

Choosing an Enclosure

Loud + Clear subwoofers are optimized to perform best in small sealed, vented and prefabricated bandpass enclosures. While infinite-baffle mounting of Loud + Clear subs is possible, power handling will be greatly compromised because there will be no enclosed volume of air to prevent the speaker's cone from moving past its limit. For this reason, we do *not* recommend infinite-baffle mounting for Loud + Clear subwoofers.

You should choose an enclosure based on the type of music you listen to, how much amplifier power you will use for the subwoofer, and how much space inside the vehicle you can devote to a subwoofer enclosure.

Because a sealed enclosure provides the most control over woofer movement, a woofer mounted in a sealed enclosure will handle more power than a woofer mounted in another enclosure type. Sealed enclosures also provide more accurate sonic reproduction than other enclosure types so they are well suited to all types of music. Sealed-enclosure construction is straightforward, and there are many prefabricated sealed enclosures available. An optimum sealed enclosure is always smaller than other types of enclosures optimized for a particular speaker, so it requires the least amount of space inside the vehicle.

Vented enclosures provide better efficiency in the 40Hz–50Hz range, but this efficiency comes at the expense of sound in the lowest octave (below 40Hz) and at the expense of some control and power handling. If you are using a small amplifier, a vented box will provide more bass output from less power. Vented enclosures are also well suited to a variety of music types. Because vented enclosures require the volume of the enclosure and the size of the port to have a specific relationship to the characteristics of the woofer, they must be built exactly to the specifications provided. While there are some prefabricated vented boxes available, matching a prefabricated box to a particular woofer is difficult. If you wish to use a vented enclosure, we strongly recommend having your authorized JBL dealer build it or at least verify that your design is correct if you wish to build it yourself. An optimum vented enclosure is always larger than the optimum sealed box for the same woofer, and will require more space inside the vehicle.

Bandpass enclosures often provide the greatest output available from any amplifier/subwoofer combination, albeit at the expense of sonic accuracy. If sheer SPL (sound pressure level) is what you desire most, choose a bandpass enclosure. Because bandpass-enclosure design is tricky, using a computer and enclosure-design software is necessary. If you are an experienced installer or have some woodworking skill, you may wish to build the enclosure described in the "Specifications" chart in this manual. Fortunately, however, there are many prefabricated bandpass boxes available and they are all optimized to extract the greatest possible output from any woofer. Be aware that bandpass enclosures can be quite large and may require a lot of space inside your vehicle.

Thank you for purchasing a JBL Loud + Clear subwoofer. Subwoofer installation often requires woodworking skills and some experience disassembling and reassembling automotive interiors. If you lack the necessary tools or know-how, have your subwoofer installed by an authorized JBL dealer.

Warning! Playing loud music in an automobile can permanently damage your hearing as well as hinder your ability to hear traffic. We recommend listening at low levels while driving. JBL accepts no liability for hearing loss, bodily injury or property damage resulting from use or misuse of this product.

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LOUD
clear®

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LC-S800W

LC-S1000W

LC-S1200W

Specifications

Recommended Amplifier Power Range 12-100W
Sensitivity 89dB
Frequency Response 47Hz-2kHz
Mounting Depth 4-1/8" (105mm)
Cut-out Diameter 7" (178mm)

12-150W
 90dB
 40Hz-800Hz
 4-1/2" (114mm)
 9" (229mm)

12-200W
 91dB
 40Hz-500Hz
 5" (127mm)
 10-3/4" (273mm)

Thiele and Small Parameters

Nominal Impedance 4 Ohms
Revc 3.47 Ohms
Fs 33.27Hz
Vas 32.67 Liters
Qms 4.67
Qes 0.38
Qts 0.33
Mms 48.6g
Levc 2.1mH

4 Ohms
 3.52 Ohms
 28.5Hz
 71 Liters
 4.39
 0.34
 0.32
 75.0g
 2.0mH

4 Ohms
 3.45 Ohms
 27.4Hz
 124 Liters
 3.18
 0.37
 0.33
 109.2g
 2.2mH

Sealed-Enclosure Specifications

Enclosure Volume .4 cu. ft. (11.32 Liters)

1 cu. ft. (28.31 Liters)

1.25 cu. ft. (35.88 Liters)

Vented-Enclosure Specifications

Enclosure Volume .6 cu. ft. (19.96 Liters)
Port Diameter 3" (76.2mm)
Port Length 10" (254mm)

1.5 cu. ft. (42.46 Liters)
 3" (76.2mm)
 7" (177.8mm)

1.75 cu. ft. (49.54 Liters)
 4" (101.6mm)
 10-3/4" (273mm)

Bandpass-Enclosure Specifications

Sealed-Chamber Volume .4 cu. ft. (11.32 Liters)
Vented-Chamber Volume .4 cu. ft. (11.32 Liters)
Port Diameter 3" (76.2mm)
Port Length 7" (177.8mm)

1 cu. ft. (28.31 Liters)
 .7 cu. ft. (19.82 Liters)
 4" (101.6mm)
 8" (203.2mm)

1.25 cu. ft. (35.88 Liters)
 1 cu. ft. (28.31 Liters)
 4" (101.6mm)
 6" (152.4mm)



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