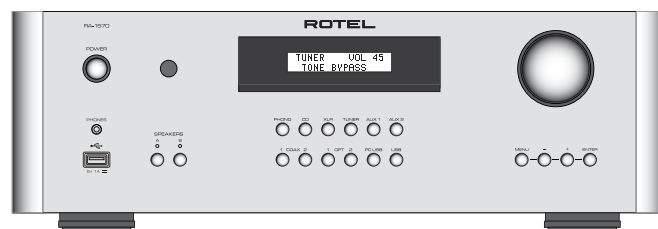


ROTEL®



RA-1570

Stereo Integrated Amplifier

立体声合并式放大器

Owner's Manual
使用说明书

Important Safety Instructions

WARNING: There are no user serviceable parts inside. Refer all servicing to qualified service personnel.

WARNING: To reduce the risk of fire or electric shock, do not expose the unit to moisture or water. Do not expose the unit to dripping or splashing. Do not place objects filled with liquids, such as vases, on the unit. Do not allow foreign objects to get into the enclosure. If the unit is exposed to moisture, or a foreign object gets into the enclosure, immediately disconnect the power cord from the wall. Take the unit to a qualified service person for inspection and necessary repairs.

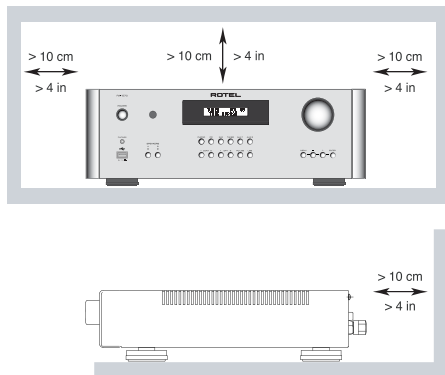
Read all the instructions before connecting or operating the component.

Keep this manual so you can refer to these safety instructions.

Heed all warnings and safety information in these instructions and on the product itself. Follow all operating instructions.

Clean the enclosure only with a dry cloth or a vacuum cleaner.

Do not use this unit near water.



You must allow a minimum 10 cm or 4 inches of unobstructed clearance around the unit.

Do not place the unit on a bed, sofa, rug, or similar surface that could block the ventilation openings. If the unit is placed in a bookcase or cabinet, there must be ventilation of the cabinet to allow proper cooling.

Keep the component away from radiators, heat registers, stoves, or any other appliance that produces heat.

WARNING: The rear panel power cord connector is the mains power disconnect device. The apparatus must be located in an open area that allows access to the cord connector.

The unit must be connected to a power supply only of the type and voltage specified on the rear panel. (USA: 120V/60Hz, EC: 230V/50Hz)

Connect the component to the power outlet only with the supplied power supply cable or an exact equivalent. Do not modify the supplied cable. A polarized plug has two blades, with one wider than the other. A grounding plug has two blades plus a third grounding prong. These are provided for your safety. Do not defeat grounding and/or polarization safety provisions. If the supplied plug does not fit your outlet, please consult an electrician for replacement of the obsolete outlet. Do not use extension cords.

The main plug of the power cordset is a disconnect device of the apparatus. In order to completely disconnect the apparatus from the supply mains, the main plug of the power cordset should be unplugged from the mains (AC) outlet. The standby LED indicator will not be lit up to show the power cord is unplugged. The disconnect device shall remain readily operable.

Do not route the power cord where it will be crushed, pinched, bent, exposed to heat, or damaged in any way. Pay particular attention to the power cord at the plug and where the cord exits the back of the unit.

The power cord should be unplugged from the wall outlet during a lightning storm or if the unit is to be left unused for a long period of time.

Use only accessories specified by the manufacturer.

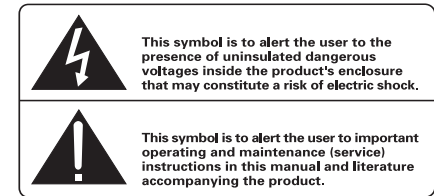
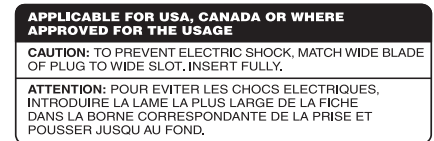
Use only with a cart, stand, rack, bracket or shelf system recommended by Rotel. Use caution when moving the unit in a stand or rack to avoid injury from a tip-over.

Use Class 2 wiring for speaker connections to ensure proper installation and minimize the risk of electrical shock.

Immediately stop using the component and have it inspected and/or serviced by a qualified service agency if:

- The power supply cord or plug has been damaged
- Objects have fallen or liquid has been spilled into the unit
- The unit has been exposed to rain
- The unit shows signs of improper operation
- The unit has been dropped or damaged in any way

The batteries in the remote control should not be exposed to excessive temperature such as sunshine, fire or other heat sources.



Rotel products are designed to comply with international directives on the Restriction of Hazardous Substances (RoHS) in electrical and electronic equipment and the disposal of Waste Electrical and Electronic Equipment (WEEE). The crossed wheellie bin symbol indicates compliance and that the products must be appropriately recycled or processed in accordance with these directives.

This symbol means that this unit is double insulated. An earth connection is not required.

Place the unit on a on a fixed, level surface strong enough to support its weight. Do not place it on a moveable cart that could tip over.



