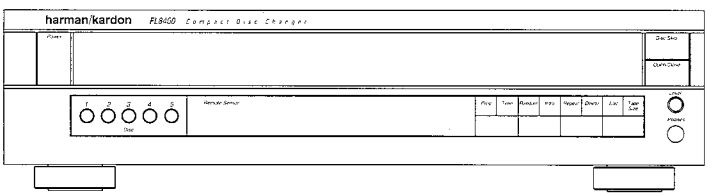
OPERATING INSTRUCTIONS



FL8400

Compact Disc Changer

harman/kardon

Unpacking and Installation

Congratulations on Your Purchase!

Your new high fidelity Multi Compact Disc Player is designed to deliver maximum enjoyment and years of trouble free service.
Please take a few moments to read this manual thoroughly. It will explain the features and operation of your Multi Compact Disc Player and help a trouble free installation.
Please unpack your Multi Compact Disc Player carefully. We recommend that you save the carton and packing material. They will be helpful if you ever need to move your unit and may be required if you ever need to return it for service.
Your Multi Compact Disc Player is designed to be placed in a horizontal position and it is important to allow at least two inches of space behind your unit for adequate ventilation and cabling convenience. To avoid early damage, never place the unit near radiators, in front of heating vents, in direct sun light, or in excessively humid or dusty location.
Connect your complementary components as illustrated in the following section.

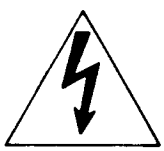
CLASS 1
LASER PRODUCT

CAUTION
Invisible laser radiation when the unit is open. Do not stare into beam.

CAUTION: USE OF ANY CONTROLS, ADJUSTMENT, OR PROCEDURES OTHER THAN THOSE SPECIFIED HEREIN MAY RESULT IN HAZARDOUS RADIATION EXPOSURE.

CAUTION
RISK OF ELECTRIC SHOCK
DO NOT OPEN

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



This symbol is intended to alert the user to the presence of uninsulated "dangerous voltage" within the product's enclosure that may be of sufficient magnitude to constitute a risk of electric shock to persons.

This symbol is intended to alert the user to the presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

Caution: To prevent electric shock do not use this (polarized) plug with an extension cord, receptacle or other outlet unless the blades can be inserted to prevent blade exposure.

Attention: Pour prévenir les chocs électriques ne pas utiliser cetre fiche polarisée avec un prolongateur, une prise de courant ou une autre sortie de courant, sauf si les lames prévent étre insérées à fond sans en laisser aucune partie à découvert.

WARNING

To prevent fire or shock hazard, do not expose the unit to rain or moisture.

Read this Before Operating Your Unit

For the U.S.A. and Canada 120V

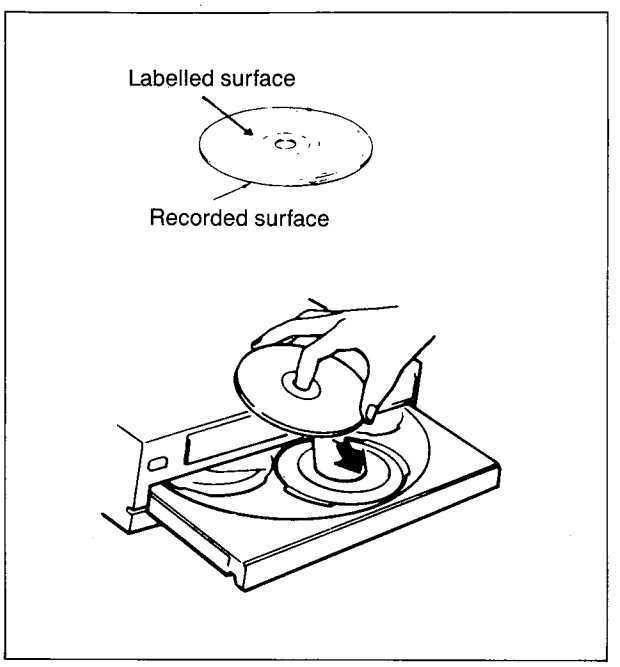
FOR YOUR SAFETY

Units shipped to the U.S.A and Canada are designed for operation on 120V AC only.
Safety precaution for a Polarized AC plug.
However, some products may be supplied with a nonpolarized plug.
CAUTION: TO PREVENT ELECTRIC SHOCK DO NOT USE THIS (POLARIZED) PLUG WITH AN EXTENSION CORD, RECEPTACLE OR OTHER OUTLET UNLESS THE BLADES CAN BE FULLY INSERTED TO PREVENT BLADE EXPOSURE.

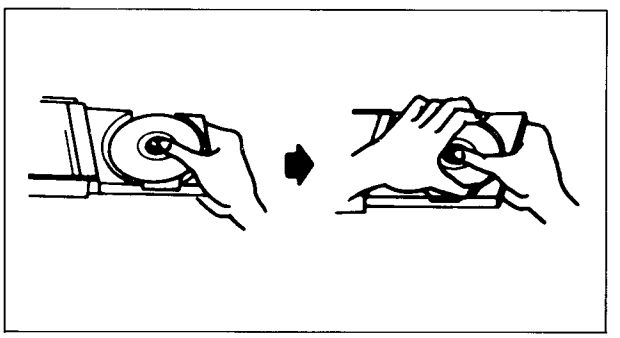
Concerning Compact Discs

- Only Compact discs bearing this mark can be reproduced. No other discs can be reproduced.

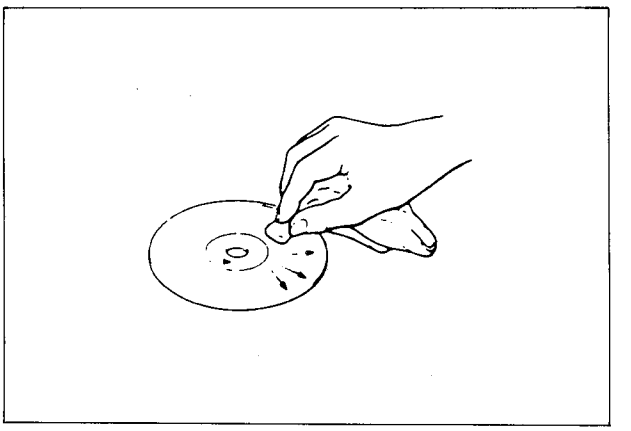
COMPACT
disc
DIGITAL AUDIO



- You can also play 8cm CD on the inside circle of the tray. Do not put a normal CD over it.
- Always place the compact disc in the disc tray with the labelled side up. (Compact discs can be played only on one side).



- To remove a disc from its storage case, press down on the center of the case and lift the disc out of a case, holding it carefully with the edges.



- Fingermarks and dust should be carefully wiped off the disc's recorded surface with a soft cloth. Unlike conventional records, the compact disc has no grooves to collect dust and microscopic debris and so gently wiping with a soft cloth will remove most particles completely. Wipe straight from the inside to the outside of the disc. Small dust particles and light stains will have absolutely no effect on reproduction quality.
- Never use such chemicals as record sprays, antistatic sprays or fluid, benzine or thinner to clean compact discs. Such chemicals would damage the disc's plastic surface irreparably.
- Discs should be stored in their cases after use to avoid serious scratches that could cause the laser pickup to "skip".
- Don't expose discs to direct sunlight or high humidity and temperature for extended periods. Long exposure to high temperature can warp the disc.
- Don't stick paper or write anything with ball-point pen on the surface of the labelled side.

