

User's Guide and Warranty
Information

bel canto

CD-1

COMPACT DISC PLAYER

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CONGRATULATIONS

You have just acquired the finest player available for the playback of compact discs.

IMPORTANT

Save all packaging in a dry place away from fire hazards. Your Bel Canto player is a precision electronic instrument and should be properly packaged any time shipment is made. In the unlikely event that you have to return your unit to the factory for service, or if you send it to us for updating, the original packaging will best protect the unit from shipping damage or delay.

In order to achieve the fullest flexibility and enjoyment from your player, we at Bel Canto recommend that you read this manual in full before connecting the unit to your audio/video system.

NOTE:

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC rules and CE requirements. 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 instructions, 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 and 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 equipment and receiver.

Connect the receiver into an outlet on a circuit different from that which the player.

Warranty Registration

Complete and return by fax or mail your warranty document enclosed in product box for extended warranty coverage. Please return this document to Bel Canto within 30 days of original purchase. Bel Canto Design offers a 90-day factory warranty from the date of purchase that can be extended to 1 year / 2 year LIMITED WARRANTY. The original owner can obtain the LIMITED WARRANTY, by returning a completed warranty form along with a copy of the original sales receipt from your authorized Bel Canto Dealer. The extended LIMITED WARRANTY coverage extends the warranty to a period of 1 year on the Laser and Loader (mechanical portion of the unit and 2 years on the electronics, from the date of purchase by the original owner and includes all parts and workmanship. The warranty automatically commences on the date of purchase or 1 year from the date of shipment to an authorized Bel Canto dealer, whichever ever comes first, and terminates 3 years from date of shipment to an authorized Bel Canto dealer. Units purchased from a source other than an authorized dealer are not covered by this warranty. Warranty is void if damage is due to abuse, neglect or unauthorized modification. Cost associated with the return of this product is the sole responsibility of the owner. All repair work must be done by an authorized Bel Canto repair center. Work done by unauthorized persons will void all warranty coverage. Bel Canto Design products are uniquely identified with a serial number on the back panel of each unit. This number is required to validate your warranty. Please reference your serial number if service is required. If you have any questions, comments or if we can be of service, please contact us Monday through Friday 9:00a.m. - 5:00p.m., Central Time in the United States.

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SAFETY PRECAUTIONS

Please carefully read each item of the operating instructions and safety precautions before using this product. Use extra care to follow the warnings written on the product itself and/or in the operating instructions. Keep the operating instructions and safety precautions for future reference.

Caution: to reduce the risk of electrical shock, do not remove any of the cover panels.

No user-serviceable parts inside. Refer all servicing to qualified service personnel only.

To prevent fire or shock hazard, do not allow liquids to spill or objects to fall into any openings of the product.

This unit is supplied with a 3 pin grounded ac plug. Always insert the ac plug into a grounded outlet. Do not remove the ground pin or disable the ground for any purpose.

Before making any connections to the unit, first turn off the power and then disconnect the ac power cord.

When installing the unit in your system, make certain to allow a minimum of 1½ inches of ventilation on each side of the unit. Also allow at least 2½ inches of ventilation space above the unit. Improper ventilation of the unit may cause overheating, which may damage the unit and it to fail. Place the unit on a solid surface only. i.e. not on carpet, etc.

Do not place the unit near heat sources such as direct sunlight, stoves, heat registers, radiators or other heat producing equipment.

To prevent damage to the digital or analog output circuitry, be certain not to short the output signal pin(s) to ground. Ensure that your output cables do not have any internal shorts before connecting them.

IMPORTANT NOTICE

Due to the computer-based circuitry used in this product, it is imperative that the player be connected to a ground via its three-wire AC power cord. It is important that the AC power outlet, which the unit is plugged into, is actually grounded. Failure to do so will severely compromise the performance, reliability and safety of use of the unit.

It is also important to prevent contact with static electricity when connecting other components and cables to the unit. When connecting cables, simply place one hand on top of the player and then grasp the metal “barrel” of the cable with the other hand and plug (unplug) the cable into (from) the appropriate jack on the unit.

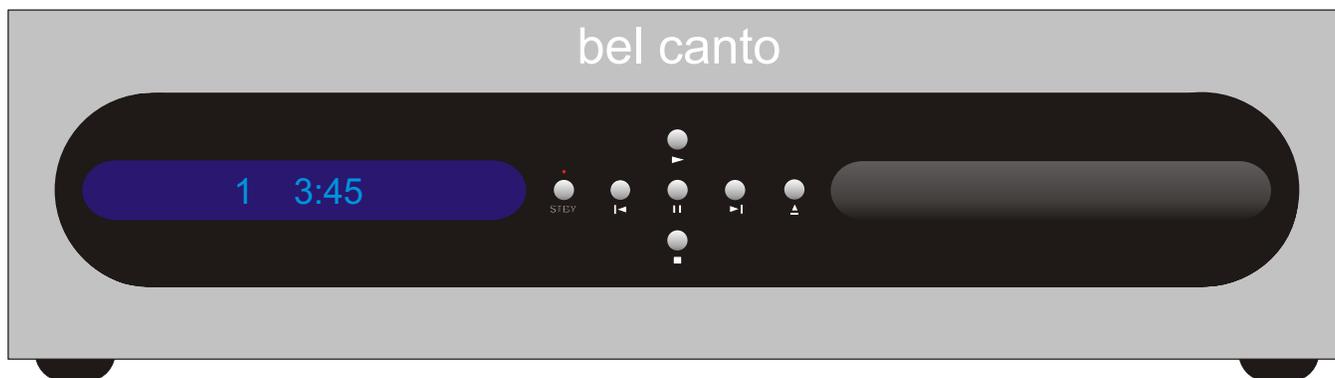
At times a snapping sound may occur or the unit may “lockup” and fail to operate. This is NOT A MALFUNCTION of the unit. This is normally caused by exposure to static electricity and can be cured by turning off the power amplifier(s) and then turning the unit off and then on with the rear mounted power switch.