Figure 1: Controls and Connections

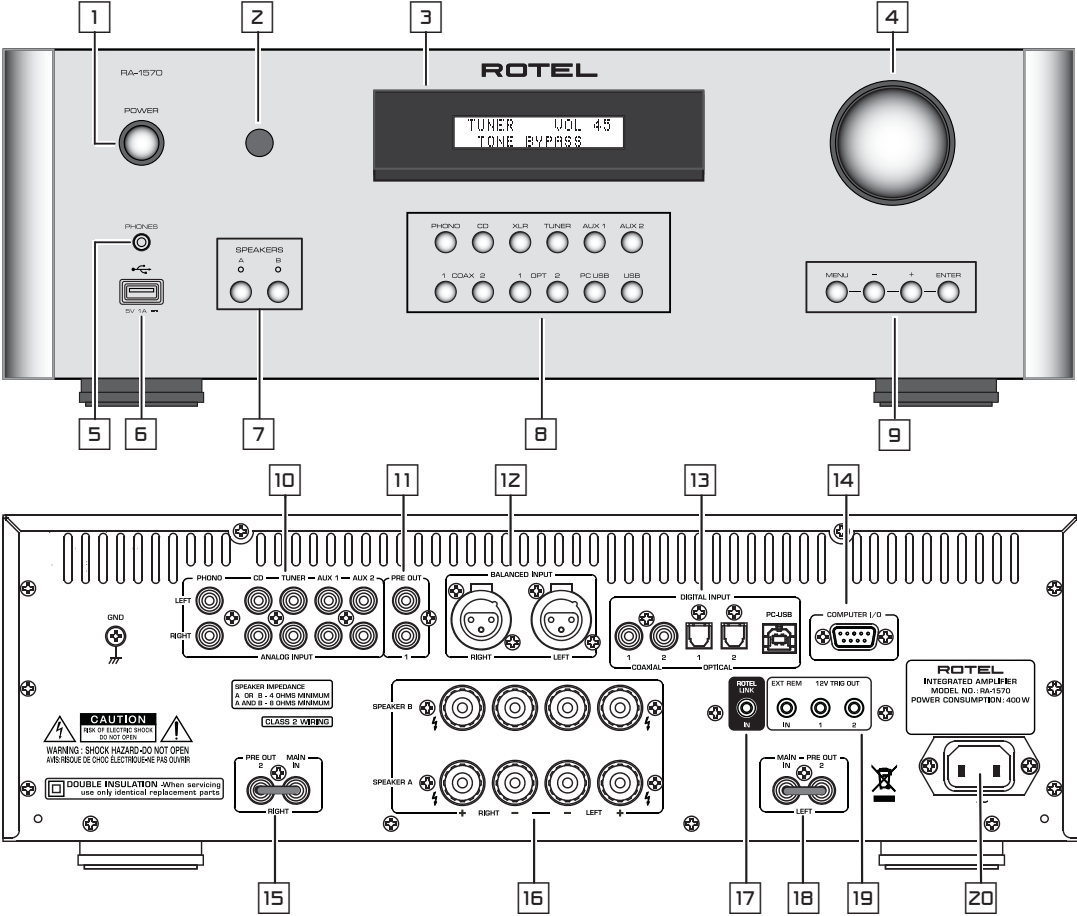


Figure 2: RR-AX92 Remote Control

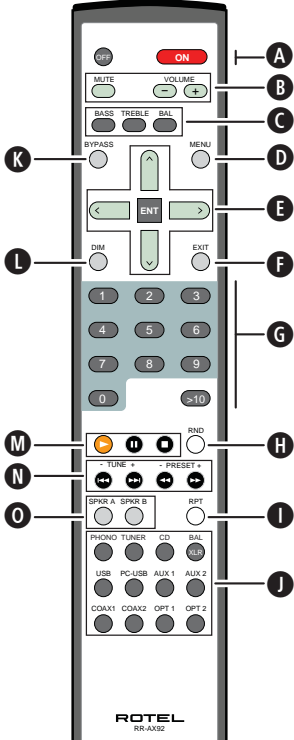


Figure 3: Analog Input and Speaker Output Connections

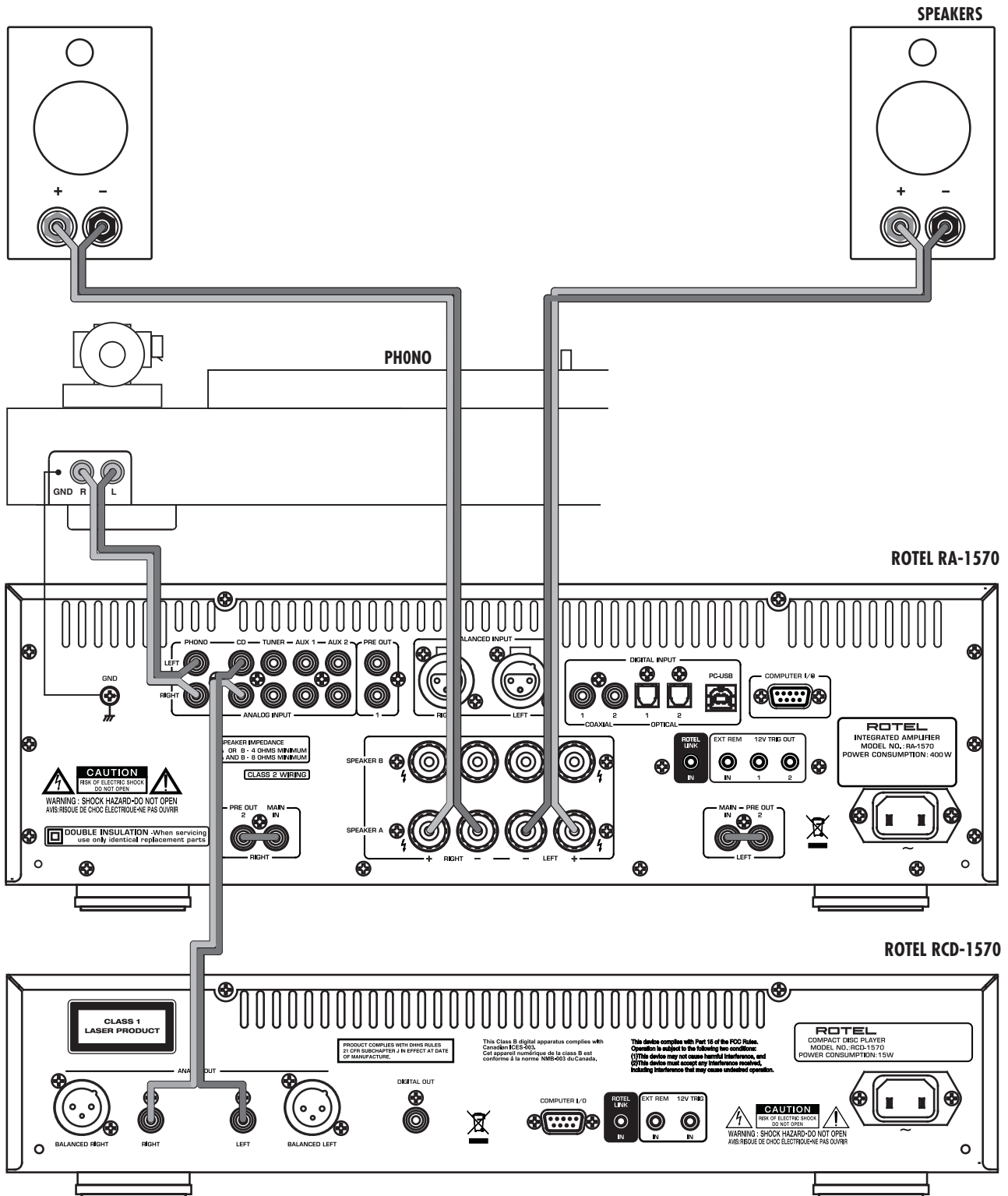


Figure 4: Balanced (XLR) Inputs

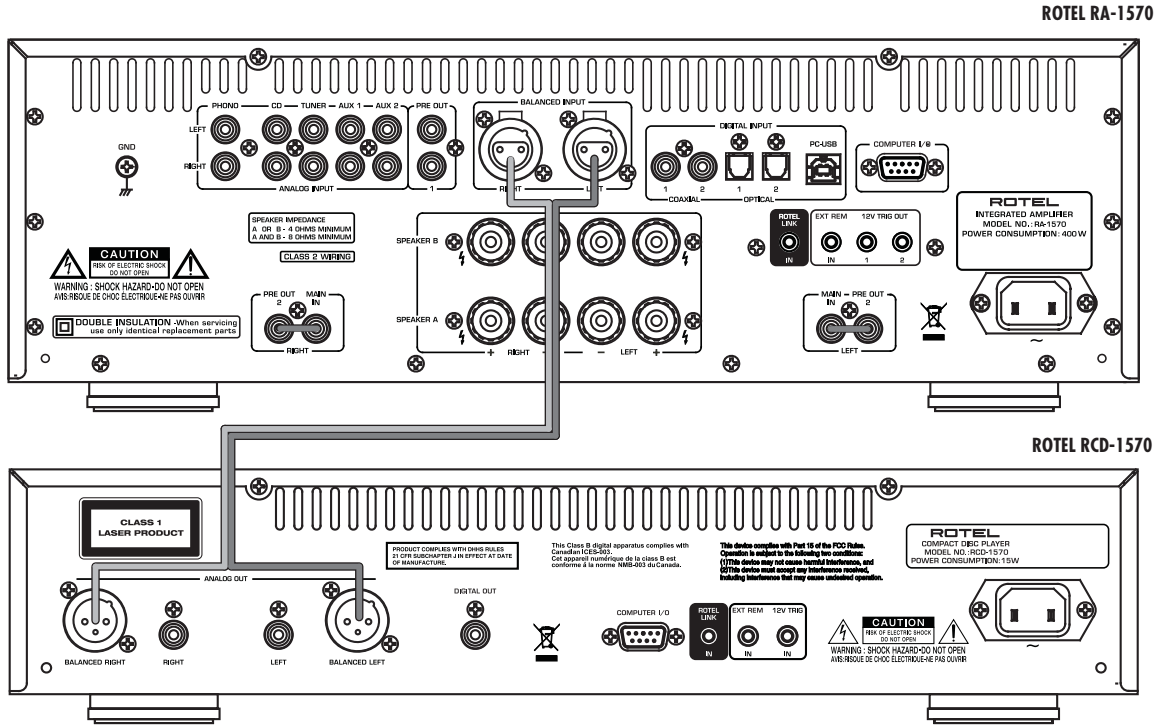
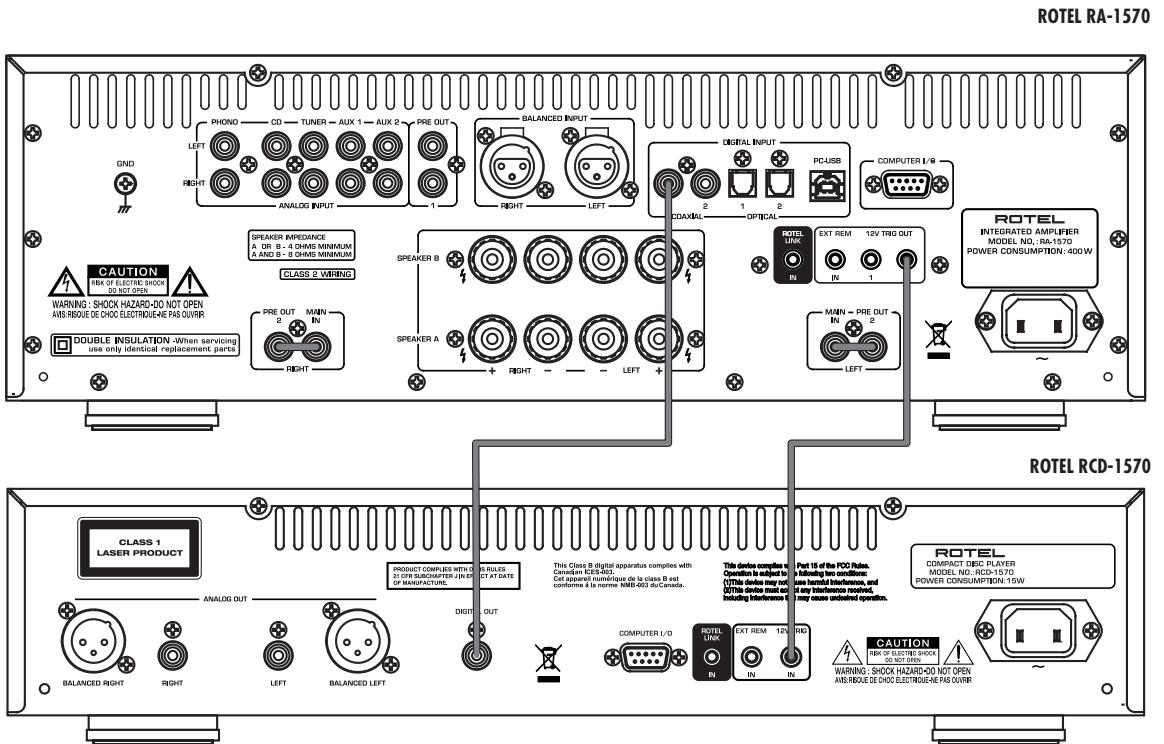


Figure 5: Digital Input and 12 Volt Trigger Out Connections



Important Notes

When making connections be sure to:

- ✓ Turn off **all** the components in the system **before** hooking up **any** components, including loudspeakers.
- ✓ Turn off **all** components in the system **before** changing **any** of the connections to the system.

It is also recommended that you:

- ✓ Turn the volume control of the amplifier all the way down **before** the amplifier is turned **on or off**.

Remarques importantes

Pendant les branchements, assurez-vous que :

- ✓ **Tous** les maillons sont éteints **avant** leur branchement, **quels qu'ils soient**, y compris les enceintes acoustiques.
- ✓ Éteignez **tous** les maillons **avant** de modifier **quoi que ce soit** au niveau de leurs branchements, quels qu'ils soient.

Il est également recommandé de :

- ✓ Toujours baissez le niveau sonore via le contrôle de volume, **avant d'allumer ou d'éteindre** l'amplificateur.

Wichtige Hinweise

Achten Sie beim Herstellen der Verbindungen auf Folgendes:

- ✓ Schalten Sie **alle** Komponenten im System ab, **bevor** Sie Geräte (einschließlich Lautsprecher) anschließen.
- ✓ Schalten Sie **alle** Komponenten im System ab, **bevor** Sie Anschlüsse im System verändern.

Ferner empfehlen wir, dass

- ✓ Sie die Lautstärke herunterdrehen, **bevor** Sie die Endstufe **ein-** oder **abschalten**.

Notas Importantes

Cuando realice las conexiones, asegúrese de que:

- ✓ Desactiva **todos** los componentes del equipo, cajas acústicas incluidas, **antes** de conectar **cualquier nuevo componente** en el mismo.
- ✓ Desactiva **todos** los componentes del equipo **antes** de cambiar **cualquier conexión del mismo**.

También le recomendamos que:

- ✓ Reduzca el nivel de volumen de su amplificador a cero **antes** de **activarlo o desactivarlo**.

Héél belangrijk:

Bij het maken van de verbindingen:

- ✓ Zorg dat niet alleen de RA-1570, maar de **gehele** installatie uitstaat, als nog niet **alle** verbindingen gemaakt zijn.
- ✓ Zorg dat niet alleen de RA-1570, maar de **gehele** installatie ook uitstaat, **als** u verbindingen gaat **wijzigen**.

Wij raden u ook aan om

- ✓ de volumeregelaar van de voorversterker geheel dicht te draaien (volkomen naar links) **wanneer** u uw eindversterker **aan- of uitzet**.

Note importanti

Quando effettuate i collegamenti assicuratevi di:

- ✓ Spegnerne **tutti** i componenti del sistema **prima** di collegare **qualsiasi** componente, inclusi i diffusori.
- ✓ Spegnerne **tutti** i componenti del sistema **prima** di modificare **qualsiasi** connessione nel sistema.

Vi raccomandiamo inoltre di:

- ✓ Portare il volume a zero **prima** di **accendere o spegnere** l'amplificatore.

Viktigt

Tänk på följande när du gör anslutningar:

- ✓ Stäng av **alla** komponenter i anläggningen **innan** du ansluter nya komponenter, inklusive högtalare.
- ✓ Stäng av **alla** komponenter i anläggningen **innan** du ändrar någon anslutning **i anläggningen**.

Vi rekommenderar också att du

- ✓ Vrider ner volymen på förstärkaren helt och hållet **innan** förstärkaren stängs av eller sätts på.

Перед подсоединением:

- ✓ Выключите **все** компоненты, включая колонки.
- ✓ Выключите **все** компоненты в вашей системе, прежде чем что-то в ней **менять**.

Рекомендуется также:

- ✓ Вывести громкость усилителя на **минимум**, перед тем как **включать или выключать** его.

Contents

Important Safety Instructions	2
Figure 1: Controls and Connections	3
Figure 2: RR-AX92 Remote Control	3
Figure 3: Analog Inputs and Speaker Output Connections	4
Figure 4: Balanced (XLR) Inputs	5
Figure 5: Digital Input and 12 Volt Trigger out Connections	5
Important notes	6
About Rotel	7
A Word About Watts	7
Getting Started	8
A Few Precautions	8
Placement	8
Cables	8
The RR-AX92 Remote Control	8
Remote Control Batteries	8
AC Power and Control	8
AC Power Input 20	8
Power Switch and Power Indicator 1	9
12V Trigger Connection 19	9
Input Signal Connections	9
Phono Input 10 and Ground Connection	9
Line Level Inputs 10	9
Balanced (XLR) Inputs 12	9
Digital Signal Inputs 13	9
Preamplifier Outputs 11	9
Preamplifier / Power Amp Jumpers 15 18	9
Speaker Outputs 16	10
Speaker Selection	10
Speaker Wire Selection	10
Polarity and Phasing	10
Speaker Connection 16	10
Phones Output 5	10
Remote Sensor 2	10
Display 3	10
Front USB Input 6	10
Bluetooth Connection	10
Audio Controls	10
VOLUME Control 4 B	10
Balance Control 9 C	10
Tone Control Bypass K	11
BASS and TREBLE Tone Controls 9 C	11
Function Control 8 J	11
PC-USB Input 13	11
Computer I/O Connector 14	11
Rotel Link 17	11
EXT REM IN Jack 19	11
Protection Circuit	11
Settings Menu	11
Troubleshooting	12
Power Indicator Is Not Illuminated	12
Fuse replacement	12
No Sound	12
Specifications	13

About Rotel

Our story began over 50 years ago. Over the decades, we have received hundreds of awards for our products and satisfied hundreds of thousands of people who take their entertainment seriously - like you!

