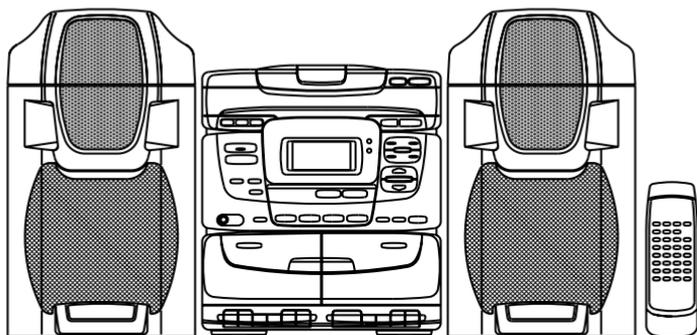


COBY®

CXCD470

MINI SYSTEM WITH 3-CD CHANGERS AND DOUBLE CASSETTE RECORDER



INSTRUCTION MANUAL

COMPACT
disc
DIGITAL AUDIO

WARNING

To prevent fire or shock hazard, do not expose this appliance to rain or moisture.

IMPORTANT

Since the CD circuitry may cause interference to other radio tuners nearby, switch this unit off when not in use or move it away from the affected radio tuner.



The lightning flash with arrow-head symbol, within an equilateral triangle, 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.

CAUTION

**RISK OF ELECTRIC SHOCK
DO NOT OPEN**



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

The exclamation point within an equilateral triangle is intended to alert the user to presence of important operating and maintenance (servicing) instructions in the literature accompanying the appliance.

DANGER



INVISIBLE LASER RADIATION WHEN OPEN AND INTER-LOCK FAILED OR DEFEATED. AVOID DIRECT EXPOSURE TO LASER BEAM.

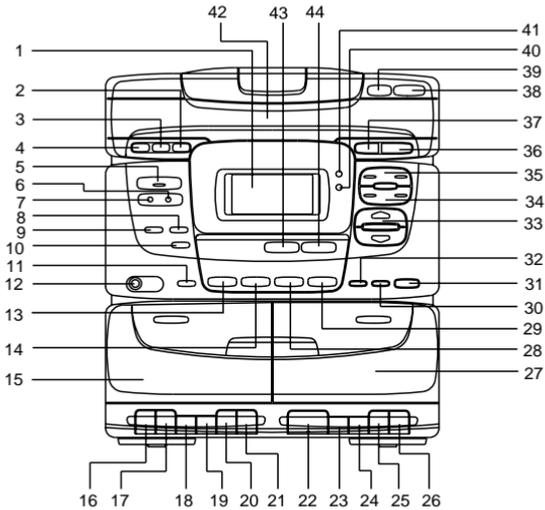
LASER SAFETY

This unit employs an optical laser beam system in the CD mechanism, designed with built-in safeguards. Do not attempt to disassemble, refer to qualified service personnel.

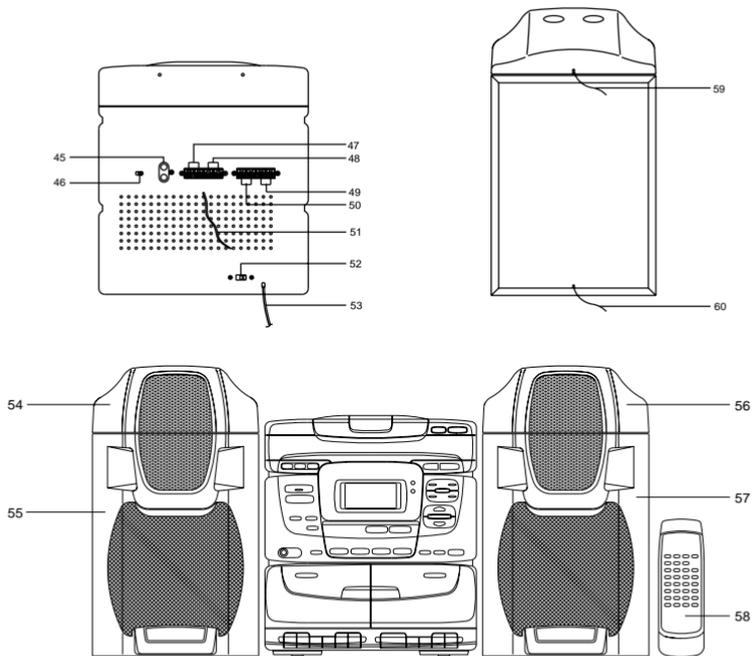
Exposure to this invisible laser light beam may be harmful to the human eye.

