Soundavo MZ-1650S

Soundavo MZ-1650S Digital 16 Channel Power Amplifier User Manual

Comprehensive guide for setup, operation, and maintenance.

1. INTRODUCTION

This user manual provides detailed instructions for the installation, operation, and maintenance of your Soundavo MZ-1650S Digital 16 Channel Power Amplifier. Please read this manual thoroughly before using the product to ensure proper functionality and to maximize its performance. Keep this manual for future reference.

2. PRODUCT OVERVIEW

The Soundavo MZ-1650S is a powerful and integrated high-efficiency Class D amplifier designed for multi-zone audio applications. It features 16 channels across 8 zones, delivering 80W per channel at 4 Ohms (50W per channel at 8 Ohms), and is bridgeable for 160W per zone at 8 Ohms. Its design prioritizes cool operation, reduced weight, and clean audio output, making it ideal for custom residential installations, commercial audio systems, and multi-room distributed audio setups.

2.1 Key Features

- **Multi-Room Flexibility:** Suitable for in-ceiling, indoor, or outdoor speakers.
- **Subwoofer Signal Outputs:** Six outputs with adjustable crossovers for connecting powered/active subwoofers or powering passive subwoofers.
- **Zone On/Off Switch:** Front panel buttons for easy mute status control and energy efficiency per zone.
- **Versatile Connectivity:** Global Bus Input (RCA or S/PDIF) for shared audio, and independent RCA Line Inputs for up to four external audio sources per zone.
- **Hi-End Design:** Constructed with interlocking blocks of deeply brushed and anodized black aluminum for a robust and elegant appearance.
- **Multiple Auto Power-On/Off and Trigger Options:** 12V Trigger In/Out for activating specific zones or triggering other 12V devices.

2.2 Product Views

Figure 2.1: Front view of the Soundavo MZ-1650S Digital 16 Channel Power Amplifier. This view shows the power button and the zone indicator LEDs.

Figure 2.2: Rear view of the Soundavo MZ-1650S amplifier, highlighting the extensive input and output connections for multi-zone audio distribution.

Figure 2.3: Angled view of the Soundavo MZ-1650S amplifier, showcasing its robust build and ventilation design.

2.3 Product Video Overview

Your browser does not support the video tag.

Video 2.1: An official overview of the Soundavo MZ-Series Multi-Zone / Multi-Channel Amplifier, demonstrating its features and connectivity options.

3. SETUP

Before connecting your amplifier, ensure all components are powered off. The MZ-1650S is designed for rack mounting or freestanding placement. Ensure adequate ventilation around the unit.

3.1 Power Connection

- Locate the voltage switch on the rear panel (refer to Figure 2.2). Ensure it is set to the correct voltage for your region (115V or 230V).

- Connect the provided power cord to the amplifier and then to a suitable AC outlet.

3.2 Audio Input Connections

- **Global Bus Inputs (Bus 1 & Bus 2):** Use RCA cables to connect audio sources (e.g., CD player, network streamer) to the Bus 1 or Bus 2 inputs. These inputs can distribute audio to any or all zones. The S/PDIF input is available for digital audio sources.
- **Independent Line Inputs:** For each zone, you can connect a dedicated audio source using the independent Line In RCA jacks. This allows different audio to be played in different zones.
- **12V Trigger In/Out:** Use these ports to integrate with other 12V triggered devices for automated power control. The Bus 12VDC Trigger In/Out controls the entire amplifier, while each zone also has its own 12VDC Trigger In/Out.

3.3 Speaker Output Connections

- Connect your speakers to the corresponding zone speaker terminals on the rear panel. Ensure correct polarity (+ to + and - to -).
- For higher power output, you can bridge channels. Use the Stereo/Bridge switch for each zone to select the desired mode. In Bridge mode, two channels combine for a mono output.
- Connect passive subwoofers to the dedicated subwoofer outputs if applicable, or use the adjustable crossover outputs for powered subwoofers.

4. OPERATING INSTRUCTIONS

4.1 Powering On/Off

- Press the main power button on the front panel to turn the amplifier on or off. The blue LED will illuminate when powered on.
- The amplifier features an auto power-on/off function. It will automatically turn on when an audio signal is detected and enter standby mode after a period of no signal.
- Adjust the Standby Delay Switch on the rear panel to set the auto-off delay (5 seconds, 5 minutes, or 10 minutes).

4.2 Zone Control

- Each zone has individual volume adjustment (Gain Controls) on the rear panel. Use a small screwdriver to adjust these.
- The front panel features On/Off buttons for each zone, allowing you to mute or unmute specific zones independently.
- Zone LEDs on the front panel indicate the status of each zone.

4.3 Input Selection

- Each zone has switches to select between the Global Bus Inputs (Bus 1, Bus 2) or its dedicated Independent Line Input.
- Ensure the correct input is selected for the desired audio source in each zone.

5. MAINTENANCE

- Keep the amplifier clean by wiping it with a soft, dry cloth. Do not use liquid cleaners or aerosols.
- Ensure proper ventilation by keeping the top and side vents clear of obstructions.
- Regularly check all cable connections to ensure they are secure.
- Avoid placing the amplifier in direct sunlight, near heat sources, or in excessively humid environments.

6. TROUBLESHOOTING

Problem	Possible Cause	Solution
No power	Power cord disconnected; Voltage switch incorrect; Blown fuse.	Check power cord connection; Verify voltage switch setting (115V/230V); Replace fuse if necessary (refer to specifications for fuse type).
No sound from a zone	Incorrect input selected; Zone muted; Speaker wires disconnected; Gain control too low.	Verify input selection for the zone; Ensure zone is not muted (front panel button); Check speaker wire connections; Adjust gain control for the zone.
Distorted sound	Input signal too high; Speaker impedance mismatch; Faulty speaker wire.	Reduce input signal level; Ensure speakers match amplifier impedance (4-8 Ohms); Check speaker wires for damage.
Auto power-off too soon/not at all	Standby delay switch setting.	Adjust the Standby Delay Switch on the rear panel to 5 seconds, 5 minutes, or 10 minutes as desired.

7. SPECIFICATIONS

- **Model:** MZ-1650S
- **Brand:** Soundavo
- **Number of Channels:** 16
- **Power Output (per channel, 1KHz, one zone driven):**

    - 80W into 4 Ohms
    - 50W into 8 Ohms

- **Power Output (Bridge mode, 1KHz):** 160W into 8 Ohms
- **Voltage:** 115V / 230V (Switchable)
- **Mounting Type:** Freestanding / Rack Mountable
- **Package Dimensions:** 22 x 21.8 x 9 inches
- **Weight:** 28 Pounds
- **Date First Available:** November 22, 2019
- **Manufacturer:** Soundavo
- **Country of Origin:** China

8. WARRANTY AND SUPPORT

For warranty information and technical support, please refer to the documentation included with your purchase or visit the official Soundavo website. Protection plans may be available for extended coverage.

What's in the Box: Amplifier