Ventilation is an important issue when placing the unit in a system. Make certain that the unit is in a well-ventilated area or rack unit.

Please take note, that some power line conditioners defeat the AC power ground on their outlets. If the intention is to plug the unit into a line conditioner, check with your dealer to make certain that the particular conditioner that is intended for use DOES NOT DEFEAT THE AC GROUND on its AC outlets.

DO NOT remove the cover from the player, as there are no user serviceable components inside. Refer servicing and updating to qualified service personnel only.

OPERATING INSTRUCTIONS



FRONT PANEL CONTROLS

STBY: Turns off non critical circuits when unit is not in use. Red LED will light in STBY.

► **PLAY/REPLAY:**

- A:** Pressing the Play button when a disc is loaded will play the disc or a programmed sequence.
- B:** Pressing the Play button when a disc is playing will cause the track being played to restart.

|| **PAUSE:** Pressing the Pause button will cause the play to stop and the display to freeze. Pressing the button again will resume play.

■ **STOP/CLEAR MEMORY:**

- A:** Pressing the Stop button once will cause play to stop. The program memory will not be cleared.
- B:** Pressing the Stop button again will clear the memory if any track had been programmed.

► **NEXT /◀ PREVIOUS TRACK:**

- A:** ►/◀ Pressing the Next or Previous button when the player is in the stop mode will select the disc tracks in sequence.
- B:** ►/◀ Pressing the Next or Previous button with the player in the Play mode will cause the disc to jump tracks in sequence and continue playing.

▲ **OPEN/CLOSE:** Pressing the open button will open the tray door if the tray is closed. "OPEN" will appear on the display. When the tray is closed, if a disc is loaded the display will show the TOC (Table Of Contents). If there is no disc loaded then "NO DISC" will be displayed.

ADDITIONAL CONTROLS FOUND ON THE REMOTE CONTROL

PROG (Program):

- A:** If the player is in the stop mode, a track is selected, and the program key is pressed, the selected track is programmed. Total program time is displayed.
- B: Clearing Program:** If the player is in the stop mode, a programmed track is selected, and the program key is pressed, then the selected track is cancelled. Total program time is displayed.
- C: Review Program:** If tracks have been previously programmed, but no track is selected, and the program key is pressed, then all tracks stored in the program are successively displayed.

REP (Repeat): By pressing this key, the repeat mode will change from no repeat, to repeat all, then to repeat one and then back to no repeat.

- Repeat All:** If the end of the last track has played, a jump to the first track in the sequence made.
- Repeat One:** At the end of the track playing is reached, a jump to the start of the track is made.

DISC: Press this key to Open/Close the tray.

STBY: See Front Panel Controls on this page.

A-B (Repeat): During play, pressing the A-B key sets time A. The second time the A-B key is pressed, sets time B and the function is active. When time B is reached the player will jump back to time A.

SHUF (Shuffle): Pressing the shuffle key will cause the play of all tracks on the disc randomly.

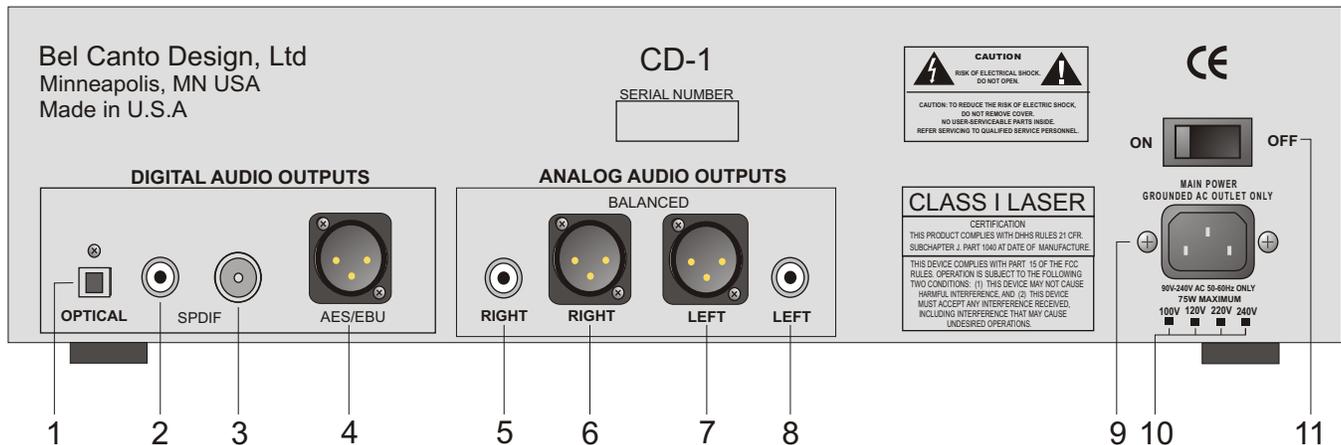
SCAN: Pressing the scan key will play the first 10 Seconds of all tracks on the disc successively.