Installation

- This unit is composed of many sensitive objects, laser pickup and LSI, etc.. Therefore avoid installing this unit under the following conditions.

1. On an inclined or unstable location.
2. In a closed vehicle or high temperature (over 100°F; 40°C).
3. Exposure for long time in direct sunlight.
4. In very humid locations.
5. In dusty or smoky locations.
6. In very low temperature (below 40°F; 5°C).
7. Near strong magnetic fields.

*** CAUTION**

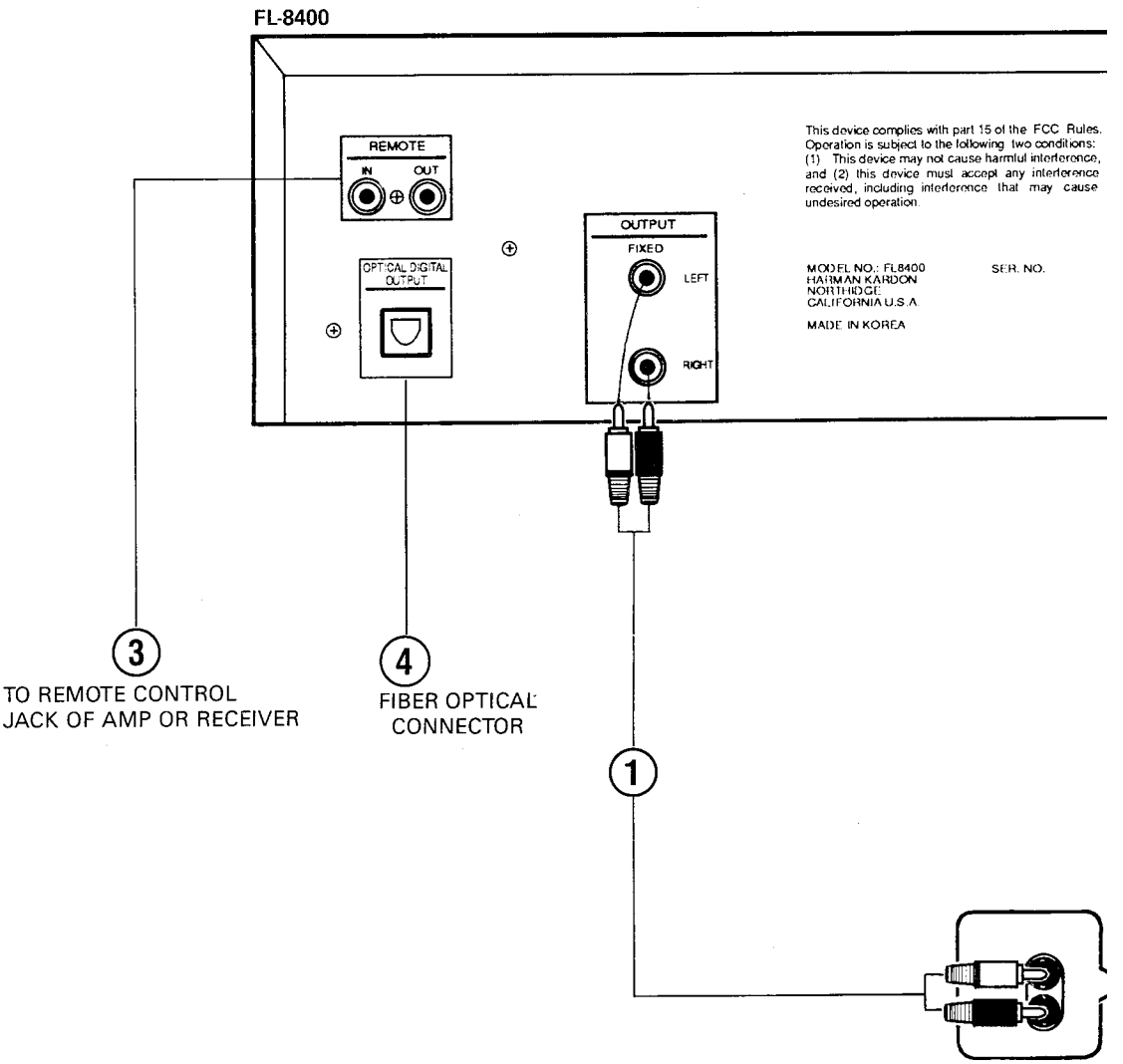
1. In installing your own system, do not lay the unit directly upon an amplifier under any circumstances because such an amplifier gives off excessive heat.
2. Avoid installing this unit near a tuner or a television. Because it uses high frequency signals, this unit may influence radio or television. If the above precaution can not be met, you may have to turn off the unit when not in use.
3. Do not rotate the roulette by the hand. If you do so, it can be out of order.
4. Remove the discs in the tray for movement. If you do not so, it can be out of order.

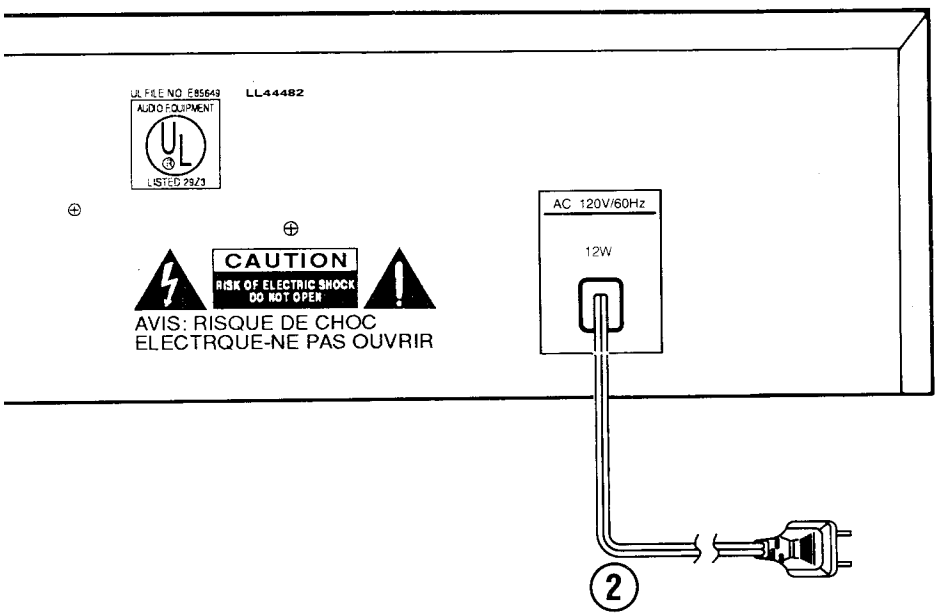
FCC Information

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

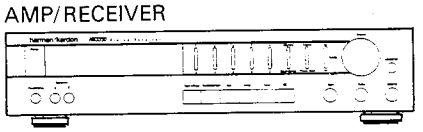
— Reorient or relocate the receiving antenna.
— Increase the separation between the equipment and receiver.
— Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
— Consult the dealer or an experienced radio/TV technician for help.