THIS IS A CLASS-1 LASER PRODUCT. USE OF CONTROLS, OR ADJUSTMENTS OR PROCEDURES OTHER THAN THOSE SPECIFIED HEREIN, MAY RESULT IN HAZARDOUS LASER LIGHT BEAM EXPOSURE.

LOCATION OF CONTROLS



- | | |
|----------------------------------|---------------------------------------|
| 1. LCD Display | 23. Fast Rewind |
| 2. Selector Disc (Disc 3) Button | 24. Fast Forward |
| 3. Selector Disc (Disc 2) Button | 25. Stop/Eject |
| 4. Selector Disc (Disc 1) Button | 26. Pause |
| 5. Power ON/OFF Button | 27. Tape B |
| 6. Stand By Indicator | 28. Function Indicator (AUX) |
| 7. Remote Sensor | 29. Function Indicator (Tuner/Band) |
| 8. Timer Knob | 30. Surround On/Off Knob |
| 9. Mute Knob | 31. Memory/C-Adj. Knob |
| 10. Mode/Remain Knob | 32. Bass Boost On/Off Knob |
| 11. Hi-Speed Dubbing On/Off | 33. Volume Knob |
| 12. Phone Jack | 34. Preset Repeat/Random |
| 13. Function Indicator (Tape) | 35. Tuning Knob |
| 14. Function Indicator (CD) | 36. CD Play/Pause Knob |
| 15. Tape A | 37. CD Stop Knob |
| 16. Record | 38. Disc Tray Open/Close Knob |
| 17. Play | 39. Disc Selector |
| 18. Fast Rewind | 40. Indicator BBS (Bass Boost System) |
| 19. Fast Forward | 41. Indicator Surround Sound |
| 20. Stop/Eject | 42. Disc Tray |
| 21. Pause | 43. Preset Equalizer Knob |
| 22. Play | 44. FM Mode Stereo/Mono Knob |



- 45. AUX In
- 46. Beat Cut Switch
- 47. Right Speaker Out Let
- 48. Left Speaker Out Let
- 49. Left Surround Speaker Out Let
- 50. Right Surround Speaker Out Let
- 51. FM Antenna
- 52. AC Voltage Selector
(for dual voltage version only.)

- 53. AC Main Out Let
- 54. Left Surround Speaker Box
- 55. Left Speaker Box
- 56. Right Surround Speaker Box
- 57. Right Speaker Box
- 58. Remote Handset
- 59. Surround Speaker Wires
- 60. Speaker Wires

OPERATIONS

1. Carefully unpack the unit and speakers. Remove all packing material from around the unit.
2. Locate the unit horizontally on a heavy duty stand or firm level surface and away from the speaker system to avoid acoustic feedback.

CONNECTIONS

1. Connect the Speaker Box speaker wire to the speaker out let on the rear of the main unit.
2. Connect the AC power cord to the AC outlet.
3. Press the POWER Button [5] to turn on the unit.

NOTE: - Before operating the unit in a new area for the first time, it is absolutely necessary to check the operating voltage of your unit is identical with the voltage of your local power supply.

- This unit is to be operated only at the printed power source voltage on the back panel.
- Disconnect from the wall outlet when it is not be used for an extended period of time.

SOUND CONTROL

VOLUME

Press the VOLUME ▲ Button [33] to increase the volume, and the VOLUME ▼ Button [33] to decrease the volume.

PRESET EQUALIZER

The PRESET EQUALIZER SELECTOR [43] provides 4 different ranges of control (FLAT, CLASSIC, ROCK AND POP) for the audio frequency spectrum in narrow and distinct sections. Use the selector to select the best response that suits the type of music and individual taste.

* FLAT no indicator

BASS BOOST

Press BASS BOOST Button [32] to enhance the bass response:

⬇ - Bass Boost OFF

⬆ - Bass Boost ON (Indicator BBS)

SURROUND SOUND

This feature creates an additional 3-D effect from stereo sound which is relayed by the speakers. Press Surround Sound to switch this effect on and off.