Rotel was founded by a family whose passionate interest in music led them to manufacture high-fidelity components of uncompromising quality. Through the years, that passion has remained undiminished and the family goal of providing exceptional value for audiophiles and music lovers, regardless of their budget, is shared by all Rotel employees.

Rotel's engineers work as a close team, listening to, and fine tuning, each new product until it reaches their exacting musical standards. They are free to choose components from around the world in order to make that product the best they can. You are likely to find capacitors from the United Kingdom and Germany, semiconductors from Japan or the United States, while toroidal power transformers are manufactured in Rotel's own factory.

We all have concerns about our environment. And, as more and more electronics are produced and later discarded, it is especially important for a manufacturer to do all it can to engineer products that have a minimum negative impact on landfill sites and water tables.

At Rotel, we are proud to do our part. We have reduced the lead content in our electronics by using special ROHS solder, while our new Class D (not digital) amplifiers are up to five times more efficient than our legacy designs and still deliver power and performance. These products run cool, give minimum wasted energy, are good for the environment and give better sound too.

Finally, we have printed this manual on recycled paper stock.

While we understand that these are small first steps, they are still important ones. And we continue to pursue new methods and materials for a cleaner and greener manufacturing process. All of us at Rotel thank you for buying this product. We are sure it will bring you many years of enjoyment.

A Word About Watts

This amplifier's power output is quoted as 120 watts for each channel, when both channels are operating together at full power. Rotel has chosen to specify the power output in this way because, in Rotel's experience, it gives the truest value of the receiver or amplifier's power capability.

When comparing specifications for different products, you should be aware that power output is often specified in other ways, so you may not be comparing like with like. For example, the power output may be quoted with only one channel operating, giving a higher maximum figure.

A loudspeaker's impedance rating indicates the electrical resistance or load it offers when connected to the amplifier, usually 8 ohms or 4 ohms. The lower the impedance, the more power the speaker will need. In effect, a 4 ohm speaker will require twice as much power as an 8 ohm speaker.

However, Rotel amplifiers are designed to work into any speaker impedance between 8 and 4 ohms, and with all the channels working up to their full power. Because Rotel designs are optimized for use with all channels operating together, Rotel is able to specify the true power output for both channels.

Getting Started

Thank you for purchasing the Rotel RA-1570 Stereo Integrated Amplifier. When used in a high-quality music audio system, it will provide years of musical enjoyment.

The RA-1570 is a full featured, high performance component. All aspects of the design have been optimized to retain the full dynamic range and subtle nuances of your music. The RA-1570 has a highly regulated power supply incorporating a Rotel custom-designed toroidal power transformer and custom-made slit foil capacitors. This low impedance power supply has ample power reserves, which enables the RA-1570 to easily reproduce the most demanding audio signals. This type of design is more expensive to manufacture, but it is better for the music.

The printed circuit boards (PCB) are designed with Symmetrical Circuit Traces. This insures that the precise timing of the music is maintained and faithfully recreated. The RA-1570 circuitry uses metal film resistors and polystyrene or polypropylene capacitors in important signal paths. All aspects of this design have been examined to ensure the most faithful music reproduction.

The main functions of the RA-1570 are easy to install and use. If you have experience with other stereo systems, you shouldn't find anything perplexing. Simply plug in the associated components and enjoy.

A Few Precautions

WARNING: To avoid potential damage to your system, turn off ALL the components in the system when connecting or disconnecting the loudspeakers or any associated components. Do not turn the system components back on until you are sure all the connections are correct and secure. Pay particular attention to the speaker wires. There must be no loose strands that could contact the other speaker wires, or the chassis of the amplifier.

Please read this manual carefully. In addition to basic installation and operating instructions, it provides valuable information on various RA-1570 system configurations as well as general information that will help you get optimum performance from your system. Please contact your authorized Rotel dealer for answers to any questions you might have. In addition, all of us at Rotel welcome your questions and comments.

Save the RA-1570 shipping carton and all enclosed packing material for future use. Shipping or moving the RA-1570 in anything other than the original packing material may result in severe damage to your amplifier.

Fill out and send in the owner's registration card packed with the RA-1570. Also be sure to keep the original sales receipt. It is your best record of the date of purchase, which you will need in the event warranty service is ever required.

Placement

Like all audio components that handle low-level signals, the RA-1570 can be affected by its environment. Avoid placing the RA-1570 on top of other components. Also avoid routing audio signal cables near power cords. This will minimize the chance it will pick up hum or interference.

The RA-1570 generates heat as part of its normal operation. The heat sinks and ventilation openings in the amplifier are designed to dissipate this heat. The ventilation slots in the top cover must be open. There should be 10 cm

(4 inches) of clearance around the chassis, and reasonable airflow through the installation location, to prevent the amplifier from overheating.

Remember the weight of the amplifier when you select an installation location. Make sure that the shelf or cabinet can support it. We recommend installing the RA-1570 in furniture designed to house audio components. Such furniture is designed to reduce or suppress vibration which can adversely affect sound quality. Ask your authorized Rotel dealer for advice about component furniture and proper installation of audio components.

The RA-1570 is supplied with an RR-AX92 remote control and must be placed where the infrared signal from the remote can reach the front panel Remote Sensor.

Cables

Be sure to keep the power cords, digital signal cables and regular audio signal cables in your installation away from each other. This will minimize the chance of the regular audio signal cables picking up noise or interference from the power cords or digital cables. Using only high quality, shielded cables will also help to prevent noise or interference from degrading the sound quality of your system. If you have any questions see your authorized Rotel dealer for advice about the best cable to use with your system.

The RR-AX92 Remote Control

Some functions can be done with either the front panel controls, or the supplied RR-AX92 remote control. When these operations are described, the square call out numbers refer to the main unit, while the encircled letters refer to the remote control.

NOTE: The remote control can be used to operate the basic functions of Rotel tuners and CD players. Remote control keys labeled **G H M N** can be used to operate CD or Tuner functions in your system. For the remote to operate properly, make sure both the remote and the CD or Tuner are both in same remote code.

Remote Control Batteries

Two UM-4/AAA size batteries (supplied) must be installed before the remote control can be used. To install the batteries, remove the cover on the back of the RR-AX92. Install the batteries as shown in the illustration in the battery well. Test the control for proper operation, then replace the cover. When the batteries become weak the remote control won't operate the RA-1570 consistently. Installing fresh batteries should eliminate the problem.

AC Power and Control

AC Power Input

Because of its relatively high power rating, the RA-1570 can draw considerable current. Therefore, it should be plugged directly into a 2-pin polarized wall outlet. Do not use an extension cord. A heavy duty multi-tap power outlet strip may be used if it (and the wall outlet) is rated to handle the current demanded by the RA-1570 and all the other components connected to it.

Your RA-1570 is configured at the factory for the proper AC line voltage in the country where you purchased it (either 120 volts AC or 230 volts AC with a line frequency of either 50 Hz or 60 Hz). The AC line configuration is noted on a decal on the back panel.

NOTE: Should you move your RA-1570 to another country, it is possible to reconfigure your amplifier for use on a different line voltage. Do not attempt to perform this conversion yourself. Opening the enclosure of the RA-1570 exposes you to dangerous voltages. Consult a qualified service person or the Rotel factory service department for information.

NOTE: Some products are intended for sale in more than one country and as such are supplied with more than one AC cord. Please only use the one appropriate for your country/region.

If you are going to be away from home for an extended period of time such as a month long vacation, it is a sensible precaution to unplug your amplifier (as well as other audio and video components) while you are away.

POWER Switch and Power Indicator 1

Press the front panel Power Switch button, to turn the unit on. The Power Indicator light is illuminated when the unit is on. Press Power Switch button again to turn the unit off.

When the power switch is in the ON position, the remote control ON and OFF buttons may be used to activate the RA-1570. In Standby mode the power LED remains lit, but the display is turned OFF.

12V TRIGGER Connection 19

Some audio components can be turned on automatically when they receive a 12V turn on "signal". The two 12V Trigger Outputs of the RA-1570 provide the required signal. Connect compatible components to the RA-1570 with a conventional 3.5mm mini plug cable. When the RA-1570 is in turn off mode, the trigger signal is interrupted, so the components controlled by it are turned off.

NOTE: If you are using other units in the series with Rotel link, please use the Rotel Link connection to turn the units on or off. Do not connect both the Rotel Link and 12V trigger cables. The 12V trigger's power on or off features will override the Rotel Link features.

Input Signal Connections

See Figure 3,4,5

NOTE: To prevent loud noises that neither you nor your speakers will appreciate, make sure the system is turned off when you make any signal connections.

Phono Input 14 and Ground Connection (GND)

See Figure 3

Plug the cable from the turntable into the appropriate left and right phono inputs. If the turntable has a "ground" wire, connect it to the screw terminal to the left of the Phono inputs. It will help prevent hum and noise.

Line Level Inputs 10

See Figure 3

The CD, Tuner, and Aux inputs of the amplifier are analog "line level" inputs. These inputs are for connecting components such as CD players or other audio playback devices with an analog audio output.

The left and right channels are clearly labeled and should be connected to the corresponding channels of the source component. The Left connectors are white, the Right connectors are red. Use high quality RCA cables for connecting input source components to the RA-1570. Ask your authorized Rotel dealer for advice about cables.

Balanced (XLR) Inputs 12

See Figure 4

A pair of balanced XLR inputs accept audio signals from CD player, Blu-ray player or other source components with XLR outputs.

NOTE: You should choose only one method of analog connection from a source component to RA-1570. Do not connect both the RCA and XLR outputs of a source component to the RA-1570 at the same time.

Digital Signal Inputs 13

See Figure 5.

There are two sets of digital inputs labeled COAX 1 and 2, OPT 1 and 2. Connect the COAXIAL or OPTICAL PCM outputs of your source component into these sockets. The digital signals will be decoded and played by the amplifier. The unit is capable of decoding PCM signals up to 24 bit, 192kHz.

Preamp Outputs 11

The amplifier has a set of preamp outputs labeled PREOUT 1. The signal from the source selected with the Function Selector is always available from these outputs. Typically the PREOUT 1 output is used to provide a signal to another integrated amplifier or power amplifier, which is used to drive remote speakers.

NOTE: Changes to the settings of the Volume, Balance or Tone controls affect the signal from the Preamp Outputs.

Preamp / Power Amp Jumpers 15 18

These connectors, labeled "Pre Out 2" and "Main In", are normally connected by a set of solid metal jumper connectors. They provide a convenient insertion point for virtually any type of signal processor. To use these connectors, pull out the jumper connectors. Using high quality cables, connect the "Pre Out 2" connectors to the inputs of the signal processor. Connect the outputs of the signal processor to the "Main In" connectors.

Speaker Outputs 16

See Figure 3

The RA-1570 has two sets of speaker outputs, labeled SPEAKER A and SPEAKER B. The speaker outputs are controlled by the switch 7 on the front panel and the buttons 1 on the remote control.

Speaker Selection

If only one set of speakers will be used at any given time, the speakers may have an impedance as low as 4 ohms. If there are times when both the A

and B speakers will be used, all the speakers should have an impedance of 8 ohms or more. Speaker impedance ratings are less than precise. In practice, very few loudspeakers will present any problems for the RA-1570. See your authorized Rotel dealer if you have any questions.

