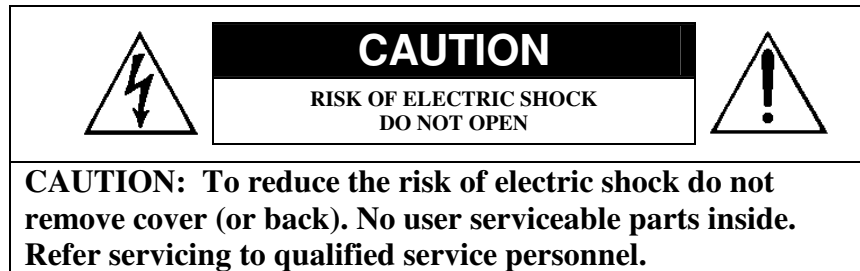


Warnings



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



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

SERVICE INSTRUCTIONS

CAUTION: This instruction sheet is for use by qualified service personnel only. To reduce the risk of electric shock, do not perform any servicing unless you are qualified to do so. These instructions require using the Zenith television model’s service manual in addition to these instructions.

BACKGROUND

The PDI converted 27” television utilizes an internal interface board for connection of a pillow speaker used to control the TV. These instructions provide step-by-step details for the TV’s repair and audio stage modification for improved reliability.

INSTRUCTIONS

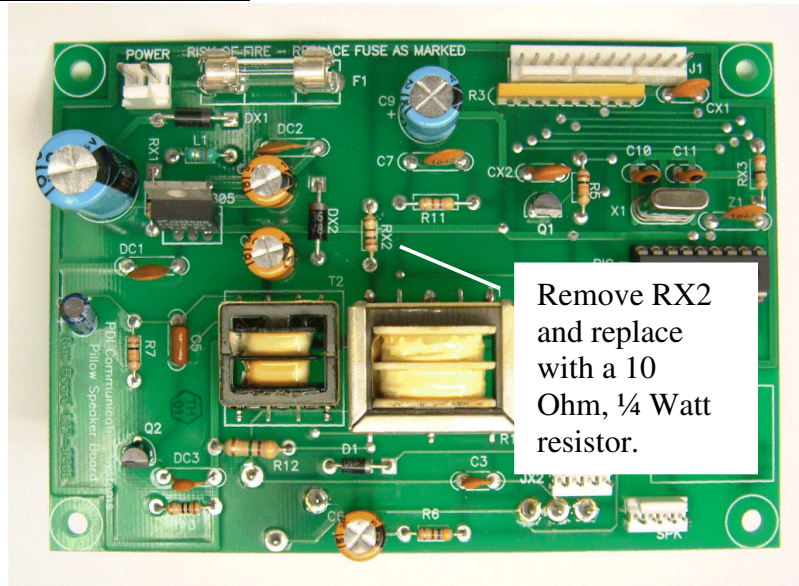
The instructions assume the TV has been removed from the patient’s room and has been placed on a workbench. The instructions also reference the Zenith service manual for this model TV.

1. Verify the TV’s power cord is disconnected from the AC power source. Then, remove the back cover. Refer to Zenith service manual for details.

MODIFY PILLOW SPEAKER BOARD

2. Locate the pillow speaker interface board attached to the connector panel on the back of the TV. Remove the board from the TV and expose the component side of the interface board.

Remove RX2 and replace with a 10 ohm, ¼ watt resistor provided in the repair kit.



3. Install the pillow speaker board back into the TV. Reconnect wire harnesses J1, POWER, and SPK.

TROUBLESHOOT TV CHASSIS



CAUTION: The remaining procedures require the TV to be powered and voltage measurements performed.

4. Turn the TV ON and measure the voltage on the collector of transistor QX3510. This transistor provides switched +14VDC to the audio amplifier stage of the TV. If the voltage is missing, replace the transistor with the KT1046 transistor included in the repair kit.
5. Disconnect wiring harness CN9S4 from the chassis. NOTE: this harness is located on the rear edge of the chassis. The male mating connector is a 4-pin style. Leave the wiring harness disconnected and tie the loose end to the neighboring wire harness CN9M4. Verify wiring harness CN9M4 is connected to the TV.
6. With the TV ON and displaying a picture, run the volume control up so that approximately 50% volume is shown on the volume bar display of the TV. Switch the toggle switch on the interface board back and forth and check for speaker sound from the TV.

7. If the TV does not have any audio, you will need to replace the audio amplifier IC800. If the TV has normal sound you are ready to close up the TV and perform functional and safety testing.

REPLACING AUDIO AMP IC800

8. Verify that the AC Line cord is unplugged from the power source.
9. Locate the audio amp IC800 on the chassis. Loosen and remove the heatsink screw from the IC's metal fin.
10. The 10-Pin audio amp IC, LA4261 can be replaced without removing the plastic chassis frame. Turn the chassis over and locate the amp IC800 on the solder side of the PCB. NOTE: The amp's pins are partly hidden by the plastic frame. Using the "Nimble" tool provided in the repair kit, trim away portions of the plastic frame and expose the soldered pins of the AMP. De-solder AMP IC800 and replace with a new amp LA4261 supplied in the kit.
11. Apply a dab of heatsink grease to the metal fin of the IC amp. Screw the new amp IC's fin to the heat sink.
12. Power the TV On and display a picture. Run the volume control up so that approximately 50% volume is shown on the volume bar display of the TV. Switch the toggle switch on the interface board back and forth and check for speaker sound from the TV.

CLOSE UP THE TV AND FINAL TESTING

1. Verify that the TV's plastic chassis tray is inserted into the bottom of the cabinet correctly.
2. Fit the back cover to the TV and attach with the original screws.
3. Attach the connector panel to the back cover using the single original screw.
4. Connect a TV CATV signal and a pillow speaker to the TV. Power the TV and verify both picture and sound.
5. Operated the toggle switch on the back of the TV and verify that audio switches between internal TV speaker and the external pillow speaker.
6. Operate and verify that the pillow speaker controls the TV.
7. Perform leakage current measurements on the TV and record the readings as part of the service record.

8. To track “Repaired versus Non-Repaired” televisions, using a “Sharpie” style marker, place a small dot on the product label to identify the TV as a Repaired unit.

END INSTRUCTIONS