both sides.
- 4 Press the REC PAUSE ●|| (●|| (TAPE)) button.
- 5 Press the ► (► ◀/SELECT/RESUME) button to erase side A, or the ◀ button to erase side B.
To erase both sides, begin from side A. (If erasing is started from side B, the tape will not switch over to side A.)

Note:

Make sure that the TAPE 1 is not in use.

Timer and Sleep Operation

Timer playback:

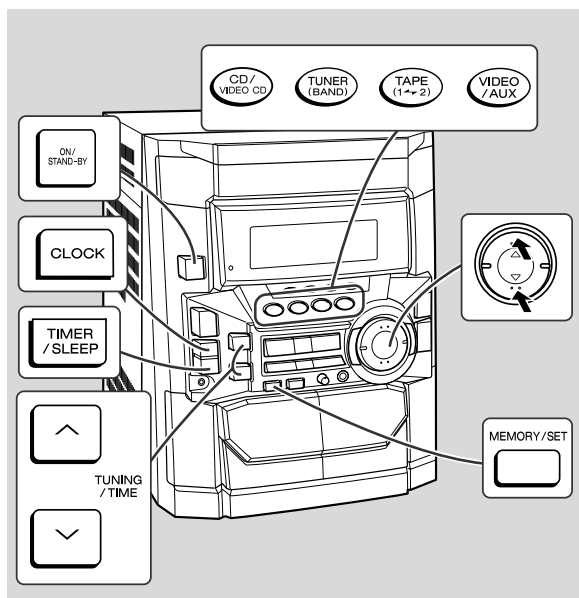
The unit turns on and plays the desired source (video CD, CD, MP3 disc, tuner, tape) at the preset time.

Timer recording:

The unit turns on and starts recording from the tuner at the preset time.

Sleep operation:

The radio, video CD, CD, MP3 disc and cassette tape can all be turned off automatically.



■ Timer playback or Timer recording

Before setting timer:

- 1 Press the CLOCK button to check that the clock is on time.



- 2 For timer playback: Load a cassette or discs to be played.
For timer recording: Load a cassette for recording in the TAPE 2 cassette compartment.



- 1 Press the ON/STAND-BY button to turn the power on.

- 2 Press the CD/VIDEO CD, TUNER (BAND) or TAPE (1 - 2) button to select the desired function.

To select the timer playback source: CD/VIDEO CD, TUNER (BAND) or TAPE (1 - 2).

To select the timer recording source: TUNER (BAND).

When you selected the TUNER (BAND), tune in to the desired station.

- 3 Adjust the volume using the VOLUME buttons.

Do not turn the volume up too high.

- 4 Press the TIMER/SLEEP button repeatedly to select timer playback or timer recording.

Display the white "e" for timer playback and the red "e" for timer recording.

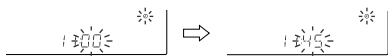


- 5 Press the TUNING/TIME (∨ or ∧) button to specify the hour to start, then press the MEMORY/SET button.

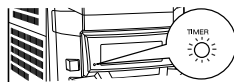


The illustrations show the timer playback setting.

6 Press the TUNING/TIME (∨ or ∧) button to specify the minutes, then press the MEMORY/SET button.



7 The unit will enter the timer stand-by mode automatically.



To cancel the timer playback/timer recording:

Press the ON/STAND-BY button to turn the power on.

8 When the preset time is reached, playback or recording will start.

The volume will increase gradually until it reaches the volume you were listening at before your system enters the timer stand-by mode.

9 In timer playback:

If you select CD/VIDEO CD or TAPE, the unit will enter the stand-by mode after the playback. If you select TUNER, it will enter the stand-by mode one hour after the timer playback starts.

In timer recording:

When the recording tape reaches its end, the timer recording will end, and the unit will enter the stand-by mode.

To reset or change the timer setting:

Perform "Timer playback or Timer recording" from the beginning.