Speaker Wire Selection

Use insulated two-conductor stranded wire to connect the RA-1570 to the speakers. The size and quality of the wire can have an audible effect on the performance of the system. Standard speaker wire will work, but can result in lower output or diminished bass response, particularly over longer distances. In general, heavier wire will improve the sound. For best performance, you may want to consider special high-quality speaker cables. Your authorized Rotel dealer can help in the selection of cables for your system.

Polarity and Phasing

The polarity – the positive/negative orientation of the connections – for every speaker and amplifier connection must be consistent so all the speakers will be in phase. If the polarity of one connection is reversed, bass output will be very weak and stereo imaging degraded. All wire is marked so you can identify the two conductors. There may be ribs or a stripe on the insulation of one conductor. The wire may have clear insulation with different color conductors (copper and silver). There may be polarity indications printed on the insulation. Identify the positive and negative conductors and be consistent with every speaker and amplifier connection.

Speaker Connections

Turn off all the components in the system before connecting the speakers. The RA-1570 has color-coded binding post type speaker connectors on the back panel. These connectors accept bare wire, connector lugs, or dual banana type connectors. (except in European Community countries where their use is not permitted)

Route the wire from the RA-1570 to the speakers. Give yourself enough slack so you can move the components to allow access to the speaker connectors.

If you are using dual banana plugs, connect them to the wires and then plug into the backs of the binding posts. The thumbscrews of the binding posts should be screwed in all the way (clockwise).

If you are using terminal lugs, connect them to the wires. If you are attaching bare wires directly to the binding posts, separate the wire conductors and strip the insulation from the end of each conductor. Be careful not to cut into the wire strands. Unscrew (turn counterclockwise) the binding post. Place the connector lug or wire around the binding post shaft. Turn the binding post clockwise to clamp the connector lug or wire firmly in place.

NOTE: Be sure there are no loose wire strands that could touch adjacent wires or connectors.

PHONES Output

The Phones output allows you to connect headphones for private listening. This output accommodates standard stereo phone (1/8") plugs. Plugging in a set of headphones does not cut off the signal to the speakers. Use the Speaker Selector to turn off the speakers. The settings of the Function Selector determines which source is heard.

NOTE: Because the sensitivity of speakers and headphones can vary widely, always reduce the volume level before connecting or disconnecting headphones.

Remote Sensor

This remote sensor window receives IR commands from the remote control. Please do not block this sensor.

Display

The front panel display shows the source selected, volume level and tone settings.

Front USB Input


The front USB input can be connected to a iPod, iPhone, MP3 players or a Bluetooth dongle (supplied) for wireless streaming. With iPod or iPhones, simply plug the device into the front USB and select USB function from the source selector. The iPod, iPhone remains active. Search and play tracks as usual and the music will be played through the Rotel system.

Bluetooth Connection





Insert the supplied Bluetooth Dongle into the front USB for wireless streaming via Bluetooth, from your device (i.e. mobile phones) to the amplifier. From your mobile device, look for "Rotel Bluetooth" and connect to it. Connection is normally automatic, but if prompted for a password, please press "0000" then press ENT (if necessary) on the remote and your device.

Audio Controls



VOLUME Control

Turn the controls clockwise to increase the volume, or counter clockwise to decrease the volume. From the remote control press the volume + or - key to turn the volume up or down. Press the MUTE  key to completely mute the volume.




BALANCE Control

The Balance Control adjusts the left-to-right balance of the sound output. The factory default is the center position or "0". To change the balance from the front panel, press the MENU  key to toggle the front display to BALANCE SETTING mode. Then press the - or + keys on the front panel to change the value to LEFT or RIGHT. The value can change from L15 to R15. From the remote, press the BAL  key to access the BALANCE SETTING menu, then press the LEFT or RIGHT  key to adjust. When finished, press the EXIT  key to exit the menu.

Tone Control Bypass

Bass and Treble Control (Tone Control) circuits are bypassed at factory default to ensure the purest possible sound. The front display will show TONE BYPASS. To turn on the tone control, press the BYPASS  key on the remote control. From the front panel press the MENU  key to toggle to the Bypass control then press the LEFT or RIGHT keys to turn bypass on or off.

Bass and Treble Controls

Set the Bass or Treble controls from the front panel by pressing the MENU  key to toggle to either the Bass or Treble Setting menu. Then press the - or + key to adjust the value. The Bass and Treble values range from -10 to +10. From the remote control, press the Bass or Treble key , then press the LEFT or RIGHT  keys on the remote to adjust the value.

A properly setup high-performance audio system produces the most natural sound with little or no adjustment of the tone controls. Use these controls sparingly. Be particularly careful when turning the controls up as this increases the power output in the bass or treble range, increasing the load on the amplifier and speakers.

NOTE: Setting the Bass and Treble controls do not automatically turn on the tone control. To turn on tone control, refer to previous section *Tone Control Bypass*.

NOTE: Tone Bypass, Bass, Treble and Balance settings are temporary and not saved after power off. To make permanent changes please see *Settings Menu*.

Function Control

The Function control selects the input signal source. From the front panel or remote press the corresponding input key to select the source to listen to.

PC-USB Input

Connect this input using the supplied USB cable to the USB socket of your computer.

NOTE: You will need to install the USB driver located on the CD supplied with the RA-1570 onto your computer to allow it to send audio to the RA-1570 via USB.

NOTE: Upon successful installation of the driver, you may need to select the ROTEL audio driver from the audio/speaker setup of your computer.

Computer I/O Connector

The RA-1570 can be controlled via RS232 for integration with automation systems. The COMPUTER I/O input accepts a standard straight DB-9 Male-to-Female cable.

For additional information on the connections, software, and operating codes for computer control of the RA-1570, contact your authorized Rotel dealer.

ROTEL LINK

This 3.5 mm stereo mini-jack (labeled ROTEL LINK IN) can optionally attach to Rotel network enabled products with ROTEL LINK OUT connections. This allows the attached Rotel products to communicate with each other and be controlled via the Rotel Remote App (available for download on the iTunes® store).

EXT REM IN Jack

This 3.5mm mini-jack receives command codes from industry-standard infrared receivers via hard-wired connections. This feature could prove useful when the unit is installed in a cabinet and the front-panel sensor is blocked. Consult your authorized Rotel dealer for information on these external repeaters and the proper wiring of a jack to fit the mini-jack receptacle.

Protection Circuit

The amplifier has both thermal and over-current protection circuitry that protects the amplifier against damage in the event of extreme or faulty operating conditions. The protection circuits are independent of the audio signal and have no impact on sonic performance. Instead, the protection circuits monitor the temperature of the output devices and shut down the amplifier if temperatures exceed safe limits.






Most likely, you will never see this protection circuitry in action. However, should a faulty condition arise, the amplifier will stop playing and will display "AMP PROTECTION" on the front panel

If this happens, turn the amplifier off. Let it cool down for several minutes, and attempt to identify and correct the problem that caused the protection circuitry to engage. When you turn the amplifier back on, the protection circuit will automatically reset.

In most cases, the protection circuitry activates because of a fault condition such as shorted speaker wires, or inadequate ventilation leading to an overheating condition. In very rare cases, highly reactive or extremely low impedance speaker loads could cause the protection circuit to engage.

If the protection circuitry triggers repeatedly and you are unable to isolate and correct the faulty condition, contact your authorized Rotel dealer for assistance in troubleshooting.

Settings Menu


You can access the settings menu from the front panel by pressing the MENU  button or the MENU  button on the remote. You can change the value of the selected option by pressing the +/- key on the front panel or LEFT/RIGHT  key on the remote. Step through the sub-menus by pressing the MENU  key on the front panel or MENU  button on the remote.

- Tone Control: TONE BYPASS ON/OFF, BASS level and TREBLE levels can be changed to desired settings. Press the ENTER key on the front panel or ENT on the remote to toggle between the tone setup options. (For more information on Tone Control refer to the Tone Control Bypass, Bass and Treble control sections)

NOTE: These settings are stored permanently even after the RA-1570 is powered off.

- BALANCE: Change left/right balance (For more information on Balance sections)

NOTE: These settings are stored permanently even after the RA-1570 is powered off.

- DIMMER: Dims the display in 7 steps. This can also be temporary changed using the DIM  button on the remote control.

NOTE: These settings are stored permanently even after the RA-1570 is powered off.

- ROTEL LINK RCD, selects how the CD player is connected to the amplifier, either CD (analog), COAX1 or COAX2. CD is the factory default.

- **POWER ON MAX VOLUME:** This sets the maximum volume level when the unit is turned ON. "45" is the factory default.

- **Fixed Gain:** Configures a Fixed Volume level for a specified input. To enable this feature press the +/- keys to select the desired fixed volume level for Aux 1, Coax 1, Optical 1, PC-USB or USB. When enabled and the input with a Fixed Volume is selected, the Volume level will immediately be set to the specified level.

Valid settings include: VARIABLE, FIXED 1-95, FIXED MAX.

NOTE: *The Volume knob on the front panel and Volume +/- keys on the IR remote are disabled when the volume is Fixed. To disable this feature set the Fixed Volume level to "Variable".*

- AUX1 VOL: VARIABLE (disabled) is factory default.
- COAX1 VOL: VARIABLE (disabled) is factory default.
- OPT1 VOL: VARIABLE (disabled) is factory default.
- PC-USB VOL: VARIABLE (disabled) is factory default.
- USB VOL: VARIABLE (disabled) is factory default.
- PC-USB AUDIO CLASS: Change supported PC-USB Audio Class of the attached device.

NOTE: *Some computers attached to the PC-USB do not support USB Audio Class 2.0 and do not support 24/192 audio playback. If needed the PC-USB can be configured for USB Audio Class 1.0. Please consult your computer operating system for details.*

- **Software Version :** This shows the current software version loaded into the amplifier.
- **FACTORY DEFAULT:** This sets the unit back to the original state as when it left the factory. Press the + key on the front panel or Right key on the remote control to select <YES> then press the "ENTER" key on the front panel or "ENT" on the remote control.

Troubleshooting

Most difficulties in audio systems are the result of incorrect connections, or improper control settings. If you encounter problems, isolate the area of the difficulty, check the control settings, determine the cause of the fault and make the necessary changes. If you are unable to get sound from the RA-1570, refer to the suggestions for the following conditions:

Power Indicator Is Not Illuminated

The Power Indicator ring around the power button and the basic items in the Display window should be illuminated whenever the RA-1570 is plugged into the wall power outlet and the POWER switch is pushed in. If it does not light, test the power outlet with another electrical device, such as a lamp. Be sure the power outlet being used is not controlled by a switch that has been turned off.

Fuse Replacement

If another electrical device works when plugged into the power outlet, but the Power Indicator still will not light when the RA-1570 is plugged into the wall outlet, it indicates that the internal power fuse may have blown. If you believe this has happened, contact your authorized Rotel dealer to get the fuse replaced.

No Sound

Check the signal source to see if it is functioning properly. Make sure the cables from the signal source to the RA-1570 inputs are connected properly. Check the wiring between the RA-1570 and the speakers.