Rear Panel Connections

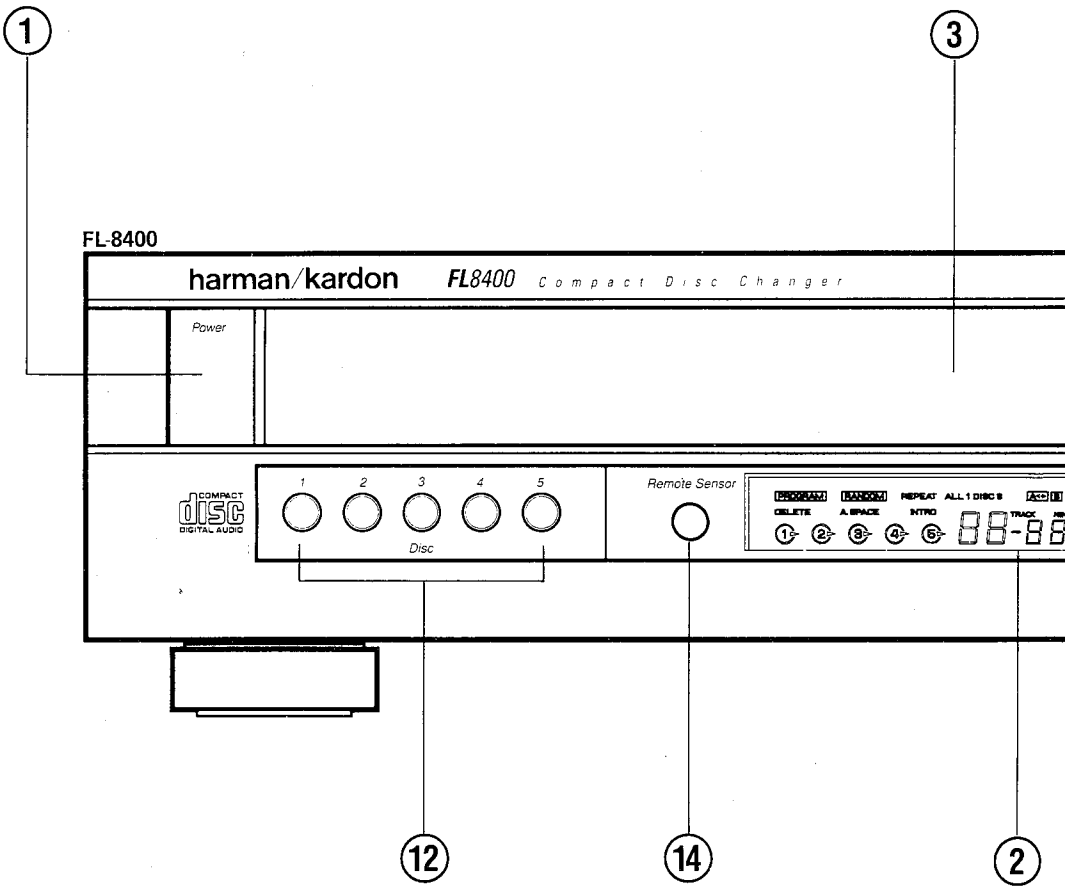


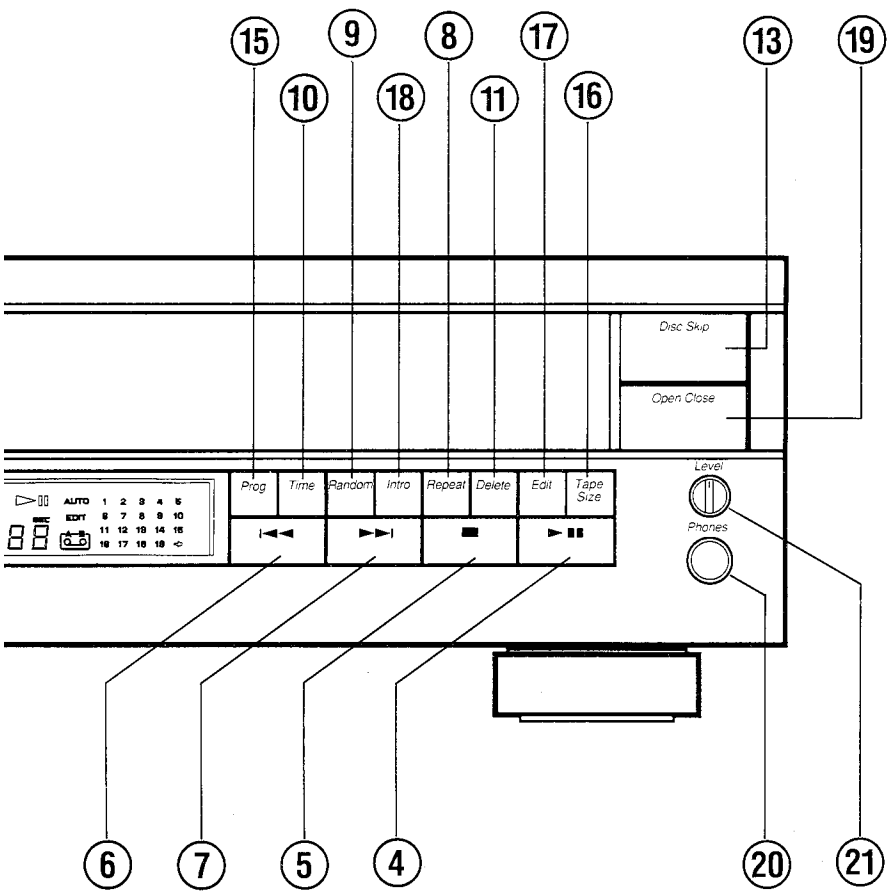


AMP/RECEIVER



Front Panel Controls




15
9
8
17
13
19
10
18
11
16
Disc Skip
Open Close
Level
Prog
Time
Random
Intro
Repeat
Delete
Edit
Tape Size
Phones
6
7
5
4
20
21

Rear Panel Connections

* Before making connections, first turn off the unit.
* See the connecting diagram in the operating instruction manual of Harman Kardon compatible amplifier or receiver.

① CONNECTION CORDS

You will have two leads from this unit to connect to amplifier or receiver. One lead (WHITE) carries the LEFT channel signal and should be connected to the LEFT of CD (or AUX) input of amplifier or receiver. The other lead (RED) should be connected to the RIGHT of CD (or AUX) input of yours.

② AC INPUT CORD

Plug this cord into the switched AC outlet of amplifier or receiver or a household AC outlet.

③ SYSTEM REMOTE CONTROL CORD

The remote control input jack allows remote control of this unit via a cable. This cable can be connected to the remote control output jack of another Harman Kardon product. Alternatively, it can be connected to an accessory device that converts infrared remote control signals into detected pulses.
While all Harman Kardon products with remote control jacks are compatible with one another, not all accessory devices or other manufacturer's products are. However, it is safe to experiment.

④ DIGITAL OUT

Fiber Optical connector.

Front Panel Controls

① POWER SWITCH

Press the POWER switch to turn on this unit and press it again to turn it off.
For system operation, plug the AC input cord into the switched AC outlet, keep the power switch ON and control power ON/OFF with the main POWER switch on the amplifier or receiver.

② MULTI FUNCTION DISPLAY

This display shows the corresponding information according to each mode.

③ DISC TRAYS (1-5)

One disc per tray can be loaded with the labelled side up.

④ PLAY/PAUSE BUTTON (▶/❚❚)

This button is used for starting play, holding play at the beginning of a track or interrupting play.

⑤ STOP/CLEAR BUTTON (■)

This button is used for stopping play, clearing programmed selections or recovering the deleted selections.

⑥ BACKWARD SKIP/SEARCH BUTTON (⏮/◀◀)

This button is used for replaying from the beginning of the current track, returning to a previous track or searching for a particular passage in fast reverse.