Notes:

- Once the time is set, the setting will be retained until a new time is entered.
- When performing timer playback or recording using another unit connected to the VIDEO/AUX sockets, select "VIDEO/AUX" in step 2. At this time, only this unit will be turned on or enter the power stand-by mode automatically. It will enter the power stand-by mode when the end of the recording tape is reached in timer recording or 1 hour after the playback starts in timer playback. However, another unit will not be turned on or off.

■ Sleep operation

1 Play back the desired sound source.

2 Press the TIMER/SLEEP button repeatedly until "SLEEP" is displayed.



To change the sleep time:

Whilst the sleep time is displayed, press the TUNING/TIME (∨ or ∧) button.

(Maximum: 3 hours - Minimum: 1 minute)

- 3 hours - 5 minutes → 5-minute intervals
- 5 minutes - 1 minute → 1-minute intervals

3 Press the MEMORY/SET button.

4 Your system will enter the power stand-by mode automatically after the preset time has elapsed.

The volume will be turned down 1 minute before the sleep operation finishes.

To cancel the sleep operation:

Press the ON/STAND-BY button whilst the sleep timer is set.

To confirm the remaining sleep time:

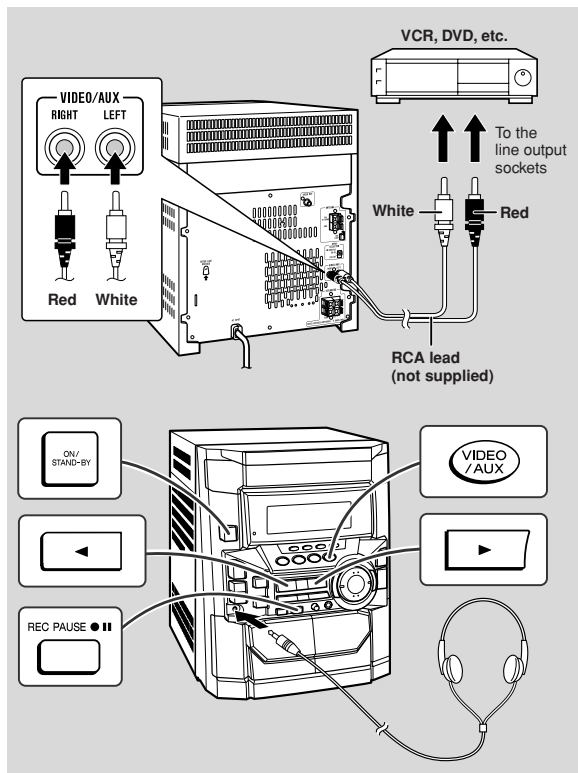
Press the TIMER/SLEEP button whilst the sleep timer is set. The remaining sleep time is displayed for about 5 seconds.

Note:

Once the sleep time is set, it will remain unchanged until a new time is entered.

Enhancing Your System

The connection lead is not included. Purchase a commercially available lead as shown below.



■ Listening to the playback sounds from VCR, DVD, etc.

1 Use a connection lead to connect the VCR, DVD, etc. to the VIDEO/AUX sockets.

When using video equipment, connect the audio output to this unit and the video output to a television.

2 Press the ON/STAND-BY button to turn the power on.

3 Press the VIDEO/AUX button.

4 Play the connected equipment.

Note:

To prevent hum interference, place this unit away from a television.

■ To record on a tape

1 Insert a cassette in the TAPE 2 cassette compartment.

2 Press the VIDEO/AUX button.

3 Press the REC PAUSE [●||] [●||] (TAPE) button.

4 Press the ► [▶] [◀] (SELECT/RESUME) or ◀ button.

5 Play the VCR, DVD, etc.

■ Headphones

- Before plugging in or unplugging the headphones, reduce the volume.
- Be sure your headphones have a 3.5 mm (1/8") diameter plug and are between 16 ohms and 50 ohms impedance. The recommended impedance is 32 ohms.
- Plugging in the headphones disconnects the speakers automatically. Adjust the volume using the VOLUME buttons.

Troubleshooting Chart

Many potential problems can be resolved by the owner without calling a service technician. If something is wrong with this product, check the following before calling your authorised SHARP dealer or service centre.