Specifications

Continuous Power Output (20-20 kHz, < 0.03%, 8 ohms)	120 watts/channel
Total Harmonic Distortion (20Hz-20kHz)	< 0.03% at rated power, 1/2 power, or 1 watt
Intermodulation Distortion (60 Hz : 7 kHz, 4:1)	< 0.03% at rated power, 1/2 power or 1 watt
Frequency Response:	
Phono Input	20Hz-20kHz, ±0.5dB
Line Level Inputs	10Hz-100kHz, +1, -3dB
Damping Factor (20Hz-20kHz, 8 ohms)	180
Input Sensitivity / Impedance	
Phono Input (MM)	2.25mV / 68k ohms
Line Level Inputs (RCA)	285mV / 100k ohms
Line Level Inputs (Balanced)	570mV / 50k ohms
Input Overload	
Phono Input	30mV
Line Level Inputs	4V
Preamplifier Output / Impedance	1.5V / 470 ohms
Signal to Noise Ratio (IHF "A" weighted)	
Phono Input	80dB
Line Level Inputs	100dB
Digital Section	
Frequency Response	10Hz - 95k Hz (±3.0dB, Max)
Signal to Noise Ratio (IHF "A" weighted)	100 dB
Input Sensitivity/Impedance	0 dBfs / 75 ohms
Preout Level/Impedance	1.2 V/ 470 ohms (at -20 dB)
USB/iPod Digital Signals	WAV, MP3, WMA (up to 48kHz 16 bit)
Coaxial/Optical Digital Signals	SPDIF LPCM (up to 192kHz 24 bit)
PC-USB	USB Audio Class 1 (up to 24/96) USB Audio Class 2 (up to 24/192)* *Driver installation required
Power Requirements:	
USA:	120 Volts, 60 Hz
EC:	230 Volts, 50 Hz
Power Consumption	400 watts
Standby Power Consumption	< 0.5 watts
Dimensions (W x H x D)	431 x 144 x 350 mm (17 x 5 ⁷ / ₈ x 13 ³ / ₄ ins)
Front Panel Height	3U (132.6mm, 5 ¹ / ₄ ins)
Weight (net)	13kg, 28.7 lbs.

All specifications are accurate at the time of printing.
Rotel reserves the right to make improvements without notice.

Rotel and the Rotel Hi-Fi logo are registered trademarks of The Rotel Co, Ltd., Tokyo, Japan.

重要安全说明

警告：机内无客户可以维修的部件。请合格维修人员维修。

警告：为减少火灾或触电的危险，不要将本产品置于潮湿环境中或水中。不要将本产品置于滴水或溅水环境中。不要将含有液体的物件（例如花瓶）放在本产品上。不要让异物进入本产品外壳内。如果本产品进入潮湿环境中，或异物进入本产品内，立即从墙上拔掉电源线。将本产品送交合格维修人员检查或进行必要的维修。

连接或操作之前，请阅读所有说明。

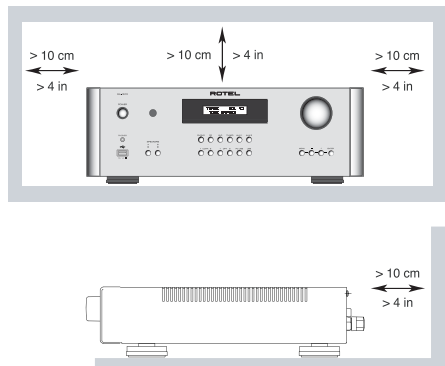
请保留本手册，以便阅读这些安全说明。

请留意这些说明和产品上的所有警告或安全信息。请遵从操作说明。

只能用于干布或真空吸尘器清洁。

不要在接近水的地方使用本产品。

本产品周围最少应有10cm或4in.的间隙。



不要将本产品置于床上、沙发、垫子或类似的物体上，以防堵塞通风口。如果将本装置放在书柜或橱柜上，柜上应有通风口，以便于产品的散热。

请将本产品远离辐射、热源、火炉或其它发热器具。

警告：后面板上的电源线接头是主电源断开装置。应该将本机放在可拔插电源线接头的开放的地方。

只能将本产品连接到后面板指定的型号和电压的电源上。（美国：120V/60Hz，欧洲：230V/50Hz，中国：220V/50Hz）

只能用本产品提供的电源线或严格等同的电源线将本产品连接到电源插座上。不得更改随本产品提供的电源线。两极插头有两个插刀，其中一个插刀比另一个宽。接地插头有两个插刀和第三个接地插刀。这些都是为了您的安全。不得违反接地和两极安全规定。如果随本产品提供的插头与您的插座不匹配，请咨询电工更换陈旧的插座。不要使用延长线。

电源电缆的主插头是本产品的断电装置。要将本产品从电源完全断开，应从主（交流）插座上按下电源电缆的主插头。拔掉电源线后，待机指示灯熄灭。断路装置保持随时可操作状态。

不要使用变形的、收缩的、弯折的或损坏的，电源线，不要将电源线置于热源附近。请特别留意插头处和本装置后面的电源线。

雷暴天气中或本装置长时间不使用时，应将电源线从墙上插头中拔出。

只能使用制造商指定的附件。

只能使用洛得推荐的机架、立架或支架。在本架或机架上移动本装置时，请小心避免翻侧。

使用2类电线连接音箱，以确保正确的安装及将触电风险减至最低。

在下列情况下，立即停止使用本装置，并请合格维修机构检测和维修：

- 电源线或插头损坏
- 异物或液体进入进装置中
- 本装置遭受雨淋
- 本装置显示不正确操作的迹象
- 本装置跌落或以任何方式被损坏

请勿将遥控器内的电池暴露于阳光、火源等类似的高温条件下。

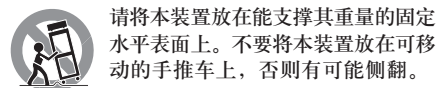
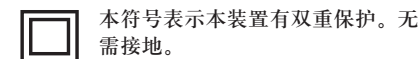
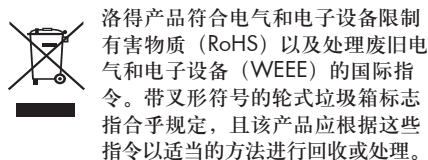
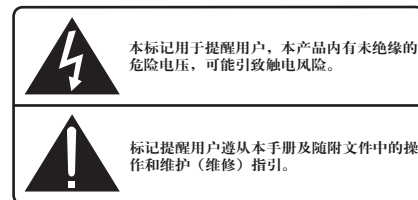
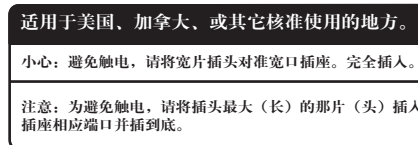
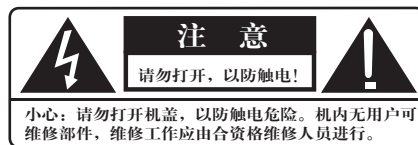