◀◀/▶▶ **SEARCH FORWARD/REVERSE:** Pressing these keys will search the disc at 2 speeds, a low speed and then a faster speed after a few seconds.

FAST: Pressing this key before the forward or reverse key will initiate the search at the highest speed.

0 to 9 KEYS: The 0 to 9 keys are used for track selection. Pressing the number keys will allow selection of a track to be played. If the track number is higher than nine, then press a second number for the track (i.e. key 1 then key 5 for track 15). You have a short time to enter the second number in the sequence.

OPERATING INSTRUCTIONS



REAR PANEL CONNECTIONS

DIGITAL AUDIO OUTPUTS

- 1) **OPTICAL OUT (TOSLINK):** This output is for use with a *Toslink* type optical cable. For best results the cable should be as short as possible. Care should be taken that there are no sharp bends or kinks in the cable that would degrade the signal.
- 2) **RCA** type connector for use with co-axial digital cable. The highest quality digital cable should be used on this output.
- 3) **BNC** type connector for use with co-axial digital cable. The highest quality digital cable should be used on this output.
- 4) **AES/EBU** is a balanced digital output from a male 3-pin XLR connector. This type of balanced signal offers superior performance due to its higher signal level and low noise characteristics. The highest quality digital cable should be used with this output.

ANALOG AUDIO OUTPUTS

- 5 & 8) **RCA** type connectors for right and left analog audio output. These connectors should be used with high quality analog audio cables for best performance.
- 6 & 7) **Male 3-pin XLR** connectors for balanced right and left analog audio output. This type of connector offers superior isolation of the signal and low noise characteristics. For optimum performance only the best balanced analog cables should be used.

POWER CONNECTIONS

- 9) **A/C IEC POWER CONNECTOR:** This receptacle incorporates internal RFI filter circuits to prevent radio and television interference. It should be connected to a 3-wire grounded A/C cord and plugged into a 3-wire, un-switched power outlet. **DO NOT DEFEAT THE GROUND PIN.**
- 10) **POWER SETTINGS:** These boxes indicate the voltage which the unit is set to run on. 100V, 120V, 220V or 240V A/C Single Phase. Unit should be used only on the voltage specified by the marked box.
- 11) **Main Power Switch:** This switch controls the main power to the unit and should be left in the on position once the unit is installed. The front **STBY** button will turn off the display and other circuits leaving only heat sensitive circuits on. This assures maximum audio quality without a lengthy warm-up period. The switch should only be turned off if the unit is not to be used for long periods of time.

Specifications

System:

CD Player

Playback: CD, CD-R and CD-RW - RED Book Standard

Power Requirements: A/C 80-260Volts, 50/60Hz Set at
factory (see rear of unit)

Power Consumption: 45 watts maximum

Weight: 18 lbs

Dimensions: 17 1/2" (W)x4 5/8" (H)x14 5/8" (D)
Height with feet 5 3/8"

Operating temperature: +5C to +35C (+36F to +96F)

Operation humidity: 5% to 85% (no condensation)

Digital Output:

Optical Digital Out: TOSLINK

Coaxial Digital Out: SPDIF, single-ended RCA & BNC jacks

AES/EBU: Male XLR connector

Signal to Noise Ratio: 118db

Dynamic Range: 108db

Total Harmonic Distortion: .001%

Wow and Flutter: 0.001% W. PEAK or Lower

Analog Output:

Right and Left Channels: Single ended RCA jacks

Right and Left Channel: Balanced male XLR connectors

Output Level: 2.1 VRMS, balanced and single ended

Output Impedance: 100 Ohms single-ended
200 Ohms balanced

Signal to Noise Ratio: 115db (20Hz to 20kHz)

Total Harmonic Distortion: .001% THD+N

OTHER:

DAC: Burr-Brown 1792 DAC with 127db dynamic range

Bandwidth: 20Hz - 20kHz +/- 0.1%

Upsampling Filter: 352.8kHz with 130db stop band rejection

De-emphasis: Digital de-emphasis filter, +/- 0.01dB accuracy

Note: Please keep your box and packing. It has been carefully constructed to protect the unit during shipment. Units received for service in other than the original shipping box and packing, will be charged for replacement.