

Earthquake Sound SLAPS-M8v3

Earthquake Sound SLAPS-M8v3 Passive Bass Radiator Instruction Manual

Brand: Earthquake Sound | **Model:** SLAPS-M8v3

INTRODUCTION

The Earthquake Sound SLAPS-M8v3 (Symmetrically Loaded Audio Passive System) is an 8-inch mass-tuned passive bass radiator designed to enhance the low-frequency performance of subwoofer enclosures for both home and mobile audio applications. This innovative design allows for deep, dynamic bass response without the need for additional amplifier power or increased enclosure volume, overcoming limitations of traditional sealed and ported systems.

This manual provides essential information for the proper setup, operation, maintenance, and troubleshooting of your SLAPS-M8v3 passive radiator to ensure optimal performance and longevity.

PRODUCT OVERVIEW

The SLAPS-M8v3 passive radiator features a unique symmetrical structure with identical dual suspensions and a specific mass, enabling efficient movement in both directions without a central spider. This design significantly increases subwoofer efficiency and improves deep bass reproduction at high SPL levels compared to conventional passive radiators.

Key features include:

- Patented passive bass radiator design allows for ultra-low frequency tuning in compact enclosures.
- Increases subwoofer output and efficiency when paired with a good quality active driver.
- Provides deep and dynamic bass response with compression-free excursion, overcoming limitations of traditional systems without port noise distortion.
- User-adjustable for optimal performance, integrating into virtually any subwoofer/enclosure combination.

- Adds up to +6dB of bass from a compact volume and a slim mounting depth of less than 3 inches.



Figure 1: Top view of the Earthquake SLAPS-M8v3 Passive Bass Radiator. This image shows the front of the radiator with the Earthquake logo prominently displayed on the dust cap and around the frame.

WHAT'S IN THE BOX

Upon unpacking your SLAPS-M8v3, please verify that all components are present:

- (1) SLAPS-M8v3 Passive Radiator
- (1) Tuning Insert
- (1) 160g Mass with Tools



Figure 2: Bottom view of the SLAPS-M8v3, showing the internal structure and mounting points.

SETUP

The SLAPS-M8v3 passive radiator is designed for integration into custom subwoofer enclosures. Proper installation is crucial for optimal performance.

Enclosure Design Considerations

- **Volume:** The SLAPS-M8v3 allows for smaller enclosure volumes compared to traditional ported designs while achieving deep bass. Consult subwoofer design software or professional guidance for specific enclosure volume recommendations based on your active driver.
- **Mounting:** The passive radiator should be securely mounted to the enclosure. Ensure there is sufficient clearance behind the radiator for its full excursion.
- **Sealing:** The enclosure must be airtight to ensure proper operation of the passive radiator. Any leaks will compromise performance.

Mounting Dimensions

Refer to the diagrams below for precise mounting dimensions, both with and without the gasket.