图1：控制和连接

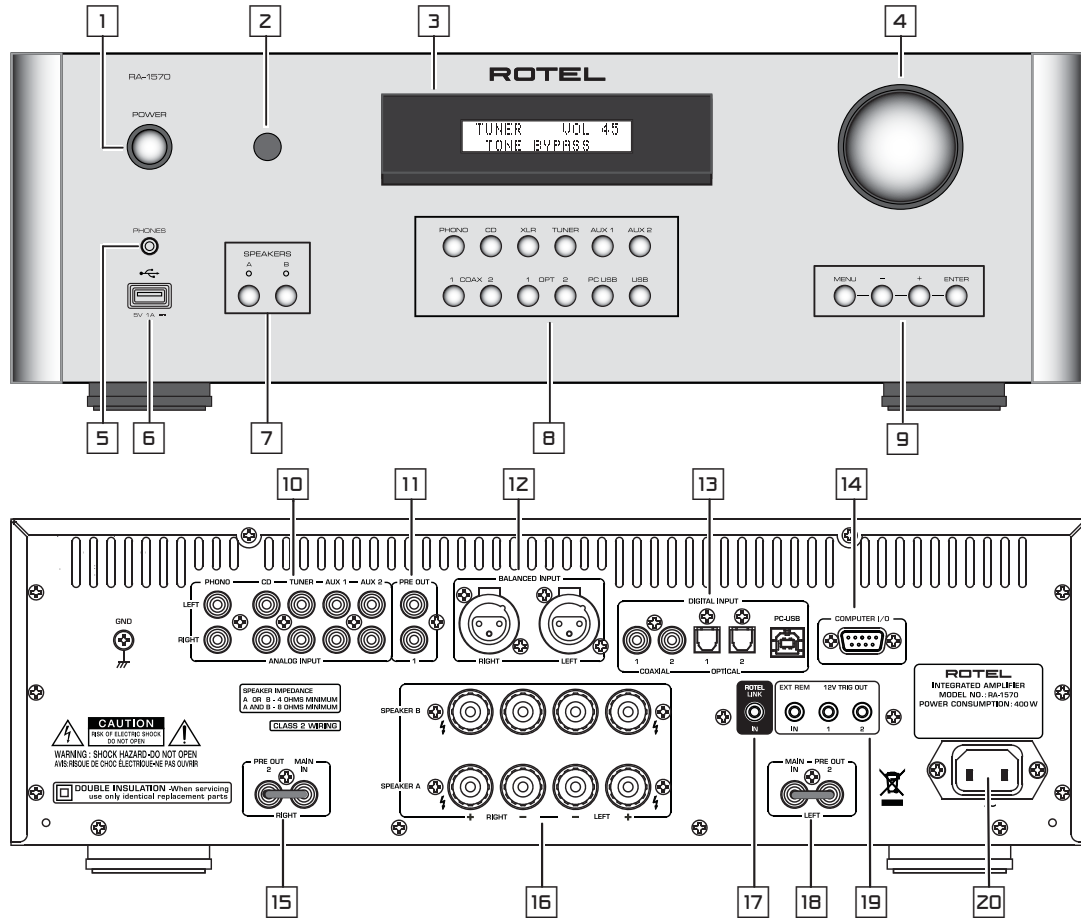


图2：RR-AX92遥控器

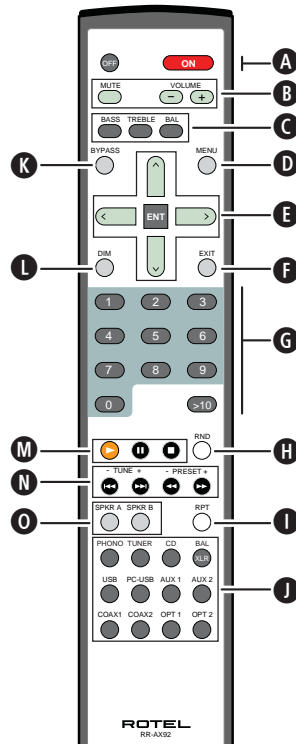


图3：模拟输入和音箱输出连接

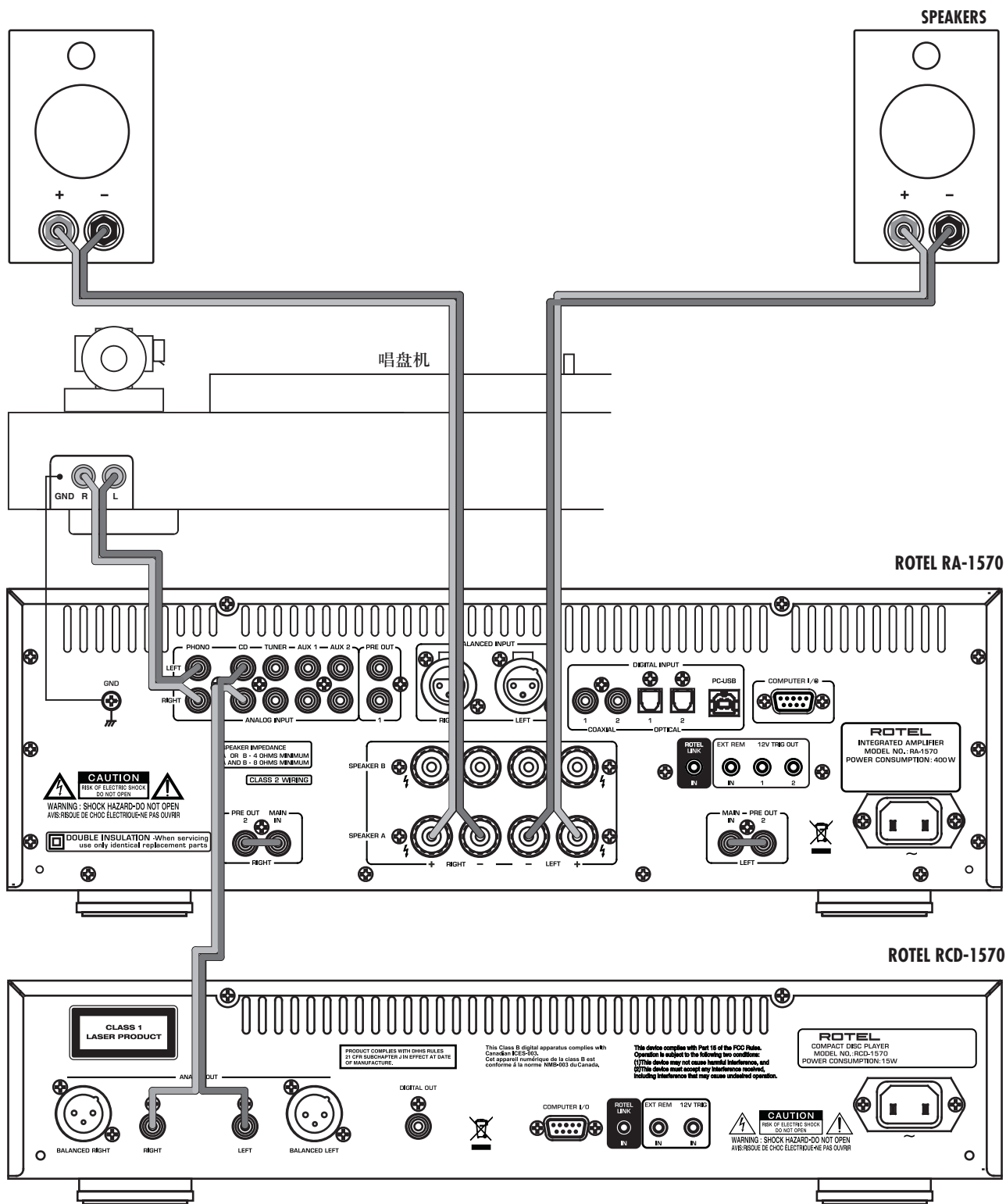


图4：平衡(XLR)输入

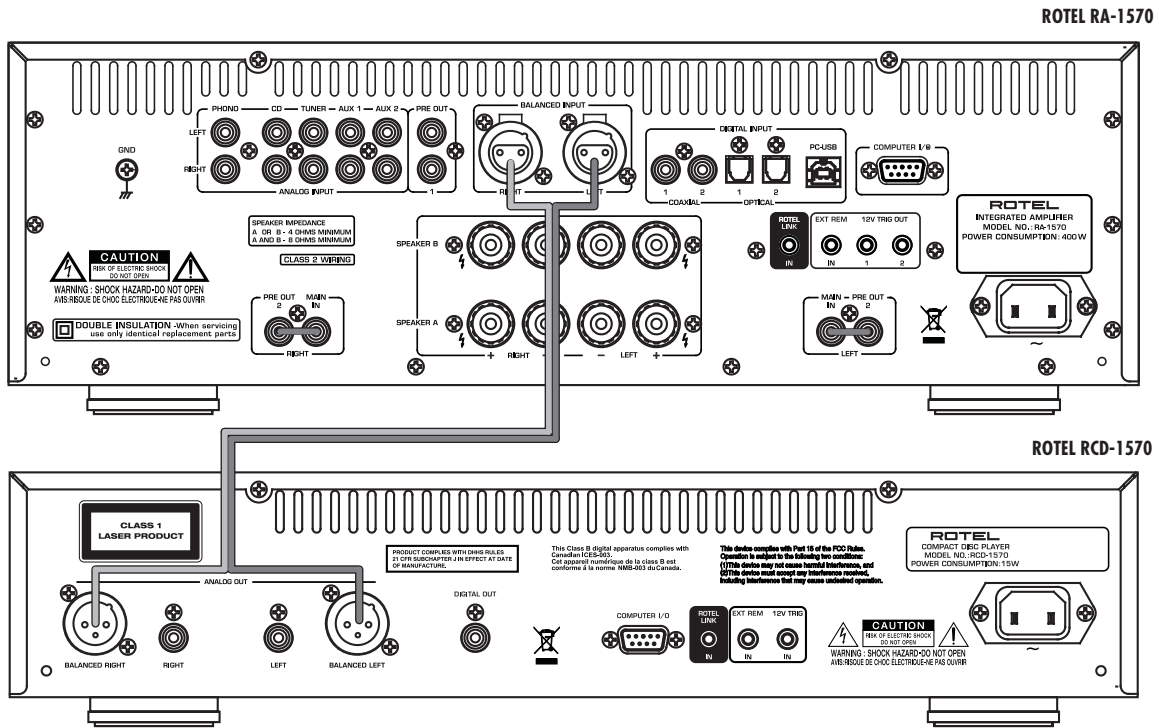
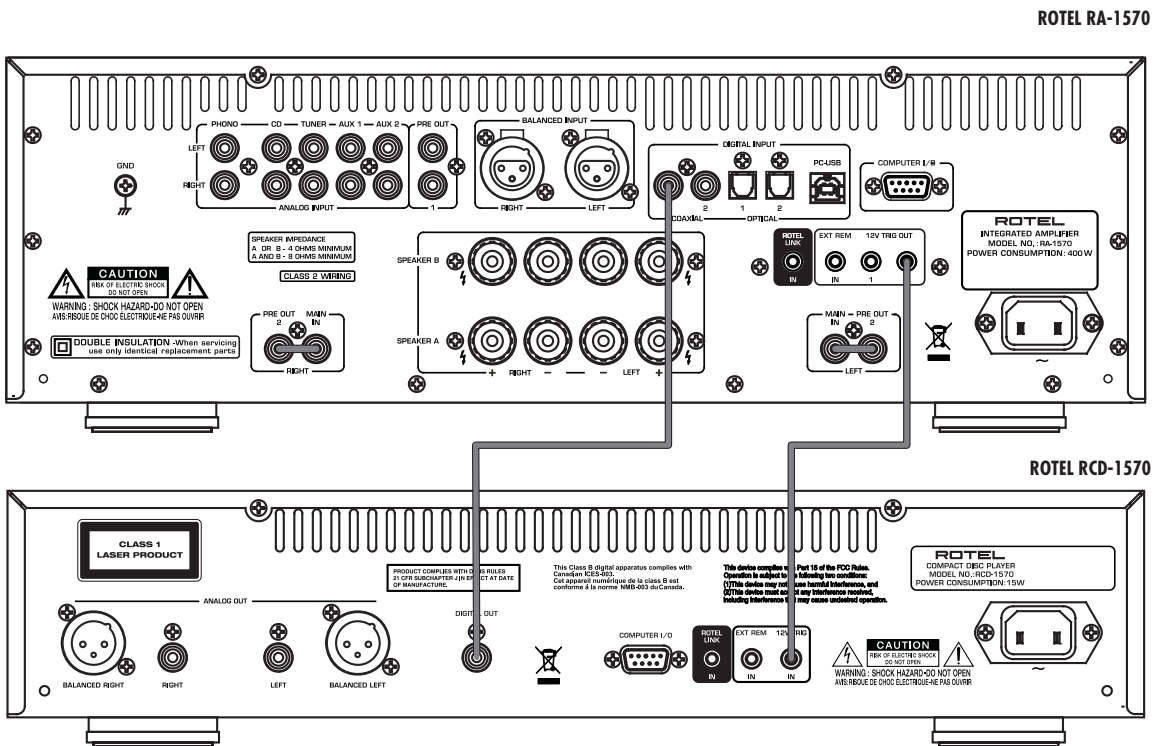


图5：数字输入和12V触发连接



重要注意事项

进行连接时，请确保：

- ✓ 连接任何设备（包括音箱）之前，应关闭系统中所有设备的电源。
- ✓ 改变系统的任何连接之前，应关闭系统中所有设备的电源。

我们还建议您：

- ✓ 打开或关闭放大器之前，将放大器的音量控制调到最低。

目录

重要安全说明	15
图1: 控制和连接	16
图2: RR-AX92遥控器	16
图3: 模拟输入和音箱输出连接	17
图4: 平衡(XLR)输入	18
图5: 数字输入和12V触发连接	18
重要注意事项	19
关于洛得	20
功率简介	20
开始使用	21
几点注意事项	21
放置	21
电缆	21
RR-AX92 遥控器	21
遥控器电池	21
交流电源和控制	21
交流电源输入 20	21
电源开关和电源指示灯 1	21
12V触发连接 19	21
输入信号连接	22
唱盘机输入 10 和地线连接(GND)	22
线性电平输入 10	22
平衡(XLR)输入 12	22
数字信号输入 13	22
前置放大器输出 11	22
前置/后级放大器跳线 15 16	22
音箱输出 16	22
音箱选择	22
音箱线	22
极性和相位	22
音箱连接 16	22
耳机输出 5	22
遥控感应器 2	22
显示屏 3	23
前面板USB输入 6	23
蓝牙连接	23
音频控制	23
音量控制 4 B	23
均衡控制 9 C	23
音调控制旁通 K	23
低音和高音控制 9 C	23
功能控制 8 J	23
PC-USB 输入 13	23
Computer I/O (计算机输入/输出) 接口 14	23
ROTEL LINK 17	23
EXT REM IN (外接遥控输入) 插孔 19	23
保护电路	23
设置菜单	23
故障排除	24
电源指示灯不亮	24
更换保险丝	24
没有声音	24
技术参数	25

关于洛得

洛得已有超过50年的历史。几十年来，我们的产品已赢得数百次奖项，满足了无数对娱乐有着严肃态度的人士——比如您。

洛得是一个家族公司，他们对音乐的激情让他们致力于制造高品质的高保真音响设备。多年以来，这种激情丝毫未减，而为不同预算的高保真音响发烧友和音乐爱好者提供超值产品的目标，是洛得所有员工的共同追求。

洛得的工程师紧密协作，认真倾听并精确调谐每个新产品，直到其符合苛刻的音乐标准。他们从世界各地选择部件，以令其产品尽善尽美。您可能会发现英国和德国生产的电容器、日本和美国产的半导体，以及洛得自己的工厂制造的环形功率变压器。

我们十分关注环境。随着越来越多的电子产品出现，随后被废弃，制造商竭尽所能设计对垃圾填埋场和地下水位带来最低负面影响的产品就显得尤为重要。

在洛得，我们做到了这一点，我们对此深感自豪。通过使用特殊的ROHS焊料，我们降低了电子产品中的铅含量，同时，我们最新的D类（非数码）放大器的效率是传统设计的五倍之多，同时仍可提供大功率和很高的性能。这些产品运行时温度低，能源浪费少，不损害环境，并带来更好的音质。

最后，我们用可回收的纸张印刷本手册。

虽然我们知道这些事情微不足道，但它们对环保仍然非常重要。我们会继续寻找新的方法和材料，开发更加清洁、更加环保的制造工艺。

洛得的全体同仁感谢您购买本产品。我们深信，本产品将为您带来数年的美妙享受。

功率简介

两个声道均以最大功率运作时，本放大器的额定功率输出为每声道120W。根据洛得的经验，这个功率可提供接收机或放大器功率容量最真实的数值，因此，洛得选择以这种方式标注功率输出。

与其它产品的规格参数相比，您会发现它们通常以其它方式标注功率输出，让您无法对其它进行比较。例如，它们提供的功率输出可能只是一个声道工作时的功率输出，从而给出一个更高的最大数值。

