

Memphis Audio MEMBX

Memphis Audio MEMBX Bass Expander User Manual

Model: MEMBX

INTRODUCTION

The Memphis Audio MEMBX Bass Expander is a sophisticated digital bass restoration processor designed to enhance the low-end frequency response of your audio system. It effectively restores bass lost during the compression of music, delivering a richer and more dynamic sound experience. This unit features both high and low-level inputs, making it versatile for integration with both factory and aftermarket audio systems. A remote bass control is included for convenient adjustments.

This manual provides detailed instructions for the proper installation, operation, and maintenance of your MEMBX Bass Expander to ensure optimal performance and longevity.

SAFETY INFORMATION

Please read all instructions carefully before installing and operating the MEMBX Bass Expander. Failure to do so may result in damage to the unit, your vehicle, or personal injury.

- Always disconnect the vehicle's battery negative terminal before beginning any electrical work.
- Ensure all wiring is properly insulated to prevent short circuits.
- Mount the unit securely to prevent movement during vehicle operation.
- Do not expose the unit to moisture or extreme temperatures.
- Consult a professional car audio installer if you are unsure about any part of the installation process.
- This product contains chemicals known to the State of California to cause cancer and birth defects or other reproductive harm.

PRODUCT FEATURES

The MEMBX Bass Expander is equipped with several key features designed for superior bass restoration and control:

- **Digital Bass Restoration Processor:** Analyzes and restores low-frequency information that is often lost in compressed audio formats.
- **High/Low Level Inputs:** Provides flexibility for connecting to various audio sources, including factory head units (high-level) and aftermarket units (low-level RCA).
- **Max 9.5V Output:** Delivers a strong signal to your amplifier for powerful bass reproduction.
- **Variable Q and Frequency Control:** Allows precise tuning of the bass response to match your vehicle's acoustics and

personal preferences.

- **Remote Bass Control:** Enables convenient adjustment of bass levels from the driver's seat.

SETUP AND INSTALLATION

Proper installation is crucial for the optimal performance of your MEMBX Bass Expander. Follow these steps carefully:

1. Mounting the Unit

Choose a secure, dry location for mounting the MEMBX, away from direct heat or moisture. Ensure adequate ventilation around the unit. Use the provided mounting hardware to secure the unit firmly.



Figure 1: Angled top view of the MEMBX Bass Expander, showing the "WIDE" and "SWEEP" controls, power, bass control indicators, and input/output connections.



Figure 2: Top-down view of the MEMBX Bass Expander, highlighting the control knobs and indicator lights.

2. Wiring Connections

Refer to the diagram below for proper wiring. All connections should be made with high-quality, appropriately gauged wire.

- **Power (REM +12V):** Connect to a switched +12V source (e.g., ignition wire).
- **Ground (GND):** Connect to a solid chassis ground point.
- **Remote (REM):** Connect to the remote turn-on output of your head unit or amplifier.
- **Input (Balanced Input):** Connect your audio source (head unit, line output converter) to these RCA inputs. Use high-level inputs if connecting directly from speaker wires.
- **Output (Output):** Connect these RCA outputs to the input of your amplifier.
- **Dash Remote:** Connect the included remote bass control to this port using the provided cable.



Figure 3: Rear view of the MEMBX Bass Expander, detailing the power, ground, remote, balanced input, output, and dash remote connections.



Figure 4: Angled view of the MEMBX Bass Expander, providing a closer look at the RCA input and output ports.

OPERATING INSTRUCTIONS

Once installed, the MEMBX Bass Expander can be tuned to achieve your desired bass response.

1. Initial Power On

After all connections are made and verified, reconnect the vehicle's battery. Turn on your head unit. The power indicator on the MEMBX should illuminate.

2. Adjusting Bass Controls

- **WIDE Control:** This knob adjusts the width of the bass restoration. Turning it clockwise increases the range of frequencies affected by the bass expansion.
- **SWEEP Control:** This knob adjusts the center frequency of the bass restoration. Turning it clockwise shifts the focus of the bass expansion to higher low frequencies.
- **Remote Bass Control:** Use the wired remote to adjust the overall bass output level from your listening position.

Experiment with the WIDE and SWEEP controls to find the optimal bass enhancement for your music and vehicle acoustics. Start with both controls at their minimum settings and gradually increase them while listening to a variety of music.

3. Output Level

The MEMBX has a maximum output of 9.5V. Ensure your amplifier's input gain is set appropriately to avoid distortion. It is recommended to set the amplifier gain with the MEMBX's output at a moderate level, then use the remote bass control for daily adjustments.

MAINTENANCE

The MEMBX Bass Expander requires minimal maintenance. Follow these guidelines to ensure its longevity:

- Keep the unit clean and free from dust and debris. Use a soft, dry cloth for cleaning.
- Ensure all wiring connections remain secure. Periodically check for loose connections.
- Avoid exposing the unit to extreme temperatures or direct sunlight for prolonged periods.
- Do not attempt to open the unit or perform internal repairs. This will void the warranty.



Figure 5: Internal view of the MEMBX Bass Expander's circuit board, showing various electronic components. This view is for informational purposes only; users should not open the unit.

TROUBLESHOOTING

If you experience issues with your MEMBX Bass Expander, consult the following table before contacting support:

Problem	Possible Cause	Solution
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Problem	Possible Cause	Solution
No Power / Unit Not Turning On	Loose power or ground connection. Blown fuse (if applicable in the power line). No remote turn-on signal.	Check and secure all power, ground, and remote wires. Inspect and replace any blown fuses. Verify remote wire connection to head unit/amplifier.
No Bass Enhancement	Incorrect WIDE/SWEEP settings. Input/Output RCA cables loose or incorrect. Amplifier gain set too low.	Adjust WIDE and SWEEP controls. Check all RCA connections. Increase amplifier gain (carefully to avoid distortion).
Distorted Bass	MEMBX output level too high. Amplifier gain set too high. Poor ground connection.	Reduce MEMBX output via remote control. Lower amplifier gain. Ensure a clean, secure ground connection.

SPECIFICATIONS

Key technical specifications for the Memphis Audio MEMBX Bass Expander:

- **Model:** MEMBX
- **Type:** Digital Bass Restoration Processor
- **Inputs:** High-Level, Low-Level (RCA)
- **Max Output Voltage:** 9.5V
- **Controls:** Variable Q (WIDE), Variable Frequency (SWEEP), Remote Bass Control
- **Item Weight:** Approximately 1.9 pounds
- **Manufacturer:** Memphis Audio
- **Date First Available:** June 15, 2018

WARRANTY AND SUPPORT

Memphis Audio products are designed and manufactured to the highest standards. For warranty information and technical support, please refer to the official Memphis Audio website or contact their customer service directly. Keep your purchase receipt as proof of purchase for warranty claims.

For further assistance, you may visit the [Memphis Audio Store on Amazon](#).