⬇ - Surround Sound OFF

⬆ - Surround Sound ON (Indicator Surround Sound turn on)

* If you want to enjoy the surround sound 3-D effect, you must connect two speaker (impedance of 4 ohm/12.5W - 32 ohm/6.0W) boxes to the Left Surround Sound Speaker Outlet [49] and Right Surround Sound Speaker Outlet [50].

CLOCK ADJUSTMENT

1. Set to "TAPE" [13] or "AUX" [28] mode. The clock will appear on the LCD display
2. Press the MEMORY/C-ADJ. Button [31] once to adjust the hour. Press the button once more to adjust the minute.
3. Press the ►►/TUNING ▲ Button [35] and ◀◀/TUNING ▼ Button [35] to set the time.
 - Press the ►►/TUNING ▲ Button once to add one hour or one minute to the time setting. When keep pressing the button, the "hour" or "minutes" setting is increased continuously until the button is released.
 - Press the ◀◀/TUNING ▼ Button once to reduce one hour or one minute to the time setting. When keep pressing the button, the "hour" or "minutes" setting is decreased continuously until the button is released.
4. Press the MEMORY/C-ADJ. Button again to confirm the time setting.
5. If the unit is in the "RADIO" or "CD" mode, press the MODE/REMAIN Button [10] and repeat step 2-4.

SETTING THE TIMER

You can set the automatic switch-on and switch-off time using the timer function. For this purpose, set the correct time first.

1. The "MODE/REMAIN" Button [10] should be press twice. TIMER ON appears on the display unit to set the switch-on time.
 2. After pressing the "MEMORY/C-ADJ." Button [31], the hours can be set using the ►► / TUNING ▲ Button [35] and ◀◀/TUNING ▼ Button [35].
 3. To set the minutes, press the "MEMORY/C-ADJ." Button [31], use the ►► / TUNING ▲ Button [35] and ◀◀/TUNING ▼ Button [35].
 4. When the "MODE/REMAIN" Button [10] is pressed again, TIMER OFF appears on the display unit to set the switch-off time.
 5. As described above, set the switch-off time.
 6. Press the "TIMER" Button [8] to switch on the timer.
 7. Press the "TIMER" Button [8] again, until the message TIMER disappears from the display unit to switch off the timer.
- * TIMER OFF can only be function when the unit is switch on by TIMER ON function.

RADIO OPERATION

1. Press the POWER Button [5] once to turn the unit on. The STAND-BY indicator [6] will turn on.
2. Press the TUNER/BAND Button [29] to "RADIO" mode.
3. Press the TUNER/BAND Button [29] to the desired band.
4. Press the ►►/TUNING ▲ Button or ◀◀/TUNING ▼ Button [35]; momentarily (less than 0.5 sec.) to step up or down the receiving frequency in order to select the desired station.
5. For auto tuning, keep pressing the ►►/TUNING ▲ Button or ◀◀/TUNING ▼ Button (more than 0.5 sec.) until the displayed frequency starts to change, then release the button. Tuning will stop automatically when a station is received.
6. To turn the unit off after use, simply press the POWER Button once again and the STAND-BY indicator will light off.

FM RECEPTION

Raise and extend the FM antenna wire [51] then adjust the position for the best reception. ST indicator will appear on the display only if an actual stereo broadcast station is being received.

AM RECEPTION

Rotate horizontally or relocated the unit for best reception as the built-in ferrite bar antenna is directional.

PRESET STATIONS

1. Press the TUNER/BAND Button [29] to "RADIO" mode.
2. Press the TUNER/BAND Button [29] to the desired band.
3. When a desired station is tuned, press the MEMORY/C-ADJ. Button [31] and then select the desired station you want to store by pressing the REPEAT/PRESET Button [34] or RANDOM/PRESET Button [34].
4. Press the MEMORY/C-ADJ. Button again to confirm the preset station.
5. Repeat step 3 and 4 to enter remaining preset stations.

NOTE: The preset memory operating can be repeated to store a maximum of 20 FM station and 20 AM station.