⑦ FORWARD SKIP/SEARCH BUTTON (⏭/▶▶)

This button is used for moving on to a next track or searching for a particular passage in fast forward.

⑧ REPEAT BUTTON

This button is used for repeating one track, one disc or all discs.

⑨ RANDOM PLAY BUTTON

This button is used to let the unit automatically select and play tracks on each CD or discs and tracks at random.

⑩ TIME BUTTON

This button is used for checking the elapsed playing time from the beginning of the current track, remaining playing time of the current track or remaining playing time of the disc.

⑪ DELETE BUTTON

This button is used for deleting the undesired tracks or discs.

⑫ DISC SELECTOR BUTTONS

These buttons are used for selecting the disc to be played.

⑬ DISC SKIP BUTTON

Each time this button is pressed to load or unload the disc, the carousel will rotate to the next tray position clockwise.

⑭ INFRARED RECEIVER WINDOW

This receives the infrared signals transmitted by the commander and converts it into the electrical signal to control this unit.

⑮ PROGRAM/REVIEW BUTTON

This button is used for programming your favorite tracks or discs or reviewing the programmed selections.

⑯ TAPE SIZE BUTTON

This button is used for selecting the tape length.

⑰ EDIT BUTTON

This button is used for editing the tracks to be recorded onto the cassette tape.

⑱ DISC INTRO BUTTON

This button is used for playing the first 10 seconds of each track or the first track on CDs.

⑲ OPEN/CLOSE BUTTON

This button is used for opening or closing the tray.

⑳ HEADPHONE JACK

This is used for listening with the headphones.

㉑ HEADPHONE VOLUME

This is used for the adjustment of the headphone level.

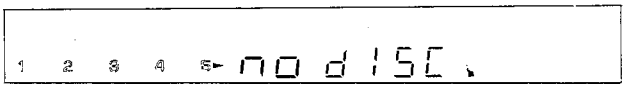
Operations

■ PLAYING CD's

▪ CONTINUOUS PLAY

- In continuous play mode, the unit plays from the first track on the first disc to the final track on the 5th disc.

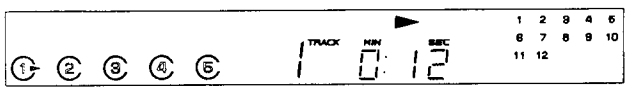
1. Press the POWER switch.
- The carousel will rotate to see where the CD is.



2. Open the tray.
3. Load the disc(s) on the tray(s) with the labelled side up.
- For loading a disc in the 5th tray, press the DISC SKIP button.

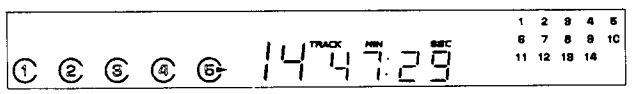
4. Close the tray.
- Do not insert any objects into the tray. If you do so, the unit can be out of order.
- Do not leave the tray open to prevent dirt and dust from entering the mechanism, when not in use.

5. Press the PLAY/PAUSE button.
- The continuous play starts from the tray on which a CD is.



➡ In the music calender appears when the number of tracks is more than 19.

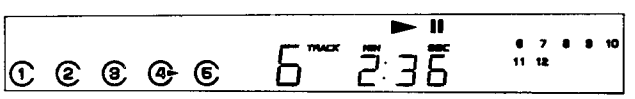
- After the last track on the 5th disc has been played, the unit switches to the stop mode.



STOP MODE

■ INTERRUPTING PLAY

- Press the PLAY/PAUSE button to temporarily interrupt play, then the sound stops and ❚❚ appears on the display.
- To replay, press the PLAY/PAUSE button again.



PAUSE MODE

■ STOPPING PLAY

- Press the STOP/CLEAR button to stop play before the end of the last disc is reached.

■ SELECTING THE DESIRED DISC WITH THE DISC SELECTOR BUTTONS

- To start play from a disc among five discs, press the button that corresponds to the desired disc, then continuous play starts from the first track of the desired disc without the PLAY/PAUSE button.

■ REPLACING DURING CONTINUOUS PLAY

- Open the tray and replace other discs except the disc being played with the new ones.
- Close the tray.

■ SELECTING A NEXT TRACK IN THE PLAY MODE

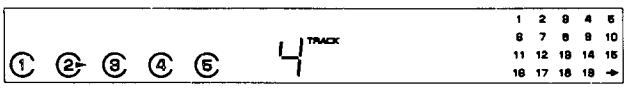
- Press the FORWARD SKIP button (▶▶❙) to advance to the beginning of the next track.
- During normal or deleted play, etc., if the FORWARD SKIP button is pressed when playing the last track on a CD, the last track is skipped to the first track on that CD.
- During random or programmed play, etc. if the FORWARD SKIP button is pressed when playing the last track, the "End" sign appears on the display and the last track continues to be played.

■ SELECTING A PREVIOUS TRACK IN THE PLAY MODE

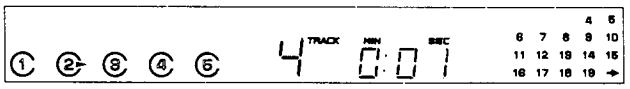
- If a track is playing, press the BACKWARD SKIP button (❙◀◀) to return to the beginning of the track.
- Press the BACKWARD SKIP button before a track begins playing to move to the beginning of the previous track.
- During normal or deleted play, etc., if the BACKWARD SKIP button is pressed at the beginning of the first track on a CD, the first track is skipped to the last track on that CD.
- During random or programmed play, etc., the BACKWARD SKIP button can be pressed only to return to the beginning of a track or the first programmed track.

■ BEGINNING AT A SPECIFIC TRACK IN THE STOP MODE

1. Repeatedly press the FORWARD or BACKWARD SKIP button (▶▶|/|◀◀) until the desired track number appears on the display.



2. Press the PLAY/PAUSE button.



■ SEARCHING A SPECIFIC PASSAGE IN THE PLAY MODE

- Press and hold down the FORWARD or BACKWARD SEARCH button (▶▶/◀◀).
  The sound level is decreased by 1/4 (12dB) compared with the normal level.
- Release the button when the desired point has been reached.
- If the unit reaches the end of a CD during forward search in normal or deleted play mode, etc., it starts play at the beginning of the next CD.
- If the unit reaches the end during forward search, it switches to the stop mode.
- If the unit reaches the beginning of a CD during backward search in normal or deleted play mode, etc., play restarts at this point.
- If the unit reaches the beginning of a track during backward search in random or programmed play mode, etc., play restarts at this point.

■ REPEAT PLAY

■ REPEAT 1 TRACK

- Before or during play, select the desired track with the FORWARD or BACKWARD SKIP button and press the REPEAT button. (And press the PLAY/PAUSE button when it is before play.)
- Then REPEAT 1 appears on the display and only the selected track is played repeatedly.
- During random or disc intro play, repeat 1 track play is not operative.

■ REPEAT 1 DISC

- Before or during play, select the desired CD with the DISC SELECTOR buttons and press the REPEAT button twice, then REPEAT 1 DISC appears on the display and only the selected CD is played repeatedly.
- During programmed play, repeat 1 disc play is not operative.

