

Thank you for selecting an MF5600 five channel amplifier to power your home entertainment audio system. This amplifier draws on more than two decades of research at conrad-johnson into the reproduction of recorded music. The result is a power amplifier with a remarkable ability to recreate the the dynamics, textures, tonalities, and ambience of both musical performances and motion picture soundtracks.

At conrad-johnson, we expect our products to be a source of satisfaction and of pride to their owners for many years to come. Accordingly, circuit designs, parts and materials for all conrad-johnson products are selected with a view to maintaining optimal performance over the years. Our reputation for producing among the industry's most reliable components is a natural consequence of this engineering approach.

Although operation of the MF5600 amplifier is quite straightforward, please take a few minutes to read this manual for useful information on installation and operation.

In closing, we'd like to welcome you to the family of conrad-johnson owners. We want you to enjoy your conrad-johnson product to the fullest. To this end, our staff stands ready to answer any questions you may have about the function and application of your MF5600 five channel amplifier, and to provide any needed service both during, and after the warranty period. Our goal is to heighten your enjoyment of recorded music.

Limited Warranty For Conrad-Johnson Components

conrad-johnson design, inc. will provide service under warranty to the original owner on products sold new in the United States for the lesser period of three years from the date of purchase by the original purchaser, or five years from the date of shipment to the authorized conrad-johnson dealer. During the warranty period, conrad-johnson will repair defective units without charge for labor or parts (with the exception of vacuum tubes and batteries).

Exclusions. The following are not covered under this warranty:

- a) Units which have been damaged by misuse, abuse, or accident.
- b) Units which have been modified, altered, or improperly repaired by anyone not specifically authorized by conrad-johnson design, inc.
- c) Units not purchased from an authorized conrad-johnson dealer in the United States for use in the United States.
- d) Normal wear.
- e) Incidental or consequential damages are not covered under this warranty. Some states do not allow the exclusion of incidental or consequential damages, so this exclusion may not apply to you.

Obtaining Warranty Service: To obtain warranty service, the unit must be shipped, along with evidence of purchase, in factory packing to conrad-johnson design (or designated service center) with freight and insurance prepaid by the owner. After repair, the unit will be returned with freight and insurance prepaid by conrad-johnson design to any destination in the United States.

All implied warranties, including merchantability and fitness for a particular purpose are limited in duration to the duration of this express warranty. Some states do not allow limitations on the duration of implied warranties so the above limitations may not apply to you.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

Conrad-Johnson products purchased outside the United States are covered by warranty terms of the importing distributor in the country in which the product was originally purchased, which may differ from the terms set out herein. Importing distributors are not obligated to provide warranty service for products originally purchased outside their country. Conrad-Johnson will provide warranty service for products outside the

United States, but the customer must pay all shipping, handling and customs costs both to and from our Service Department.

Questions about this warranty should be addressed to:

Service Department
conrad-johnson design, inc.
2733 Merrilee Drive
Fairfax, VA 22031

The Service Department can also be reached by phone at 703-698-8581, or by fax at 703-560-5360

Service

If your conrad-johnson audio component requires service, repack it using the original box and packing material and ship to the Service Department address above. Boxes and packing materials can be obtained from our service department for a nominal charge if you no longer have yours. Include with the unit a note describing the problem you are having in as much detail as possible. It is especially important for our technician to know if the problem is intermittent. If you want an estimate of cost for out of warranty service, be sure to request it in this note. Be aware that requesting an estimate will delay service to your unit as we will have to contact you for your approval before commencing service.

Registering The Warranty

Please return the enclosed card to the factory within 30 days of purchase to register the warranty.

***I*nstallation**

As is the case with any high-power amplifier, the MF5600 five channel amplifier dissipates a significant amount of heat. Provision must be made for adequate ventilation. Mount the unit on a flat, hard surface, taking care that the ventilation holes in the bottom are unobstructed. Maintain at least four inches of clearance above the unit, and at least three inches on the side with the heatsink. The cabinet or shelf should be open at both front and back. For more restricted installations, cooling fans are essential.

All MF5600 five channel amplifiers sold in the United States are configured for operation on a 60Hz ac power line producing between 108 and 126 volts. Export versions of these amplifiers will have the correct operating voltage and frequency clearly marked on the back panel of the unit, near the ac power cord. In all cases, the actual line voltage should be within + 5/- 10% of the nominal rated voltage.

Electromagnetic Interference (EMI)

Considerable care has been taken in the design of the MF5600 to minimize susceptibility to radio frequency interference and other forms of EMI. Choice of materials, physical layout, grounding practice, and power supply design have all been specified with a view to reducing the impact of electromagnetic fields on the performance of this unit. At the same time, however, our primary goal is the accurate reproduction of recorded music in the normal home environment, and we have elected not to compromise this objective by the application of heavy-handed RFI filters, or by using grounding practices that reduce RFI at the expense of degraded audio performance. We find that the approach we have taken has worked extremely well, resulting in only rare instances of EMI problems which could be treated locally as needed, rather than compromising the performance of our product in the 99.9% of installations where EMI is not a problem.