RECEIVING A PRESET STATION

To recall any preset station within the selected band, simply press REPEAT/PRESET ▲ Button [34] or press RANDOM/PRESET ▼ Button [34] until preset number selection appears on the display.

AUX IN

The cinch sockets [45] at the rear of the unit can be used for connecting external playback machines. Check the polarity of the right and left channel is correct.

COMPACT DISC OPERATION

CONCERNING COMPACT DISC

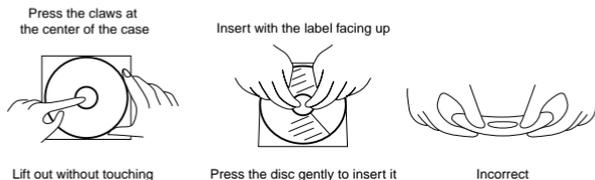
1. USABLE COMPACT DISCS

Use a compact disc bearing the mark as shown.



2. Notes on handling discs

Removing the disc from its storage case and loading it.



- Do not touch the rainbow color reflecting recorded surface.
- Do not stick paper or write anything on the label surface.
- Do not bend the disc.

3. Storage

- For storage, be sure to return a disc to its case.
- Do not expose discs to direct sunlight nor high temperature such as from a heater, high humidity and dusty places.

4. Cleaning a disc

Before operation, wipe off dust, dirt and fingerprints on the surface with a soft cloth. The disc should be cleaned from inward to outward.



- Never use thinner, nezone, analog record cleaner or anustatic spray.

8-cm (3-3/16") 'CD singles'

#8-cm (3-3/16") compact disc can be used (without using AC adaptor) in this unit.

PLAYING CD

1. Push the POWER Button [5] to turn the unit on. The STANDBY INDICATOR [6] will light up.
2. Press the CD Button [14] to "CD" mode.
3. Press the OPEN/CLOSE Button [38] once to open the disc tray [42] and place CDs (label side facing up) on the disc tray, press DISC SKIP Button [39], the carousel rotates, so you can insert another CD. Then, press the OPEN/CLOSE Button [14] again, the CD disc tray [42] will be closed. If no disc was loaded on the selected carousel, "no disc" will appear on the display.

PLAY FUNCTION

Press PLAY/PAUSE Button [36] to start playing the disc from track number 1.

PAUSE FUNCTION

Press PLAY/PAUSE Button [36] when during play, pause the disc and mute the music from play mode. To clear PAUSE mode, press the PLAY/PAUSE Button [36]. The system will resume playing from the time of the disc was paused.

STOP FUNCTION

Press STOP Button [37] to stop playing or cleared of tracks stored.

REPEAT FUNCTION

REPEAT is a toggle command: No repeat → Repeat one track → Repeat all → No repeat
Press the REPEAT Button once: Repeat one track; twice: Repeat all tracks; Three times: Normal

SKIP FUNCTION

Press FORWARD SKIP ►► Button [35] to select the next track in the sequence. Press BACKWARD SKIP ◀◀ Button [35] to select the previous track in the sequence.

SEARCH FUNCTION

Press and hold the FORWARD SKIP ►► [35] or BACKWARD SKIP ◀◀ Button [35] to locate a particular point in a track during playing by monitoring the high-speed cueing sound.

Press FORWARD SKIP ►► Button [35] to go ahead.

Press BACKWARD SKIP ◀◀ Button [35] to go back.

NOTE: Release the button when you reach the point in the selection that you want.

INTRO CHECK FUNCTION

Press INTRO CHECK Button, the first 10 seconds of all (programmed) tracks are played in turn. When the end of a disc's playlist is reached, the system will attempt to scan tracks on the next disc in the carousel. The system will scan disc one. When all discs have been scanned the system will enter STOP mode automatically.

PROGRAM FUNCTION

This function allows you to play the track (up to 20 tracks) of all disc in any carousel. Enter the program procedure as below:

1. Press the MEMORY/C-ADJ. Button [31] when the disc is not turning in stop mode, the MEMORY icon flashes on the display.
2. Press Disc SELECTOR Button [34] or DISC 1, 2, 3 to selected disc which disc you want.

3. Press the FORWARD SKIP or BACKWARD SKIP Button [35] to select the desired track.
4. Press the MEMORY/C-ADJ. Button [31] again to ENTER the selection into the program memory.
5. Repeat steps 2, 3 and 4 to enter desired tracks up to maximum of 20 selections.
6. To clear the program memory, press the STOP Button [37] while the system is in stop mode.