■ REPEAT ALL DISCS

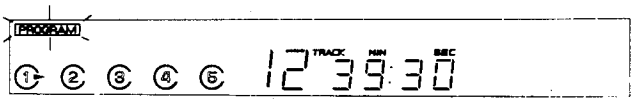
- Before or during play, press the REPEAT button three times. (And press the PLAY/PAUSE button when it is before play.)
  Then REPEAT ALL DISCS appears on the display and all discs are played repeatedly.
- If the REPEAT button is pressed once more in repeat all discs play mode, repeat play mode is canceled.

■ PROGRAMMED PLAY

You can program up to 32 selections to play in any sequence you choose.
If you exceed 32 selections, the "FULL" sign appears to remind you that the memory is full and cannot accept any more selections.

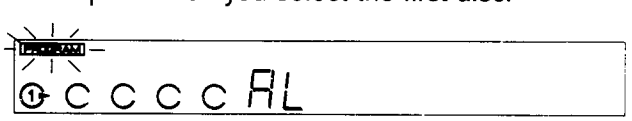
■ PROGRAMMING

1. In the stop mode, press the PROGRAM/REVIEW button.



2. Select the desired disc with the DISC SELECTOR or DISC SKIP button(s).

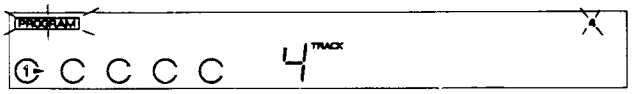
Example: When you select the first disc.



- If the PROGRAM/REVIEW button is pressed without selecting a track, the selected disc is programmed as one selection.

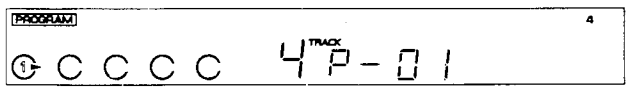
3. Select the track with the FORWARD or BACKWARD SKIP button.

Example: When you select the 4th track.

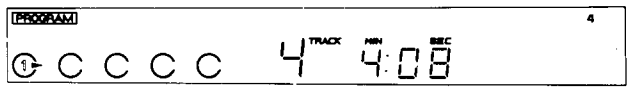


- When the track of the current disc is selected, the track can be selected directly without selecting the disc.

4. Press the PROGRAM/REVIEW button.

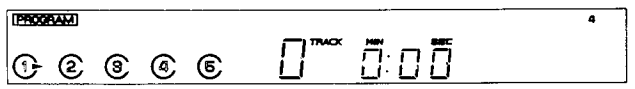


After about 1 second

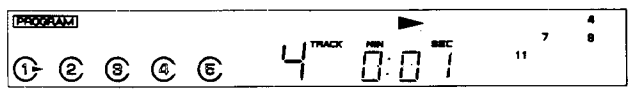


- Because it is impossible to know the playing time of each selection from five discs, --:-- can appear on the time display.

After a few seconds



5. Repeat the steps 2, 3 and 4 to complete programming.
6. Press the PLAY/PAUSE button.



- If you want continuous play without clearing your programmed selections during programmed play, select the desired disc with the DISC SELECTOR or DISC SKIP button(s) then continuous play starts from the first track of that disc.
- If you want programmed play again, press the PROGRAM/REVIEW button in the stop mode, then the unit switches to the program mode.

■ CHECKING THE PROGRAMMED SELECTIONS

You can check the programmed selections during programming or after completion of program.

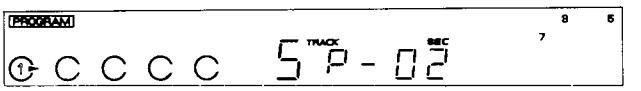
- Each time the PROGRAM/REVIEW button is pressed, the programmed selections will appear in the programmed sequence.

■ RECTIFYING ANY WRONG PROGRAMMED SELECTION

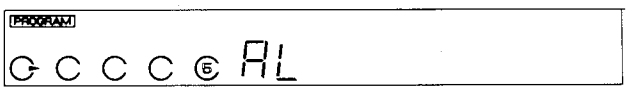
When you made a mistake and programmed any wrong selection, you can rectify as follows.

Example: When the tracks 3, 5 and 7 of the first disc are programmed, if you want to program the track 7 of the 5th disc instead of the track 5 of the first disc.

1. Find the track 5 of the first disc with the PROGRAM/REVIEW button.



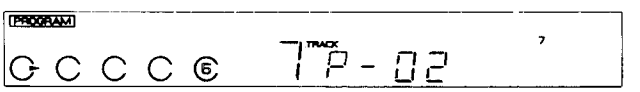
2. Select your desired disc with the DISC SELECTOR or DISC SKIP button(s).



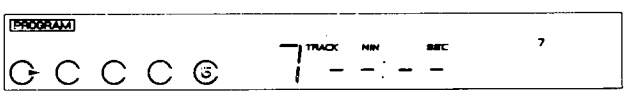
Only the number that corresponds to that disc appears.

3. Select your desired track with the FORWARD or BACKWARD SKIP button.

4. Press the PROGRAM/REVIEW button.



After about 1 second



After a few seconds

■ CLEARING THE PROGRAMMED SELECTIONS

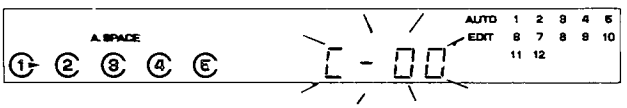
- Each time the STOP/CLEAR button is pressed during programming or after completion of programming, the programmed selections are cleared one by one in the opposite sequence.
- If you want to clear a specific selection, find that selection with the PROGRAM/REVIEW button and clear with the STOP/CLEAR button.
- By pressing the OPEN/CLOSE or STOP/CLEAR button over 4 seconds in the stop mode, all programmed selections will be cleared.

■ EDIT FOR RECORDING

You can edit up to 30 tracks for the auto edit or 32 tracks for the manual edit according to the tape length. It is possible only on the current disc.

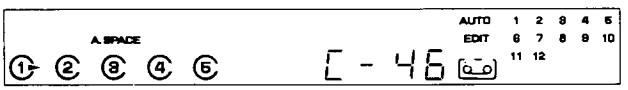
■ AUTO EDIT

1. In the stop mode, press the EDIT button.

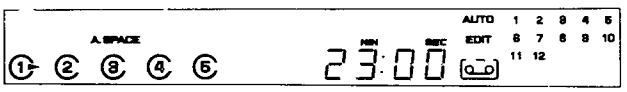


2. a. Select the desired tape length with the TAPE SIZE button.

Example: When the desired tape length is 46 minutes.



After about 2 seconds

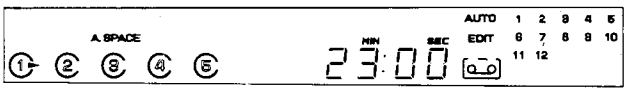


- Each time the TAPE SIZE button is pressed, the tape length display changes as follows.

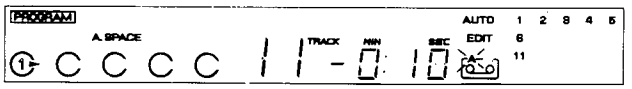
→ C-46 → C-54 → C-60 → C-74 → C-90 →

b. Select the desired tape length at your option with the NUMERIC buttons on the self remote control.

Example: When the desired tape length of each side is 23 minutes, press 2, 3, 0 and 0 to enter "23:00".