■ General

Symptom	Possible cause
<ul style="list-style-type: none"> The clock is not on time. 	<ul style="list-style-type: none"> Did a power failure occur? Reset the clock. (Refer to page 14.)
<ul style="list-style-type: none"> When a button is pressed, the unit does not respond. 	<ul style="list-style-type: none"> Set this unit to the power stand-by mode and then turn it back on. If the unit still malfunctions, reset it. (Refer to page 45.)
<ul style="list-style-type: none"> No sound is heard. 	<ul style="list-style-type: none"> Is the volume level set to "0"? Are the headphones connected? Are the speaker wires disconnected? Is the karaoke mode set to "L-CH", "R-CH" or "V-CANCEL"?

■ Video CD

Symptom	Possible cause
<ul style="list-style-type: none"> The picture is not displayed during playback. 	<ul style="list-style-type: none"> Is the TV unplugged? Is the unit connected improperly? Is the input selector on the TV set to other than "VCR"? Is the unit being played without selecting video CD?
<ul style="list-style-type: none"> The picture quality is poor, or it is distorted. 	<ul style="list-style-type: none"> Is the disc very dirty?

■ CD player

Symptom	Possible cause
<ul style="list-style-type: none"> Playback does not start. Playback stops in the middle or is not performed properly. 	<ul style="list-style-type: none"> Is the disc loaded upside down? Does the disc satisfy the standards? Is the disc distorted or scratched?
<ul style="list-style-type: none"> Playback sounds are skipped, or stopped in the middle of a track. 	<ul style="list-style-type: none"> Is the unit located near excessive vibrations? Is the disc very dirty? Has condensation formed inside the unit?

■ Tuner

Symptom	Possible cause
<ul style="list-style-type: none"> Radio makes unusual noise consecutively. 	<ul style="list-style-type: none"> Is the unit placed near the TV or computer? Is the FM aerial or AM loop aerial placed properly? Move the AC power lead away from the aerial if located near.

■ Cassette deck

Symptom	Possible cause
<ul style="list-style-type: none"> Cannot record. 	<ul style="list-style-type: none"> Is the erase-prevention tab removed?
<ul style="list-style-type: none"> Cannot record tracks with proper sound quality. Cannot erase completely. 	<ul style="list-style-type: none"> Is it a normal tape? (You cannot record on a metal or CrO₂ tape.)
<ul style="list-style-type: none"> Sound skipping. 	<ul style="list-style-type: none"> Is there any slack? Is the tape stretched? Are the capstans, pinch rollers, or heads dirty?
<ul style="list-style-type: none"> Cannot hear treble. Sound fluctuation. Cannot remove the tape. 	<ul style="list-style-type: none"> If a power failure occurs during playback, the heads remain engaged with the tape. Do not open the compartment forcibly. Wait until electricity resumes.

■ Karaoke

Symptom	Possible cause
<ul style="list-style-type: none"> The vocal part of a multiplexed disc is not heard. 	<ul style="list-style-type: none"> Is the karaoke mode set to "L-CH", "R-CH" or "V-CANCEL"?

■ Remote control

Symptom	Possible cause
<ul style="list-style-type: none"> The remote control does not operate. 	<ul style="list-style-type: none"> Is the AC power lead of the unit plugged in? Is the battery polarity respected? Are the batteries dead? Is the distance or angle incorrect? Does the remote control sensor receive strong light?

ENGLISH

Troubleshooting Chart (continued)

■ If trouble occurs

When this product is subjected to strong external interference (mechanical shock, excessive static electricity, abnormal supply voltage due to lightning, etc.) or if it is operated incorrectly, it may malfunction.

If such a problem occurs, do the following:

- 1 Set the unit to the stand-by mode and turn the power on again.
- 2 If the unit is not restored in the previous operation, unplug and plug in the unit, and then turn the power on.

Note:

If neither operation above restores the unit, clear all the memory by resetting it.

■ Clearing all the memory (reset)

- 1 Press the ON/STAND-BY button to enter the power stand-by mode.
- 2 Whilst pressing down the ► button and the X-BASS/DEMO button, press the ON/STAND-BY button until "CLEAR AL" appears.