DISC SELECTOR FUNCTION

Press DISC SELECTOR Button [39], the carousel will rotate to the Forward location.

OPEN/CLOSE FUNCTION

Press the OPEN/CLOSE Button [38] to drive the disc tray [42] inwards or outwards. If the disc tray [42] is closed or closing then the current system mode. If the disc tray [42] is open or opening the disc tray is driven inwards. The system will remain in it's current mode, if in stop mode. The system will search through each location to find a disc, when a disc is found, the system will go straight into STOP mode. The total track numbers and total playing time will show on display for that disc.

MAINTENANCE

POWER SWITCH

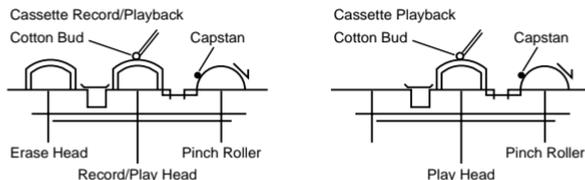
After using the unit, turn off the power by pressing the power switch.

CLEAN THE HEADS

To ensure the continued high performance of your unit, periodically clean the heads and pinch rollers to prevent accumulation of dust or tape oxide deposits. Failure to clean these parts may result in distortion of record sound, deterioration of reproduction or high frequencies, and inconsistent tape speed.

To clean heads:

1. Open the cassette compartment.
2. Moisten a cotton bud with heads cleaner or methylated spirit and apply to the faces of heads, rubbing gently until all traces of dirt or oxide are removed. Also, clean the surfaces of the pinch of rollers and the capstans.
3. Dry, clean and polish the face of the heads with piece of soft, lint-free cloth.



CLEAN THE UNIT

To retain the beauty of the unit, simply wipe with a soft clean cloth moistened with plain luke-warm water.

TAPE OPERATION

GENERAL INFORMATION ON CASSETTE TAPES

- For playback, use normal (low-noise) tape for best sound. (Metal or chrome tape is not recommended)
- For recording, use normal tape only.
- Do not use C-120 tapes, tapes with internal reels or poor-quality tapes because they can cause malfunctions.
- Before loading a tape into the cassette compartment, tighten the slack tape with a pen or pencil.
- Cassettes have removable tabs which prevent accidental recording from taking place. Removing the tab on the top left side protects you from erasure. Cover the tab holes with adhesive tape to erase or record again.

CASSETTE PLAYBACK

1. Press the TAPE Button [13] to "TAPE" mode.
2. Press the STOP/EJECT Button [20]/[25] and insert a prerecorded cassette tape into the cassette compartment.
3. Close the cassette door [15]/[27].
4. Press the PLAY ► Button to start playback. Also, playback will stop automatically when the end of the tape has been reached.

FAST FORWARD REWIND

1. Press the FAST FORWARD ►► Button [19]/[24] to advance the tape or press the REW ◀◀ Button [18]/[23] to rewind.
2. Press the STOP/EJECT Button [20]/[25] when the desired location has been reached.
NOTE: In FAST FORWARD ►► and FAST REWIND ◀◀ mode, the tape will not automatically stop when it reaches the end.

INTERRUPT PLAYBACK

Press the PAUSE Button [21]/[26] during playback and press it again to resume playback.

RECORDING

- When recording important selections, be sure to make a preliminary test to ensure that the desired material is being properly recorded.
- Metal and chrome tapes cannot be used for recording.

RECORDING FROM RADIO (TUNER)

1. Press the TUNER/BAND Button [29] to "TUNER" mode.
2. Press the TUNER/BAND Button [29] to the desired band.
3. Tune a desired station.
4. Insert a cassette tape into the cassette compartment.
5. Press RECORD Button [16] which also engages the PLAY ► Button, to begin recording.
6. Press the PAUSE Button [21] to suspend recording without deactivating the record mode. Press again to resume recording.

BEAT CUT SWITCH

If feedback (whistling noise) occurs when recording from AM broadcasts, set the BEAT CUT selector [46] to I or II whichever gives the best reception.