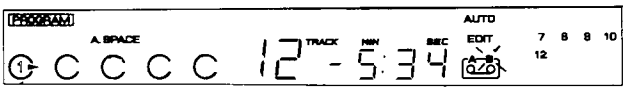


3. Press the EDIT button to automatically edit the tracks to be recorded.



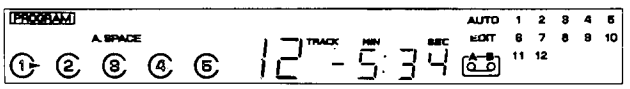
The tracks and remaining time of the side A appear.

After about 2 seconds



The tracks and remaining time of the side B appear.

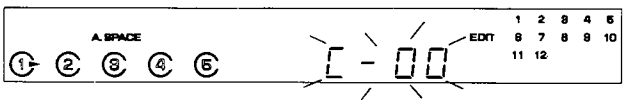
After about 2 seconds



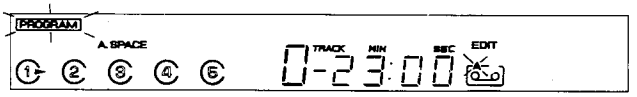
Auto edit is completed.

■ MANUAL EDIT

1. In the stop mode, press the EDIT button twice.

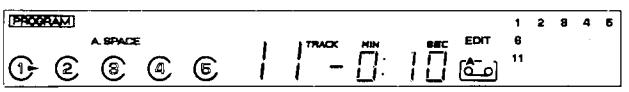


2. Select the desired tape length like the auto edit.
3. Press the PROGRAM/REVIEW button to manually edit the tracks to be recorded.

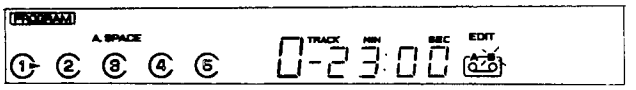


4. Select and program the tracks to be edited like programming for the side A.

Example: When the tracks 1, 2, 3, 4, 5, 6, and 11 are edited for the side A.

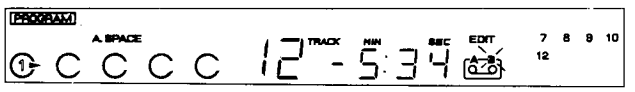


5. After editing the tracks of the side A, press the EDIT button.

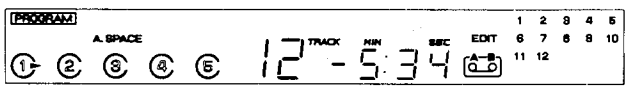


6. Select and program the tracks to be edited like programming for the side B.

Example: When the tracks 7, 8, 9, 10 and 12 are edited for the side B.



After a few seconds



- If the PLAY/PAUSE button is pressed after editing the tracks, play starts from the first track of the side A for edit recording.
- If all tracks of the side A have been played, the unit switches to the pause mode.
- If the PLAY/PAUSE button is pressed, play starts from the first track of the side B for edit recording.

NOTE:

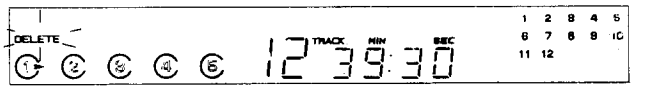
1. In the edit mode, the auto space function, leaving the spaces of 4 seconds between tracks, is automatically activated.
2. In the edit mode, repeat and random play, etc. are not operative.
3. When checking, clearing or rectifying the tracks, do like programming.
   But in the auto edit mode, only checking and clearing all edited tracks are possible.
4. During manual edit, if the "!" sign on the time display disappears, it means that the total time of the edited tracks is greater than the selected tape length.
   So edit the tracks again lest the total time of the edited tracks should exceed the tape length.
5. When a track of which number is greater than 30 is edited or deleted, the time display may show "--:--".

■ DELETED PLAY

When there are the undesired discs or tracks, you can delete up to 32 selections.

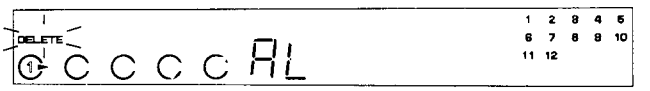
■ DELETING

1. In the stop mode, press the DELETE button.



2. Select the disc with the DISC SELECTOR or DISC SKIP button(s).

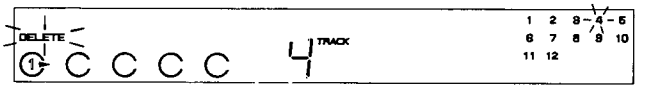
Example: When you select the first disc.



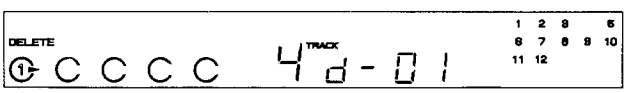
- If the DELETE button is pressed without selecting a track, the selected disc is deleted as one selection.

3. Select the track with the FORWARD or BACKWARD SKIP button.

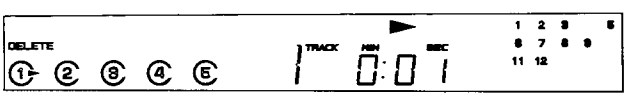
Example: When you select the 4th track.



4. Press the DELETE button.



5. Within 8 seconds after the step 4, if you select the undesired tracks on that disc, repeat the steps 3 and 4 and if not, repeat the steps 2, 3 and 4.
6. Press the PLAY/PAUSE button.



■ CHECKING THE DELETED SELECTIONS

You can check the deleted selections during deleting or after completion of deleting.

- Each time the DELETE button is pressed, the deleted selections will appear in the deleted sequence.

■ RECOVERING THE DELETED SELECTIONS

- Each time the STOP/CLEAR button is pressed during deleting, the deleted selections are recovered one by one in the opposite sequence.
- If you want to recover a specific selection, find it with the DELETE button and recover with the STOP/CLEAR button.
- By pressing the OPEN/CLOSE or STOP/CLEAR button over 4 seconds in the stop mode, all deleted selections will be recovered.

■ RANDOM PLAY

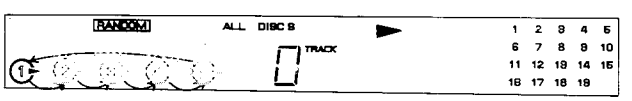
▪ RANDOM 1 DISC PLAY

- If the RANDOM PLAY button is pressed, RANDOM 1 DISC appears and the unit automatically select and play tracks on the current disc at random.
- After that disc has been played, all tracks of each disc are played at random from the next disc to the 5th disc.
- If the FORWARD SKIP button is pressed at the last track of a disc, random play will start on the next disc.

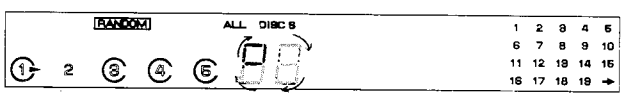
The square turns clockwise until a track on the current disc is selected.

■ RANDOM ALL DISCS PLAY

- If the RANDOM PLAY button is pressed once more, RANDOM ALL DISCS appears and the unit automatically selects a disc among five discs and a track of that disc at random and plays it.
- After that track has been played, the unit continues to select another disc and a track of that disc at random and play it.



After a disc is selected.



- If the RANDOM PLAY button is pressed once again during random all discs play, random play will be canceled and normal play will start from that track.
- If a disc is selected with the DISC SELECTOR or DISC SKIP button(s) during random or introscan all discs play, random or introscan play will be canceled and normal play will start from that disc.

■ INTROSCAN PLAY

▪ INTROSCAN 1 DISC PLAY

- If the DISC INTRO button is pressed, INTRO 1 DISC appears and the unit plays the first 10 seconds of each track from the current disc to the 5th disc.