SLAPS-M8v3 Passive Radiator Mounting Dimensions With Gasket

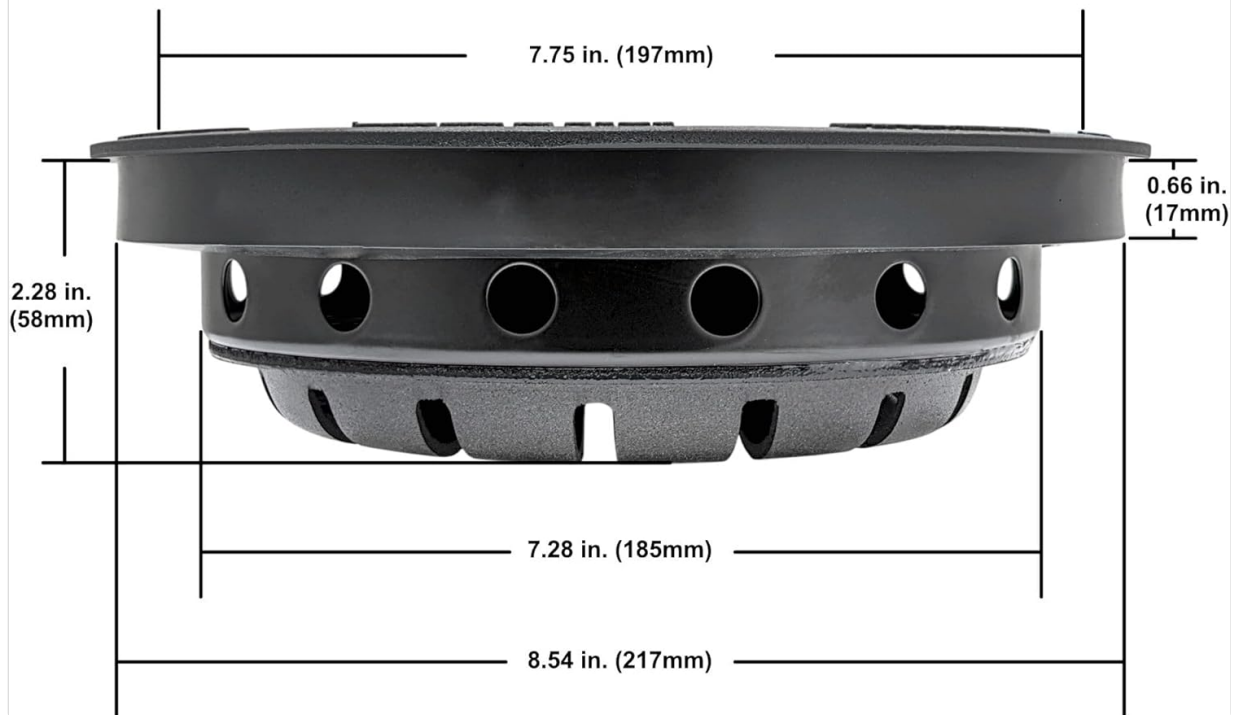


Figure 3: Mounting dimensions for the SLAPS-M8v3 with the gasket installed. Key dimensions include overall diameter, mounting hole diameter, and depth.

SLAPS-M8v3 Passive Radiator Mounting Dimensions Without Gasket

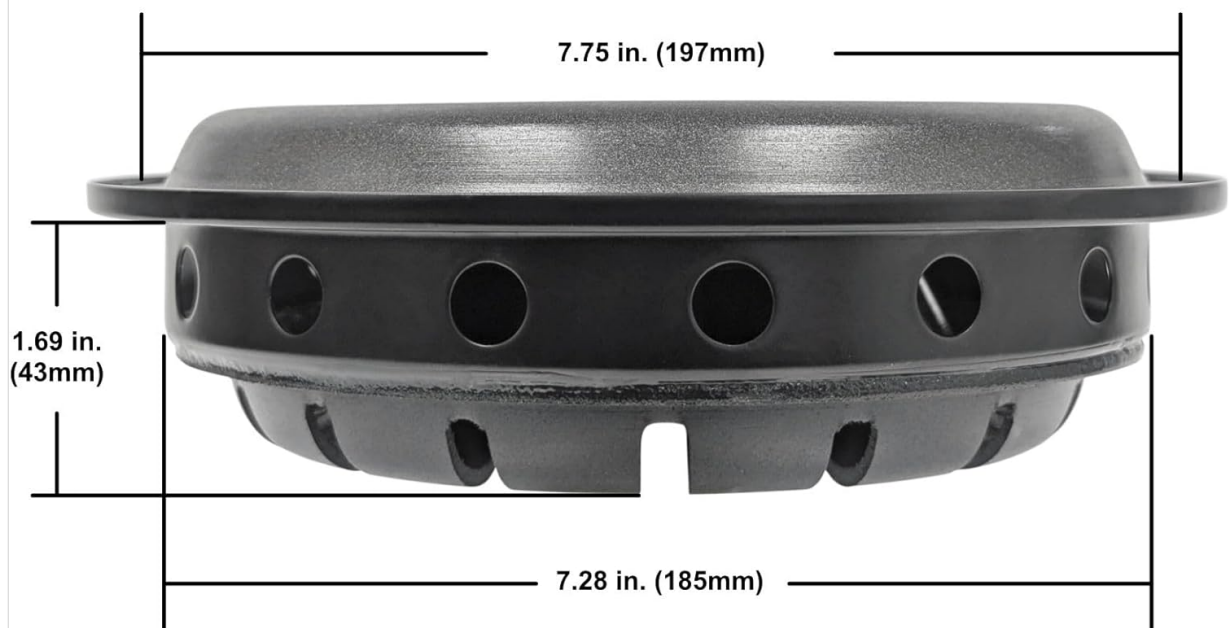


Figure 4: Mounting dimensions for the SLAPS-M8v3 without the gasket. Note the reduced depth compared to mounting with the gasket.