音箱的额定阻抗表示它们连接到放大器时提供的电阻或负荷，通常为8Ω或4Ω。阻抗越低，音箱需要的功率更高。实际上，一只阻抗为4Ω的音箱所需要的功率为8Ω音箱的两倍。

但是，洛得放大器的设计可使用阻抗介于8Ω和4Ω之间的任何音箱，所有声道均可以最大功率运作。由于洛得的设计已针对所有声道同时工作进行了优化，洛得可为两个声道指定真正的功率输出。

开始使用

感谢您购买洛得RA-1570立体声合并式放大器。配合高质量的音乐音频系统使用，本装置可为您提供多年的音乐享受。

RA-1570是功能齐备、品质上乘的设备。设计的各个方面已进行优化，以获得音乐的全部动态范围和细微差别。其配有高度规范的电源，带有洛得自行设计的环形电源变压器和定制的slit foil电容。低阻抗的电源有充足的电力储备，使其能够轻松再现要求最苛刻的音频信号。这种设计制造起来更加昂贵，但对于音乐来说效果更佳。

印刷电路板使用对称电路线路（Symmetrical Circuit Traces）设计。这可确保获得并忠实再现精确的音乐时间。RA-1570的电路在重要的信号通道使用金属薄膜电阻和聚苯乙烯或聚丙烯膜电容器。这种设计的各个方面均已进行测试，确保最忠实地再现音乐。

RA-1570的主要功能均易于安装和使用。如果您有使用其它立体声系统的经验，您会发现一切均易如反掌。只要插上关联的设备，就可以开始欣赏音乐了。

几点注意事项

警告：要避免可能造成系统的损坏，进行连接或断开音箱或相关组件之前应关闭所有系统组件。确保所有连接均正确和安全后再开启系统组件。请特别注意音箱线。确保没有松开的线束与其它音箱的电线或放大器的机架接触。

请仔细阅读本手册。本手册提供如何将RA-1570连接到系统的完整资料，以及可帮助您获得最佳音响效果的全面资料。如果您遇到任何问题，请联系洛得授权经销商。另外，洛得全体同仁欢迎您提出问题或建议。

请保存好RA-1570的包装箱和包装材料，以备日后使用。使用任何非原始包装材料运输或移动你的放大器可能导致严重损坏。

请填写并寄回RA-1570包装中的用户注册卡。另请保留原始销售收据。它是购买日期的最佳记录，您日后需要保修时会用到它。

放置

跟所有处理低电平信号的音响设备一样，此放大器也会受环境的影响。避免将此放大器放在其它设备的上面。也要避免将音频信号线置于电源线附近。这可将噪音或受干扰的机会降至最低。

RA-1570在正常工作过程中会产生热量。放大器中的散热器和通风口用于排出热量。上盖的通风口应该打开。为防止放大器过热，机身周围应有10cm (4in.)的间隙，且安装位置应有适度的气流通过。

选择安装地点时应考虑放大器的重量。请确保机架或机柜能够承载本设备的重量。本公司建议将放大器安装在为安装音响器材设计的家具内。这些家具可以降低或减少对声音质量产生负面影响的振动。设备家具和音频设备的正确安装方法，请咨询授权洛得经销商。

随RA-1570一同提供了一只RR-AX92遥控器，遥控器必须放置在遥控器发出的红外信号可以到达播放机前面板遥控感应器的地方。

电缆

将电源线、数字信号电缆和音频电缆分开放置。这可将音频信号电缆从电源线或数字信号线拾取噪音或干扰的机会降至最低。使用高质量的屏蔽电缆也有助防止噪音或干扰。如果您有任何问题，请访问授权洛得经销商寻求有关最匹配您的音响系统的建议。

RR-AX92遥控器

有些功能可以通过前面板控制器，或者随本放大器提供的遥控器 RR-AX92 进行操作。本说明书中的功能操作说明里，方框中的数字表示前后面板控制上的项目，圆圈中的字母表示遥控器图示上的项目。

注意：遥控器可以操作一些洛得调谐器和CD播放机的基本功能。控制器按键 **Ⓞ** **Ⓜ** **Ⓝ** 可用于操作您系统里的CD机和调谐器。要使遥控器正常操作，请确保遥控器和CD机或调谐器的遥控代码均一致。

遥控器电池

使用遥控器前应该安装两节UM-4/AAA尺寸的电池（已提供）。要安装电池，拆下RR-AX92遥控器背部的电池仓盖。按电池上的正负极标示正确安装电池。测试遥控器是否操作正常，然后盖上电池仓盖。电池电力不足时，遥控器无法正常操作RA-1570。更换新电池即可解决此问题。

交流电源和控制

交流电源输入

由于RA-1570的高电源功率，它会产生大量电流。因此，应该将本设备直接插到墙上的两极插座。不要使用延长线。如果大功率多插孔插线板（和墙插座）可以承受RA-1570和所有插到上面的其它器材，则可以使用多插孔插线板。

RA-1570出厂时已设置为您购买本产品所在国家的交流电压(美国：120 V/60Hz AC，或欧洲：230 V/50 Hz AC，中国：220V/50Hz AC)。交流电压配置标注在后面板的标签上。

注意：如果将RA-1570带到另一个国家，可能需要重新设置以使用不同的电压。不要试图自行进行转换。打开放大器的外壳会有触电危险。请咨询合格的维修人员或洛得工厂服务部门寻求帮助。

注意：有些产品将出售于多个国家，因此提供了多条AC电源线，请选择一条适用于您国家/地区使用的电源线。

如果您将要离家较长时间，例如一个月，离开前请务必拔下放大器（和其它音频视频设备）的电源插头。

电源开关和电源指示灯

要打开放大器的电源，将本开关接入。电源打开时，电源按键周围的指示灯会变亮。要关闭放大器，再次按下按键将其复位。

电源开关位于开的位置时，可以使用遥控器上的开（ON）和关（OFF）键激活放大器。在待机模式中，电源键周围的指示灯亮，但显示屏关闭。

12V 触发连接

一些音频组件当接收到12V开启“信号”时可以自动打开组件。RA-1570有两个12V触发器提供所需的信号。用3.5mm迷你插头电缆连接RA-1570和相应兼容的组件。当RA-1570在关闭后，触发信号被中断，外接的组件会被关闭。

注意：在使用Rotel link系列的其它设备时，请用Rotel link 来开/关设备。不要同时连接Rotel link和12V 触发电缆，否则12V 触发器的开/关电源功能将会覆盖Rotel link连接功能。

输入信号连接

见图 3,4,5

注意：要避免高噪声对您和音箱的影响，进行任何信号连接之前，应关闭所有系统组件。

唱盘机输入和地线连接(GND)

见图3

将电缆从唱机插入适当的唱机左右声道输入。如果唱机有“地线”连接，将其连接到唱机输入左侧的螺丝端口。这可以帮助避免嘈杂声和噪声。

线性电平输入

见图3

CD, Tuner, 和 Aux输入为“线性电平”输入。这些输入用于连接CD播放机或其他音频播放设备的模拟音频输出。

左右声道均已清晰标记，且应连接到源设备的相应声道。左RCA声道接口为白色，右声道接口为红色。使用高质量RCA电缆将节目源设备连接到放大器。有关电缆的建议，请咨询授权洛得经销商。

平衡(XLR)输入

见图4

有一对平衡(XLR)输入可接收来自CD播放机、蓝光播放器或其他源设备平衡输出的音频信号。

注意：请只选择一种模拟方式连接RA-1570，不可同时连接RCA插孔和XLR插孔。

数字信号输入

见图5

有两组标注COAX 1和 2, OPT 1和2的数字输入。将您源设备的同轴(COAXIAL)或光纤(OPTICAL)输出连接到这些接口。放大器对数字信号进行解码并播放。该设备可以解码高达24位 192kHz的PCM信号。

前置放大器输出

本放大器设有一对前置放大器输出标记为PREOUT 1，通过功能选择对相应的源信号进行输出。PREOUT 1输出通常用于提供一个到另一个合并式放大器或功率放大器提供用于驱动遥控音箱的信号。

注意：更改音量、均衡或音调控制的设定都会影响前置放大器输出的信号。

前置/后级放大器跳线

标记为“Pre Out 2”和“Main In”的接口通常是由一组硬金属跳线连接。这些接口为众多信号处理器提供快捷方便的接入点。要使用这些接口，请先把跳线拔出。使用高品质电缆，将信号处理器的输入端连接到“Pre Out 2”接口，将输出端连接到“Main In”接口。

音箱输出

见图3

RA-1570有两套音箱输出连接，分别标记为SPEAKER A和SPEAKER B。音箱输出可由前面板按键和遥控器按键进行控制。

音箱选择

如果在任何指定时间内只使用一套音箱，音箱的阻抗最低为4Ω。如果您有时候您同时使用A和B音箱，则所有音箱的阻抗应为8Ω或以上。音箱并联的实际阻抗低于单个音箱的额定阻抗。实际上，极少有音箱在与放大器配合使用时会出现问题。如果有任何疑问，请咨询授权洛得经销商。

音箱线

使用绝缘的双导线连接放大器和音箱。电线的大小和质量可能会对系统的性能产生明显的效果。标准的音箱线也能正常使用，但是可能会导致输出降低或减少低音响应，尤其是在距离较远的情况下。通常，重量更重的线会提升音质。为得到最佳效果，您可能需要考虑特别的高质量音箱电缆。洛得授权经销商可以帮助您为您的系统选择合适的电缆。

极性和相位

每个音箱的极性连接的正/负方向(+/-)和放大器连接应保持一致，以确保所有音箱在相同相位上。如果一个连接接反，低音输出会非常微弱，立体声效果会降低。所有音箱线上均有标记，您可以区别两根导线。在一股导线的绝缘套上可能有小标签。电线绝缘套内的导线可能有不同颜色(铜或银)。绝缘上可能印有极性标记。找到正负导线，并确保每个音箱和放大器的连接一致。

音箱连接

连接音箱前请关闭系统中所有设备的电源。放大器的后板上有以颜色区分的音箱接线柱。这些接线柱可以连接裸线或接线插片(在非欧盟市场，接线柱还可以连接双香蕉型接头)。

将电缆从放大器连接到音箱上。要留有足够的余地，以便可以移动设备以连接到音箱接线柱上。

如果您使用香蕉型插头，先将插头接到线上然后插到接线柱后面。应拧紧音箱接线柱上的套环(顺时针)。

如果使用接线插片，将其连接到电线上。如果您直接将裸线连接到接线柱上，请分开电线的导线，并自每根导线的端头将绝缘剥去。请小心不要将导线切断。将接线柱的套环拧开(逆时针方向)。将接线片或导线绕在接线柱轴上。顺时针拧紧套环，固定接线片或线头。

注意：请确保没有松开的线束与邻近的电线或导线接触。

耳机输出

Phones(耳机)输出可让您连接耳机独自欣赏音乐。本输出插孔可以使用标准立体声1/8in.插头。插入耳机不会切断发送到音箱的信号。可使用音箱选择旋钮切断输出到音箱的信号，单独用耳机欣赏音乐。功能选择的设置将决定收听的源信号。

注意：由于音箱和耳机的灵敏度会有很大差异，在连接或断开耳机之前请先降低音量。

遥控感应器

遥控感应器接收来自遥控器的红外信号。不要覆盖或遮挡感应器。

显示屏

前面板上的发光显示屏提供有关输入源、音量和音调设置。

前面板USB输入


前面板USB输入可连接 iPod, iPhone, MP3播放器或蓝牙适配器（已提供）播放无线流媒体。与iPod或iPhone连接时，只需将其插到前置USB插口然后选择USB功能。保持iPod和iPhone运行，像往常一样搜索和播放音轨，音乐就能通过洛得放大器播放。