■ INTROSCAN ALL DISCS PLAY

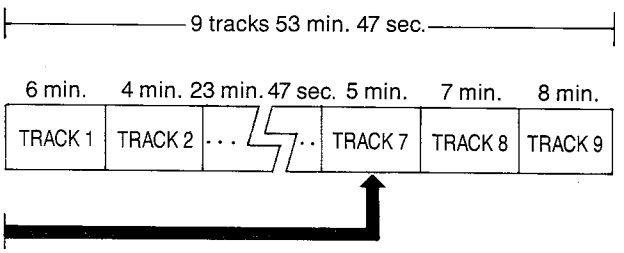
If the DISC INTRO button is pressed twice, INTRO ALL DISCS appears and the unit plays the first 10 seconds of each first track on the discs from the current disc.

- In this mode, if the DISC INTRO button is pressed once more, introscan play will be canceled and normal play will start from that track.
- During programmed play, if the RANDOM PLAY or DISC INTRO button is pressed, or INTRO will appears and random or introscan play on the programmed selections will start.
- During random, repeat or introscan all discs play, etc., if the OPEN/CLOSE button is pressed, each play will be canceled and normal play will start from that track.

■ TIME DISPLAY SELECTION

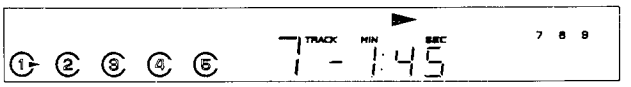
This unit has three different time display modes.

Example: When a disc of 53 min. 47 sec. is playing at the point of 3 min. 15 sec. after the beginning of track 7.



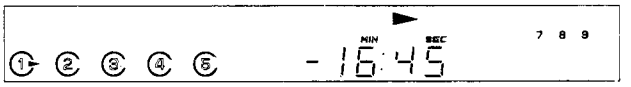
3 min. 15 sec. point of track 7.

Press



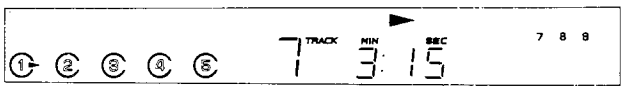
Remaining playing time of the current track

Press



Remaining playing time of the current disc.

Press



Elapsed playing time from the beginning of the current track.

NOTE:

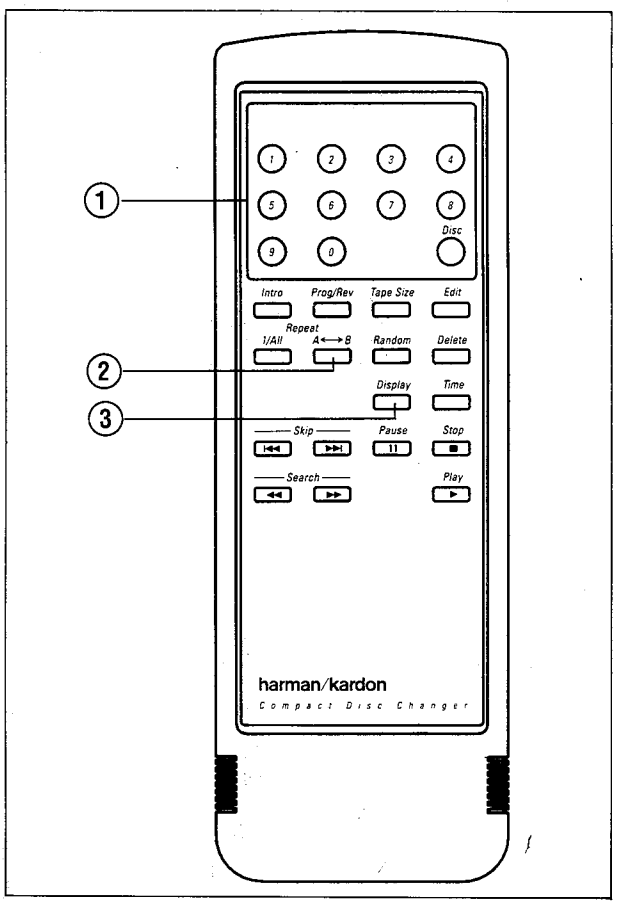
1. When a track of which number is greater than 30 is being played, the remaining playing time of the track shows "--:--".
2. During random or programmed play, etc., the remaining playing time of the disc shows "--:--".

Remote Controls

1. SYSTEM REMOTE CONTROL

This unit can be remotely controlled by Harman Kardon RECEIVERS.

- For available control functions, refer to the receiver's manual.
- To listen to the sound of CD by system remote control, make sure to connect a system remote control cord to the remote output HARMAN KARDON RECEIVER.



2. REMOTE CONTROL FOR THE FL8400

① NUMERIC (0~9) AND DISC BUTTONS

- If you press the number that corresponds to your desired track with the NUMERIC buttons, the unit plays that track immediately without the PLAY/PAUSE button.
- To select two digit track number, the second digit must be pressed within about 2 sec. after the first digit has been pressed.
- During programming or deleting, etc., if you select the desired or undesired track with the NUMERIC buttons, that track is programmed or deleted without the PROGRAM/REVIEW or DELETE buttons.
- If you want continuous play from the current disc without clearing your programmed selections during programmed play, select the desired track on that disc with the NUMERIC buttons, the continuous play start from that track.
- If you want programmed play again, press the PROGRAM/REVIEW button in the stop mode, then the unit switches to the program mode.
- When selecting a disc, press the DISC button and the desired disc number (1~5) in the NUMERIC buttons within 2 sec.

② REPEAT A ⟷ B BUTTON

- During play, press this button at the beginning of the passage you want, then REPEAT A⟷ appears on the display.
- Press this button at the end of the passage again, then REPEAT A⟷B appears on the display and the specific passage is being played repeatedly.
- If you want to cancel the repeat A ⟷ B play, press the REPEAT A ⟷ B or STOP/CLEAR button.
- During introscan play, repeat A ⟷ B play is not operative.

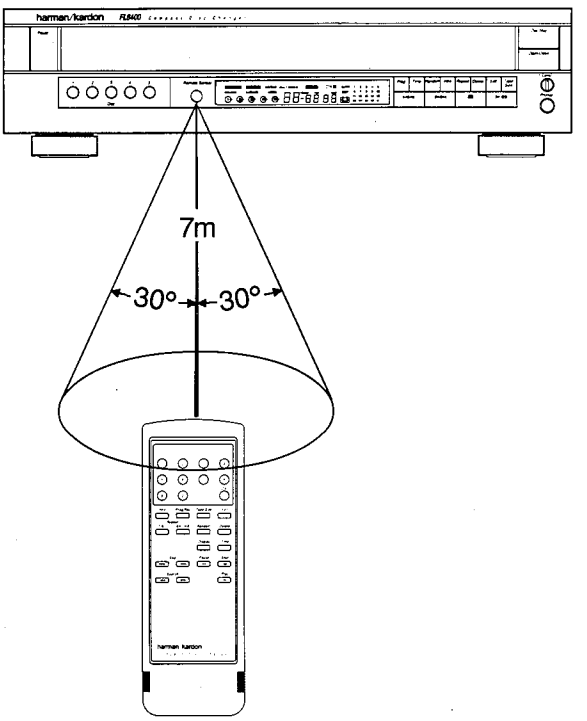
③ DISPLAY BUTTON

- Each time the DISPLAY button is pressed, the brightness of the display changes as follows:

→ ON → dim → OFF →

- In the display OFF mode, if any button is pressed, the unit switches to the display ON mode.