RECORDING FROM CD

1. Press the CD Button [14] to "CD" mode.
2. Place a compact disc in the CD compartment.
3. Insert a cassette tape into the cassette compartment.
4. Press the RECORD Button [16], the CD player will begin recording from first track or the first of the programmed track automatically. Otherwise, you can select a desired track by press FORWARD SKIP ►► or BACKWARD SKIP ◄◄ [35].

ERASING RECORDED TAPES

1. Insert the tape to be erased into cassette compartment.
2. Press the TAPE Button [13] to "TAPE" mode.
3. Press the RECORD Button [16] to begin erasing.

DUBBING TAPE B: > TO TAPE A:

This unit enables you to duplicate a prerecorded tape to another tape by using the built-in double deck mechanisms. It is performed only one way, from the TAPE:B (playback) to TAPE:A (recording).

DUBBING AT NORMAL SPEED

1. Press the TAPE Button [13] to "TAPE" mode.
2. Insert a prerecorded cassette into TAPE B [15] and insert blank cassette into TAPE A [27].
3. Press the TAPE A PAUSE Button [26] and then press the RECORD Button [16].
4. Press the TAPE B PLAY Button [22] to start dubbing.
5. To stop the dubbing operation, press both STOP/EJECT Button [20]/[25] simultaneously.

DUBBING AT HIGH SPEED

This unit is equipped with a HIGH SPEED DUBBING system which allows duplication a prerecorded tape at approximately two-thirds the time of the duration at normal speed.

Press the HIGH SPEED DUBBING Switch [11] and follow the same procedure as instructed in "DUBBING AT NORMAL SPEED".

When dubbing a prerecorded cassette tape at HIGH SPEED in TAPE function, a chattering sound is heard.

OPERATION OF REMOTE CONTROL UNIT

LOADING BATTERIES

1. Remove the battery compartment cover.
2. Insert 2 "AAA" size (not included) batteries as indicated by the polarity marking. (Placing the batteries in the wrong way around cause malfunction.)
3. Close the battery compartment cover.

OPERATION PROCEDURE

Plug the power cord of the system into an AC wall outlet, and press the POWER ON/STAND BY button on the remote control unit to turn the power on. When the power is turned on, press the key of the source component to be operated.

NOTE:- When the remote-controllable distance gets shorter than before, replace both batteries with new ones.

- Malfunction may occur if direct sunlight or the light of a high-frequency lightning fluorescent lamp enters the remote control light sensor. In such a case, change the system installation position prevent the malfunction.

FUNCTION OF THE REMOTE CONTROL UNIT

1. POWER ON/OFF BUTTON

Press once to turn on the main unit and press again to return to the "STAND BY" mode.

2. VOLUME CONTROL BUTTONS

Mute Button : Press to mute the sound and press again to restore the sound.

Volume Up Button : Press to increase the sound level.

Volume Down Button : Press to decrease the sound level.

3. CD/RADIO/CLOCK ADJUSTMENT OPERATION BUTTONS

- UP and DOWN Buttons : (TUNING/CLOCK/CD SEARCH)

They have the same functions as the F.SKIP/TUNING UP/C-ADJ. and B.SKIP/TUNING DOWN/C-ADJ. Button [35] on the main unit.

- For clock setting, see item 3 of "CLOCK ADJUSTMENT".

- For radio operation, see item 4 and 5 of "RADIO OPERATION".

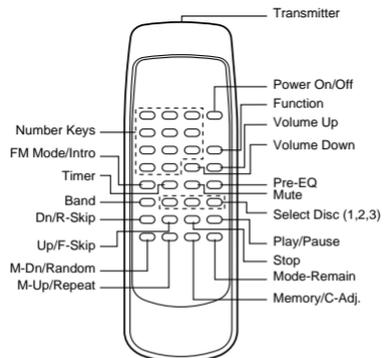
- For CD operation, see "SKIP FUNCTION", "SEARCH FUNCTION" and "PROGRAM FUNCTION".

- STOP Button

It has the same function as the STOP Button [37] on the main unit. See "COMPACT DISC OPERATION".

- RANDOM/M-DN Button

Press to play the tracks in random order.
Press again to cancel the selection.