Care in installation can often avoid EMI induced problems. The following practices should generally be observed in any application, and will be especially important where EMI may be a problem.

Interconnect cables should be kept as short as possible (3 meters or less), and shielded cable should be used (cable which has two center conductors, and a separate external shield connected at only one end).

Physical location and cable "dress" can be an important factor in minimizing hum pickup. The installation should situate the preamp/surround sound processor well away from the power amplifier, and power (ac mains) cords should be dressed to remain at least 4" (100mm) away from input/output cables.

Connection

INPUT: Connect the preamplifier or surround sound processor/preamp to your amplifier at the RCA type connectors located on the back of the amplifier. For convenience, these inputs are labeled RF (right front), RR (right rear), CENTER, LF (left front) and LR (left rear). Associated output connections for each input are indicated by connecting lines printed on the chassis.

OUTPUT: Five way binding posts are provided for connection of your loudspeakers, with correct spacing to accept a standard "double banana" plug. They will also accept spade lugs, bare wire, or pin connectors. The five channels should be connected in correct "relative phase". This means that when the same signal is applied to all channels, all speaker diaphragms will move synchronously - in and out together.

Terminals on speakers are usually coded - one designated "C", "ground", "-" or black, the other designated "+" or red. "In phase" connection of the speakers can normally be achieved by taking care to connect the wire from the "+" amplifier terminal to the red or "+" coded terminal on each speaker, and connecting the "-" terminal to the black or "-" coded terminal on each speaker.

REMOTE TURN-ON: Your MF5600 features a circuit to switch the amplifier on in response to an applied dc voltage - a facility incorporated in many home-theater processors. Connect a pair of wires ("zip" cord or similar light-weight wire will work fine) from the controlling unit (eg. your surround sound processor) to the Remote Turn-On terminal strip on the back of your MF5600. Be sure to observe the indicated polarity. Switch the associated toggle switch to the remote turn-on position. When a dc voltage between 5 and 15 volts (supplied by your control unit) is applied to the MF5600's turn-on circuit, the amplifier will switch on. When the dc

voltage is removed, it will switch off. You can over-ride the remote feature by turning the amplifier off using the main ac power switch on the front panel.

The Importance Of Wires

Interconnect and speaker wires are an important element in your home entertainment system. Interconnects are available which will permit a reference quality system to blossom and fulfill its promise of musical reality. Others will strangle the system to the point where it becomes little better than average. To complicate matters, our experience suggests that the choice of interconnects will be system dependent - those that are top ranked on one system may be a poor choice for a different system. Consult your conrad-johnson dealer for recommendations for your specific system.

Trouble Shooting Tip

The output stages of the MF5600 are protected by fuses on the positive and negative power supplies (B+/B-). A fault condition in the load (shorting the speaker wires together, for example) will cause one or both fuses on the affected channel to blow. If you are getting no sound from a channel, or very distorted sound, check the B+/B- fuses associated with that channel. The fuse holders are located on the back of the amplifier. Unplug the amplifier before removing the fuses.

Questions:

If you have questions about the installation or function of your amplifier do not hesitate to call Customer Service at (703) 698-8581, or email us through our web site at www.conradjohnson.com.

Specifications:

Power: 5 x 120 watts per channel RMS into 8 ohms from 20Hz to 20KHz at no more than 1% total harmonic distortion or intermodulation distortion.

Sensitivity: MF5600 1.5 V to rated power

Phase: Phase correct (non-inverting)

Frequency response: 20Hz to 20KHz +0, -.25dB

Hum and noise: 95 dB below full power output.

Input impedance: 100K ohms.

Dimensions: 16.375D x 19W x 8H inches

Weight: 59 lbs.

Fuses: There are 11 fuses in the MF5600 Amplifier. One is the ac power line (mains) fuse. It is located in a fuse holder built into the ac power cord receptacle. To access this fuse, unplug the ac power cord, then remove it from the ac input socket on the back of the amplifier. Slide the fuse tray out, using a fingernail or small screwdriver. The other ten fuses are in the main DC power supplies. These are located on the back of the chassis in fuse holders above and to the right of the power cord, labeled B+ and B-. **Never replace a fuse with a value or type different from that originally supplied by the factory.** Correct values and types are listed below. In the event of a fuse blowing repeatedly, contact your dealer or the conrad-johnson service department.

Mains: (100/120 V mains) 10 amp, 5mm x 20 mm t-type
(220/240 V mains) 6.3 amp, 5mm x 20 mm t-type

B+/B-: 4 amp 3AG fast-blow