* DISC INTRO, PROGRAM/REVIEW, TAPE SIZE, EDIT, REPEAT (1/ALL), RANDOM PLAY, DELETE, TIME, BACKWARD SKIP (⏮), FORWARD SKIP (⏭), BACKWARD SEARCH (◀◀), FORWARD SEARCH (▶▶), PAUSE (⏸), STOP/CLEAR (■) and PLAY (◀) BUTTONS
  These buttons have the same functions as those on the unit.



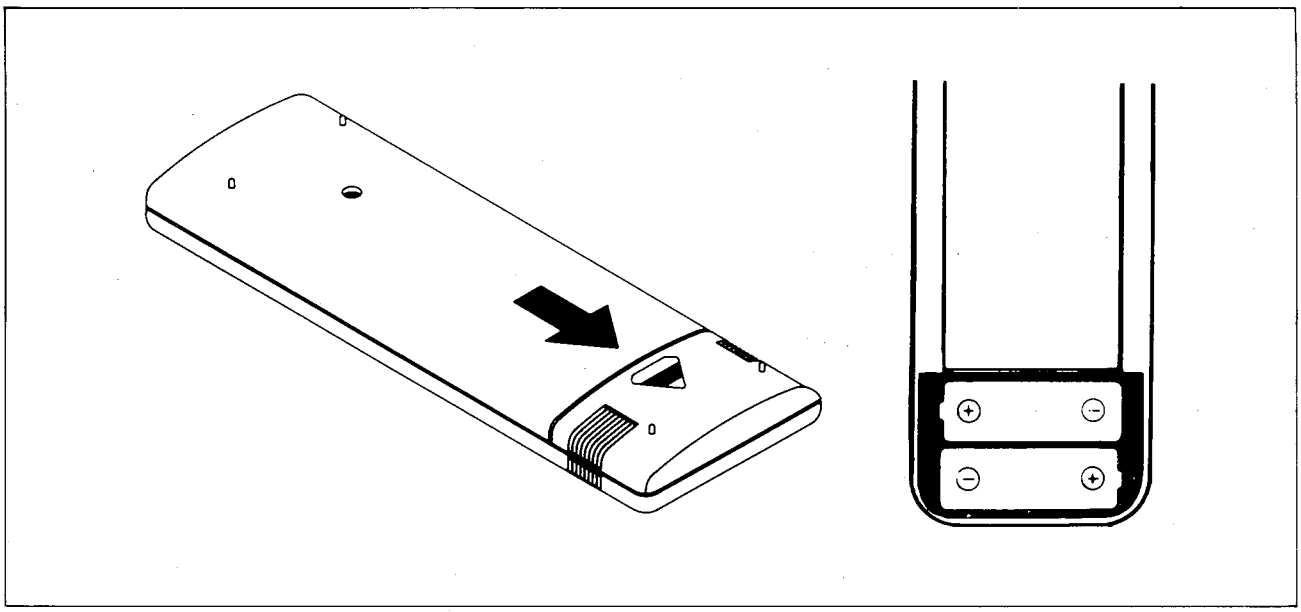
REMOTE CONTROL OPERATION RANGE

CONCERNING USE OF BATTERIES

- Open the cover by sliding it as shown.
- Insert two size "AA" (R6) batteries, matching the polarity and close it.

NOTE:

1. Replace them with two new batteries when the remote control does not operate the unit.
2. Remove the batteries if it is not to be used for an extended period of time.
3. Do not use rechargeable batteries (Ni-Cd type).



Troubleshooting Guide

Although the greatest care has been taken in the manufacture of this unit, the possibility remains that a fault could appear or that for some reasons the unit could fail to function to your complete satisfaction.
The cause, however, will not always be found in the unit itself. External factors, and the fact that it takes time to become accustomed to the whole concept of the new product and the new discs, can also play a role.
To save your unnecessary calls on your dealer or our Service Organization, we have compiled a list of possible faults and their causes. To even mention some of these causes, such as those to do with power connection, may perhaps seem excessive. Our experience shows, however, that they are easily overlooked as sources of troubles. If, by using this list, you do not succeed in solving the problem, stop your investigation. Disconnect the AC cord and contact your dealer.
Under no circumstances should you open up the unit. If you should, this will invalidate all your rights under the guarantee.

NOTE:
If the faults relating to the power or the connections arise when the unit is a part of a system, check your operating instructions for the amplifier of the system.

1. After pressing the POWER switch, the display is not on or the carousel does not rotate.

- The POWER switch is not pressed completely.
- One of the plugs of the AC input cord is not connected or is not making contact.
- There is no supply at the AC outlet. Plug in another electrical appliance and check if what works.

2. Disc is loaded but play does not start.

- The disc is not loaded with the labelled side up.
- The disc is dirty. See if cleaning the disc, or using another clean disc clears the fault.
- The disc is defective. Try another disc and see if that clears the fault.
- There is an unwanted object such as a piece of paper or a remnant of packaging in the tray.

3. The disc played and the track number and the elapsed time indicators function well, but there is no sound.

- The amplifier is not turned on.
- The position of the amplifier source selector does not correspond with the input to which the unit is connected.
- The amplifier or the speakers connected to it are not working. Check it with another sound source to see if this is the case.
- The microprocessor has not received the command correctly. Try to turn the unit off and on again, and then restarting clears the fault.
- The unit is not connected to amplifier correctly.
- The input to which the unit is connected is defective. Check it by connecting the unit to another input jack.

4. The sound is poor or distorted or you can hear only one channel.

- The unit is not connected to the CD or AUX input of the amplifier but to the PHONO input.
- One of the plugs of the connection cords is either not connected or not properly connected.
- The amplifier or the speakers connected to it are not working properly. Check it with another sound source to see if this is the case.

5. Programming is not working.

- The microprocessor has not processed the commands properly. Clear the program by pressing the OPEN/CLOSE button or the STOP/CLEAR button over 4 seconds and try to program again and restart play and check if the fault is cleared.
- The memory was already full of 32 selections and you missed the "FULL" sign that indicated it. Check it with the PROGRAM/REVIEW button.

Specifications

☐ TYPICAL AUDIO PERFORMANCES

Number of Channels	2
Frequency Range	20-20,000 Hz ± 0.5 dB
Signal To Noise Ratio	More than 100 dB
Dynamic Range	More than 92 dB
Total Harmonic Distortion	Less than 0.007% at 1 KHz
Wow and Flutter	Quartz crystal precision
Audio Output Level	2 Volts RMS

☐ OPTICAL READOUT SYSTEM

LASER	Semiconductor AlGaAs
Wave Length	760 — 800 nm
Numerical Aperture	0.45

☐ SIGNAL FORMAT

Sampling Frequency	44.1 KHz
D/A Conversion	Dual 1 Bit
Oversampling	8 times

☐ GENERAL

Power Supply Voltage	See type plate at the rear of the unit
Power Consumption	MAX. 12 Watts
Dimension (W×H×D)	440×95×380 mm
Weight	6.5 Kg

☐ DISC

Diameter	120 mm/80 mm
Thickness	1.2 mm
Rotation Speed	500 — 200 rpm
Playing Time (Theoretical)	74 min. (stereo)
Track Pitch	1.6 μm
Material	Plastic

Note: Specifications and design subject to change without notice for improvements.