Caution:

This operation will erase all data stored in memory including clock, timer settings, tuner preset, and CD programme.

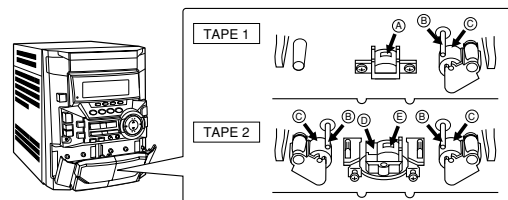
■ Before transporting the unit

- 1 Press the ON/STAND-BY button to turn the power on.
- 2 Press the CD/VIDEO CD button.
- 3 Press the ▲ OPEN/CLOSE button to open the disc tray. Remove all discs from the unit.
- 4 Press the ▲ OPEN/CLOSE button to close the disc tray. Make sure that "NO DISC" is displayed.
- 5 Press the ON/STAND-BY button to enter the stand-by mode, and then unplug the AC power lead from the wall socket.

Maintenance

■ Cleaning the tape-handling parts

- Dirty heads, capstans or pinch rollers can cause poor sound and tape jams. Clean these parts with a cotton swab moistened with commercial head/pinch roller cleaner or isopropyl alcohol.
- When cleaning the heads, pinch rollers, etc., unplug the unit which contains high voltages.



- A Playback head
- B Capstan
- C Pinch roller
- D Erase head
- E Recording/Playback head

- After long use, the deck's heads and capstans may become magnetised, causing poor sound. Demagnetise these parts once every 30 hours of playing/recording time by using a commercial tape head demagnetiser. Read the demagnetiser's instructions carefully before use.

■ Cleaning the cabinet

Periodically wipe the cabinet with a soft cloth and a diluted soap solution, then with a dry cloth.

Caution:

- Do not use chemicals for cleaning (petrol, paint thinner, etc.). It may damage the cabinet finish.
- Do not apply oil to the inside of the unit. It may cause malfunctions.



Specifications

As part of our policy of continuous improvement, SHARP reserves the right to make design and specification changes for product improvement without prior notice. The performance specification figures indicated are nominal values of production units. There may be some deviations from these values in individual units.

■ General

Power source	AC 110/127/220/230 - 240 V, 50/60 Hz
Power consumption	130 W
Dimensions	Width: 270 mm (10-11/16") Height: 330 mm (13") Depth: 340 mm (13-3/8")
Weight	7.2 kg (15.7 lbs.)

■ Amplifier

Output power	MPO: 240 W (120 W + 120 W) (10 % T.H.D.) RMS: 150 W (75 W + 75 W) (10 % T.H.D.) RMS: 104 W (52 W + 52 W) (0.9 % T.H.D.)
Output terminals	Speakers: 6 ohms Headphones: 16 - 50 ohms (recommended: 32 ohms)
Input terminals	Video/Auxiliary (audio signal): 500 mV/47 kohms Microphone: 1 mV/600 ohms

■ Video CD

Video output format	PAL/NTSC
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■ CD player

Type	3-disc multi-play compact disc player
Signal readout	Non-contact, 3-beam semiconductor laser pickup
D/A converter	1-bit D/A converter
Frequency response	20 - 20,000 Hz
Dynamic range	90 dB (1 kHz)

■ Tuner

Frequency range	FM: 88 - 108 MHz AM: 531 - 1,602 kHz
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■ Cassette deck

Frequency response	50 - 14,000 Hz (Normal tape)
Signal/noise ratio	55 dB (TAPE 1, playback) 50 dB (TAPE 2, recording/playback)
Wow and flutter	0.3 % (WRMS)

■ Speaker

Type	2-way type speaker system 5 cm (2") Tweeter 13 cm (5-1/4") Woofer
Maximum input power	150 W
Rated input power	75 W
Impedance	6 ohms
Dimensions	Width: 220 mm (8-11/16") Height: 330 mm (13") Depth: 217 mm (8-9/16")
Weight	3.3 kg (7.3 lbs.)/each

บันทึก/MEMO

บันทึก/MEMO

SHARP

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