蓝牙连接





将随机提供的蓝牙适配器插到前面板USB插口，通过蓝牙，把无线流媒体从您的设备（如移动电话）传输到放大器。从您的移动设备搜索到“Rotel Bluetooth”并连接。通常是自动连接，但如果提示需输入密码，请输入“0000”，再按遥控器的ENT（如有必要）和您设备上的确认键即可。

音频控制



音量控制

顺时针旋转前面板上的VOLUME（音量）旋钮增加音量，或逆时针转动音量旋钮降低音量。或者，按遥控器上VOLUME（音量）+或-键调节音量。按MUTE （静音）键可关闭声音。

均衡控制

均衡控制可调整声音输出的左-右均衡。通常，本控制应置于中间位置或“0”。要从前面板更改均衡，按MENU（菜单）键将前面板显示切换至均衡设定模式。然后再按前面板上的+或-键调整左右均衡。该均衡值可从L15调至R15。要从遥控器更改均衡，按BAL 键进入均衡设置菜单，然后按LEFT或RIGHT 键进行调整。调整完毕后按EXIT 键退出菜单。

音调控制旁通

低音和高音控制（音调控制）电路出厂默认设置已被旁通，以获得最纯净的声音。前面板显示屏将显示TONE BYPASS(音调旁通)。在遥控器上按BYPASS 键打开音调控制。或从前面板按MENU键切换到旁通控制，然后按LEFT或RIGHT键打开或关闭旁通。

低音和高音控制

要设置低音或高音控制，按前面板MENU键切换到低音或高音设置菜单。然后按-或+键调整音调值，音调值范围为-10至+10。或按遥控器上Bass或Treble 键，再按LEFT或RIGHT键调整音调值。

经过适当设置的高性能音频系统可产生最自然的声音，而无需调整或只需作细微调整。请谨慎使用这些控制。向上调整控制按钮时请特别小心，这将加大低音或高音范围的功率输出，从而增加放大器和音箱的负载。

注意：在设置低音或高音时，不要自动打开音调控制。要打开音调控制请参考上节音调控制旁通。

注意：音调旁通、低音、高音和均衡设置均为临时性设置，关闭电源后则不被保存。如需永久保存设置请详见设置菜单。

功能控制

本功能控制可选择输入信号源。按下前面板或遥控器上相应的音源按键选择您想收听的音源。

PC-USB输入

使用提供的USB电缆把本PC-USB输入连接到您计算机的USB插口。

注意：您需要在计算机上安装USB驱动程序（随机光盘上已提供），使计算机能将音频通过USB发送到RA-1570。

注意：成功安装驱动程序后，需要从计算机的音频/音箱设置中选择ROTEL 音频驱动。

Computer I/O(计算机输入/输出)接口

RA-1570可通过RS232的控制与自动化系统进行集成。COMPUTER I/O 输入使用标准的DB-9插头电缆。

更多有关RA-1570计算机控制的连接、软件和操作代码的资料，请咨询授权洛得经销商。

ROTEL LINK

这个3.5毫米立体声迷你插孔（标有ROTEL LINK IN）与ROTEL LINK OUT连接，可让RA-1570与带网络功能的洛得产品相互连接。这样相连接的洛得产品可相互通讯并可通过Rotel Remote App（洛得遥控应用程序，可从iTunes®商店下载）进行控制。

EXT REM IN(外接遥控输入)插孔

这个3.5毫米微型插孔通过硬线连接接收来自工业标准红外接收器的命令代码。当本装置安装在机柜中且前面板的感应装置被遮挡时，本功能非常有用。请咨询授权洛得经销商寻求有关外接转接器的资料 and 正确连接插头到小型插座的方法。

保护电路

本放大器装有过热和过流保护电路，避免在过度或错误操作的情况下受到损坏。保护电路独立于音频信号，对音质表现没有影响。相反，保护电路监控输出装置的温度，如果温度超出安全限度，将关闭放大器。

一般的正常操作不会激活此保护电路。但是，如果出现故障情况，放大器将停止播放，且前面板上的显示屏会显示“AMP PROTECTION”。

发生这种情况时，关闭放大器电源，让其冷却几分钟，并尝试确定及解决该问题。重新打开放大器时，保护电路自动重置。

大多数情况下，保护电路由于错误情况例如音箱电线短路或通风不畅引起温度过高而激活。在极罕见的情况下，高度灵敏的或太低的音箱阻抗负载可能造成保护电路介入。

如果保护电路重复触发，而且您无法屏蔽并解决故障，请联络授权洛得经销商帮助解决问题。

设置菜单

您可以通过前面板MENU **[]**键或按遥控器上的MENU **[]**键进入设置菜单。按前面板+/- 键或遥控器LEFT/RIGHT(左/右) **[]**键修改选项值。按前面板上的MENU **[]**或遥控器上的MENU **[]**进入子菜单。

- Tone Control 音调控制：TONE BYPASS (音调旁通) ON (启用) / OFF (禁用)、BASS(低音)和TREBLE(高音)值均可按所需设置。通过前面板ENTER键或遥控器ENT键切换音调选项。(更多有关音调控制的资料请参考音调控制旁通、低音和高音控制部分)。

注意：关闭RA-1570的电源后，这些设置将被永久保存。

- BALANCE 均衡：改变左/右均衡 (参考均衡控制部分)

注意：关闭RA-1570的电源后，这些设置将被永久保存。

- DIMMER 调光器：可调暗显示屏，共7阶。也可通过遥控器DIM **[]** 键作暂时修改。

注意：关闭RA-1570的电源后，这些设置将被永久保存。

- ROTEL LINK RCD,可选择放大器与CD播放器的连接方式，任一CD(模拟)、COAX1 (同轴1) 或COAX2 (同轴2)。出厂默认设置为CD。

- POWER ON MAX VOLUME 开机最大音量：设置当开启设备时的最大音量，出厂默认值是“45”。

- Fixed Gain 固定增益：为指定的输入配置固定的音量电平。要启用此功能，请按+/-键选择Aux 1、Coax 1、Optical1、PC-USB或USB输入所需的固定音量电平。启用本功能并选定了相应输入的固定音量后，音量将立即设置到指定的音量电平。

可选用的设定包括：VARIABLE (可变)、FIXED1-95 (固定值1-95)、FIXED MAX (固定最大值)。

注意：当音量电平被固定时，前面板的音量旋钮和遥控器上音量+/-键均不可用。要禁用此功能，请将音量电平设为“Variable”(可变)。

- AUX1 VOL: 出厂默认设置为 VARIABLE 可变 (禁用)。
- COAX1 VOL: 出厂默认设置为 VARIABLE 可变 (禁用)。
- OPT1 VOL: 出厂默认设置为 VARIABLE 可变 (禁用)。
- PC-USB VOL: 出厂默认设置为 VARIABLE 可变 (禁用)。
- USB VOL: 出厂默认设置为 VARIABLE 可变 (禁用)。
- PC-USB AUDIO CLASS: 设置与PC-USB所连接设备的音频类别。

注意：有些连接到PC-USB的计算机并不支持USB 2.0音频或不支持24/192音频播放。如有需要，可设置PC-USB为USB 1.0音频。详情请查询您计算机的操作系统。

- Software version 软件版本：可显示当前加载到放大器的软件版本。
- FACTORY DEFAULT 恢复出厂设置：此设置将会使设备恢复到最初出厂的状态。按前面板上的+键或遥控器的Right (右) 键选择<YES>，然后再按前面板上的“ENTER”键或遥控器上的“ENT”键进行恢复出厂设置。

故障排除

音响系统的多数故障是由于错误连接或控制设置不正确引致。如果您遇到问题，请屏蔽有问题的区域，检查控制器设置，确定故障原因并进行必要的修正。如果放大器仍然没有声音，请参考以下状况的建议：

电源指示灯不亮

放大器插到墙壁电源插座并且电源键被打开时，电源指示灯和显示窗口的基本项目应该点亮。如果没有点亮，用其它电气设备例如台灯测试电源插座。确保电源插座没有被已断开的开关控制。

更换保险丝

如果其它电气设备插到该插座时可正常工作，但放大器插到同一插座且电源开关打开时电源指示灯不亮，表明内置保险丝可能已烧断。如果您确信发生这种情况，请联络授权洛得经销商更换保险丝。

没有声音

检查信号源，看其是否正常工作。确保连接信号源和放大器的输入的电缆已正确连接。检查放大器和音箱之间的连线。

技术参数

连续功率输出 (20-20 kHz, < 0.03%, 8 Ω)	120W/声道
总谐波失真 (20Hz-20kHz)	
额定功率、1/2功率或1W时	< 0.03%
互调失真 (60 Hz : 7 kHz, 4:1)	
额定功率、1/2功率或1W时	< 0.03%
频率响应	
唱盘机输入	20Hz-20kHz, ±0.5dB
线性电平输入	10Hz-100kHz, +1, -3dB
阻尼系数 (20Hz-20kHz, 8 Ω)	180
输入灵敏度/阻抗	
唱盘机输入 (MM)	2.25mV / 68k Ω
线性电平输入 (非平衡)	285mV / 100k Ω
线性电平输入 (平衡)	570mV / 50k Ω
输入过载	
唱盘机输入	30mV
线性电平输入	4V
前置放大器输出/阻抗	1.5V / 470 Ω
信噪比 (IHF "A" 加权)	
唱盘机输入	80dB
线性电平输入	100dB
数字部分	
频率响应	10Hz - 95k Hz (±3.0dB, Max)
信噪比 (IHF "A" 加权)	100 dB
输入灵敏度/阻抗	0 dBfs / 75 Ω
前置放大器输出/阻抗	1.2 V/ 470 Ω (at -20 dB)
USB/iPod 数字信号	WAV, MP3, WMA (高达 48kHz 16 bit)
同轴/光纤数字信号	SPDIF LPCM (高达 192kHz 24 bit)
PC-USB	USB Audio Class 1 (高达 24/96) USB Audio Class 2 (高达 24/192)* *需安装驱动
电源要求:	
美国	120 V, 60 Hz
欧洲	230 V, 50 Hz
中国	220 V, 50 Hz
功率消耗	400 W
待机功耗	< 0.5 W
尺寸(宽 x高 x深)	431 x 144 x 350 mm
前面板高度	132.6mm
重量(净重)	13kg

本手册印刷时所有参数均属精确。
 洛得保留修改的权利，恕不另行通知。

Rotel 和 Rotel Hi-Fi 标记是日本东京洛得有限公司的注册商标。

ROTEL®

中国洛得

珠海保税区洛得电子有限公司

地址：中国广东省珠海市珠海保税区第27号区域

电话：0756-8936088

传真：0756-8936222

The Rotel Co. Ltd.

日本洛得

Tachikawa Bldg. 1F.,

2-11-4, Nakane, Meguro-ku,

Tokyo, 152-0031

Japan

Rotel of America

美国洛得

54 Concord Street

North Reading, MA 01864-2699

USA

电话：+1 978-664-3820

传真：+1 978-664-4109

Rotel Europe

欧洲洛得

Dale Road

Worthing, West Sussex BN11 2BH

England

电话：+ 44 (0)1903 221 761

传真：+ 44 (0)1903 221 525

Rotel Deutschland

德国洛得

Vertrieb: B&W Group Germany GmbH

Kleine Heide 12

D-33790 Halle/Westf., Deutschland

电话：05201 / 87170

传真：05201 / 73370

电邮：info@bwgroup.de

www.rotel-hifi.de

www.rotel.com

“Made for iPod”和“Made for iPhone”，是指电子配件专门为连接至iPod或iPhone而设计，开发商的认证满足Apple性能标准。Apple不负责该设备的操作或安全和监管标准。请注意，iPod或iPhone配件的使用可能会影响无线性能。iPod或iPhone可能会影响无线性能。

iPhone、iPod、iPod classic、iPod nano和iPod touch 均属苹果公司商标，已在美国和其他国家注册。

Made for



iPod



iPhone