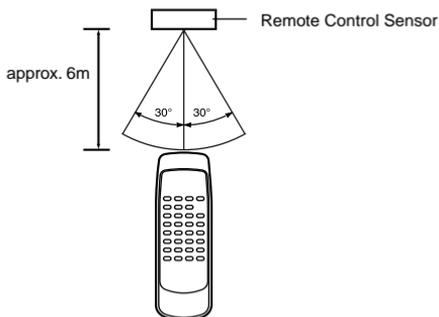
- MODE/REMAIN Button
 - In radio operation
Press the button to change from frequency display to clock display and press again to return.
 - In CD operation
Press the button to change the display from playing time to remaining time, and then to clock display. Press again to return.
- PLAY/PAUSE Button
It has the same function as the PLAY/PAUSE Button [36] on the main unit. See "COMPACT DISC OPERATION".
- MEMORY/C-ADJ. Button
It has the same functions as the MEMORY/C-ADJ. Button [31] on the main unit.
 - For clock setting, see item 2 and 4 of "CLOCK ADJUSTMENT".
 - For radio operation, see "PRESET STATION".
 - For CD operation, see "MEMORY PLAY".
- REPEAT/M-UP. Button
It has the same functions as the REPEAT/M-UP Button [34] on the main unit.
 - For radio operation, see "PRESET STATION".
 - For CD operation, see "PRESET PLAY".

4. RADIO/CD NUMERIC BUTTONS

- In order operation, the numeric buttons can be used to enter the desired station directly.
- In CD operation, the numeric buttons can be used to enter the desired track directly. If the track number or the number of selection is more than 19, follow the following examples.
 - To enter 20 — +10 +10 0
 - To enter 25 — +10 +10 5

5. INFRARED LIGHT-EMITTING DIODE

Operating range:



SPECIFICATION

RADIO SECTION

Frequency FM: 87.5 — 108 MHz
AM: 522 — 1620 kHz

CASSETTE SECTION

Track System Compact Cassette Stereo
Recording System AC Bias
Tape Normal
Frequency Response 100 — 8000 Hz

CD SECTION

Sampling Frequency 44.1 Hz
Frequency Response 20 Hz — 20 KHz

GENERAL

Output terminal Terminal Speaker Sockets
Output Power 5W + 5W (At 10% THD)
Weight 11.8 Kg

POWER SOURCES

Mains Operation AC110V / 220V, 60Hz / 50Hz
Power Consumption 25 W

Dimension

Main Unit 280mm (W) x 325mm (H) x 350mm (D)
Speaker 220mm (W) x 300mm (H) x 220mm (D) x 2
Surround Sound Speaker 220mm (W) x 90mm (H) x 206mm (D) x 2



90 DAY LIMITED WARRANTY

COBY ELECTRONICS CORP. ("COBY") warrants this product to the original purchaser to be free from defects in material or workmanship under normal use of 90 DAYS from the date of original purchase. COBY agrees under this warranty, to repair or replace it with a new or reconditioned product at no additional charge. Our warranty does not cover any product which has been subject to neglect, unreasonable use, accident, violation of operating instructions, or any product that has been repaired or modified by an unauthorized service agent.

To obtain factory service, return this unit freight-prepaid to the address shown below within the duration of this warranty. Enclose \$6.00 for each item in the form of money order made payable to COBY ELECTRONICS CORP. to cover the cost of shipping and handling. Also, include a copy of the sales receipt to show proof of purchase and a detailed description of the problem. The unit(s) must be packaged in such a way as to reasonably protect it from possible shipping damage. For further information write to :

COBY ELECTRONICS CORP.
Customer Service Dept.
56 - 65 Rust Street
Maspeth, N.Y. 11378

COBY's liability under any legal theory for any loss or damage in any way related to this product shall not exceed the sales price of this product. In no event shall COBY be liable for any incidental or consequential damages resulting from the use of this product, or inability to use this product. Repair or replacement as provided under this warranty is the exclusive right of the customer.

Except to the extent prohibited by law, no express or implied warranty of merchantability of fitness for a particular purpose on this product shall be extended beyond the period of this warranty. Some states prohibit the exclusion or limitation or incidental or consequential damages, so that the above limitations or exclusion may not apply to you. This warranty gives you specific rights, and you may also have other rights that may vary from State to State.