Figure 5: Side-by-side comparison illustrating the SLAPS-M8v3 with and without its gasket, highlighting the difference in mounting depth.

OPERATING PRINCIPLES

The SLAPS-M8v3 functions by utilizing the air pressure generated by an active subwoofer driver within a sealed enclosure. Instead of a port, the passive radiator moves in response to this internal pressure, effectively extending the low-frequency response of the system.

Tuning the Passive Radiator

The SLAPS-M8v3 is user-adjustable for optimal performance. The included 160g mass and tuning insert allow you to modify the resonant frequency of the passive radiator to match your active subwoofer and enclosure volume. Adding or removing mass will change the tuning frequency:

- **Adding Mass:** Lowers the tuning frequency, resulting in deeper bass extension.
- **Removing Mass:** Raises the tuning frequency, potentially increasing output at higher bass frequencies.

Experimentation with the included mass is recommended to achieve the desired bass response for your specific application. Professional audio tuning tools can assist in precise frequency adjustments.



Figure 6: Side view of the SLAPS-M8v3, illustrating the mechanism for adding or removing tuning mass. The central bolt and nut secure the mass.

MAINTENANCE

The SLAPS-M8v3 passive radiator requires minimal maintenance to ensure long-term performance.

- **Cleaning:** Periodically wipe the surface of the passive radiator with a soft, dry cloth to remove dust. Avoid using harsh chemicals or abrasive cleaners.
- **Inspection:** Regularly inspect the suspension and cone for any signs of damage, tears, or deterioration. Ensure all mounting screws remain tight.
- **Environment:** Avoid exposing the passive radiator to extreme temperatures, direct sunlight, or excessive moisture. While durable, it is not waterproof.

TROUBLESHOOTING

If you experience issues with your SLAPS-M8v3 passive radiator, consider the following common troubleshooting steps:

- **No or Weak Bass Output:**
 - Ensure the active subwoofer driver is correctly wired and receiving power.
 - Verify the enclosure is completely sealed. Air leaks will severely reduce passive radiator effectiveness.
 - Check the tuning mass. Too much mass might lower the tuning frequency below the audible range or the active driver's effective range.
 - Confirm the passive radiator is not physically obstructed from moving freely.
- **Distorted or "Flapping" Sound:**

- This often indicates over-excursion. Reduce the amplifier gain to the active subwoofer.
- The tuning might be too low for the enclosure volume or active driver. Consider reducing the tuning mass slightly.
- Inspect the passive radiator for physical damage to the suspension or cone.

- **Rattling Noise:**

- Check all mounting screws for tightness on both the passive radiator and the active driver.
- Ensure the tuning mass is securely fastened.
- Inspect the enclosure for loose panels or internal bracing.

If issues persist, consult a professional audio technician or contact Earthquake Sound customer support.

SPECIFICATIONS

Feature	Specification
Brand	Earthquake Sound
Model Name	SLAPS-M8v3
Speaker Type	Subwoofer (Passive Radiator)
Speaker Size	8 Inches
Woofer Diameter	8 Inches
Mounting Type	Flush Mount
Item Dimensions (D x W x H)	6.2 x 22.9 x 22.9 centimeters (approx. 2.44 x 9.02 x 9.02 inches)
Item Weight	1.46 Pounds (approx. 0.66 kg)
Included Mass	160g
Recommended Uses	Custom subwoofer enclosures (home audio and car audio)
Waterproof	No
UPC	689759102137
ASIN	B0GLHX538L

WARRANTY INFORMATION

The Earthquake Sound SLAPS-M8v3 Passive Bass Radiator comes with a **Limited Warranty**. For specific terms, conditions, and duration of the warranty, please refer to the documentation included with your purchase or visit the official Earthquake Sound website. Keep your proof of purchase for warranty claims.

SUPPORT

For technical assistance, product inquiries, or warranty service, please contact Earthquake Sound customer support. You can typically find contact information on the manufacturer's official website or through your authorized dealer.

When contacting support, please have the following information ready:

- Product Model: SLAPS-M8v3
- Date of Purchase
- Description of the issue

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