

Control® 47C/T

Professional Series – Two-Way 6.5” Coaxial Ceiling Loudspeaker with Extended Bass



Key Features:

- Extremely consistent 120° broadband pattern control featuring JBL's exclusive conical Radiation Boundary Integrator® (RBI™) technology:
 - Provides very consistent coverage of listening area
 - Wide coverage requires fewer speakers, reducing the cost of the installed system without sacrificing performance
- Coaxial design:
 - 165 mm (6.5 in) woofer with butyl rubber surround
 - 25 mm (1 in) soft-dome tweeter on 250 mm (10 in) diameter wave guide
- Bass extension to 55 Hz
- 8 ohm and 70V/100V operation
- Integrated backcan for easy “blind-mount” install
- Packaged with grille and tile rails for easy installation



Included grille not shown

Description:

The Control 47C/T is a premium in-ceiling professional loudspeaker designed for applications that require extremely wide bandwidth along with very consistent coverage.

Featuring JBL's exclusive conical Radiation Boundary Integrator® (RBI™), the RBI provides a large waveguide for the tweeter while low-frequency sound projects through specially-designed apertures in the RBI, allowing for a seamless integration of coverage between the two coaxially mounted drivers. The result is extremely consistent sound character with very little variation throughout the listening space. The wide coverage allows for the use of fewer loudspeakers compared to speakers with less consistent coverage control, while at the same time providing better coverage of the area.

The large backcan on the Control 47C/T, along with the LF driver design, provides extended bass response for a warm full-bodied tone. The system's 165 mm (6.5 in) woofer features a polypropylene cone and pure butyl rubber surround for long life. The copper-clad aluminum voice coil wound on a vented aluminum former provides low distortion and high sensitivity. The coaxially mounted 25 mm (1 in) soft dome features internal damping for smooth extended response and ferrofluid cooling for enhanced power handling and reduced power compression. The result is crisp, clear highs.

Ideal for small and large projects alike, the Control 47C/T is switchable for use as either an 8-ohm low-impedance speaker, or as part of a 70V/100V distributed loudspeaker system.

Specifications:

System	
Frequency Range (-10 dB) ¹	55 Hz – 20 kHz
Frequency Response (± 3 dB) ¹	75 Hz – 17 kHz
Power Capacity ²	150W Continuous Program Power 75W Continuous Pink Noise
Nominal Sensitivity	91 dB
Nominal Coverage Angle ³	120° conical coverage
Directivity Factor (Q) ³	6.5
Directivity Index (DI) ³	7.9 dB
Rated Maximum SPL	110 dB @ 1 m (3.3 ft) average, 116 dB peak
Rated Impedance	8 ohms (in bypass mode)
Transformer Taps	60W, 30W, 15W, (& 7.5W @ 70 V)
Transformer Insertion Loss	0.76 dB @ 60W, 0.70 dB @ 30W, 0.61 dB @ 15W, 0.58 dB @ 7.5W
Transducers	
LF Driver	165 mm (6.5 in) with polypropylene cone, butyl rubber surround, copper-clad coil, vented aluminum former
HF Driver	25 mm (1 in) soft dome w/ dampening, ferrofluid-cooled
Enclosure	
Input Connectors	Two removable locking 2-pin connectors with screw-down terminals; max wire size 12 AWG (2.5 mm)
Knockouts	Two (top and side)

Safety Agency	Suitable for use in air handling spaces per UL1480, UL2043, NFPA90 & NFPA 70; S7232/UL listed, signaling speaker; transformer UL registered per UL1876; in accordance with IEC60849/EN60849
Dimensions	305 mm diameter x 259 mm depth from back of baffle (12 in x 10.2 in)
Cutout Size	282 mm diameter (11.1 in)
Ceiling Thickness Range	Accommodates tiles/drywall up to 70 mm (2.75 in) thick
Suspension Points	Three, on top surface
Weight	5 kg (11 lb)
Included Accessories	» C-ring support backing plate » 2 tile support rails (fits both 2 x 4 ft or 600 x 1200 mm tiles) » Knockout strain relief » Cutout template » Paint shield » 2 removable locking multi-pin connectors » Grille
Optional Accessories	» MTC-47NC New Construction Bracket » MTC-47MR Mud Ring Construction Bracket

¹ Half-space (flush mounted in ceiling)

² Continuous Pink Noise rating is IEC-shaped pink noise with a 6 dB crest factor for 100 hours continuously. Continuous Program power is a conservative expression of the system's ability to handle normal speech and music program material, and is defined as 3 dB above the Continuous Pink Noise Rating.

³ Half-space (in ceiling) average 1 kHz to 16 kHz

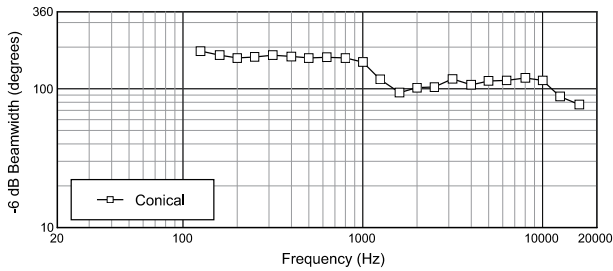
JBL continually engages in research related to product improvement. Changes introduced into existing products without notice are an expression of that philosophy.

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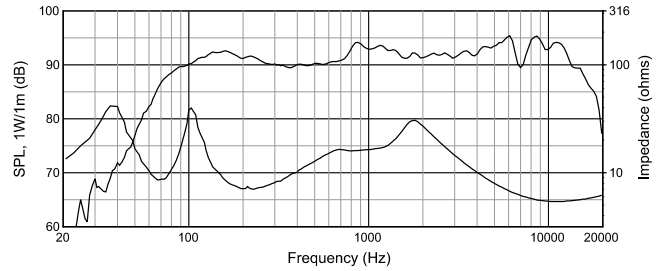
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Beamwidth:

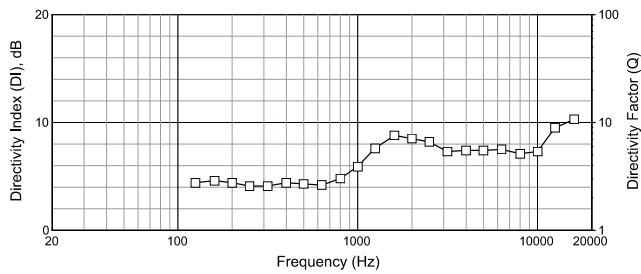


Frequency Response:

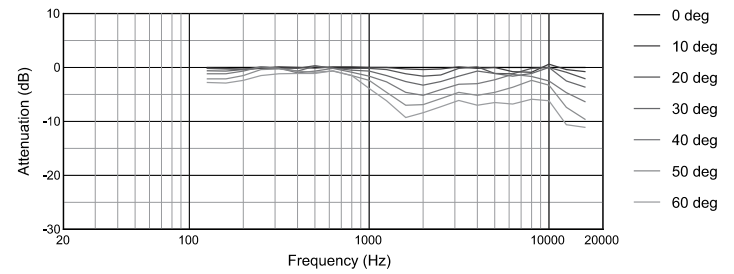


Half-space (2pi, mounted in ceiling); input impedance (lower solid line)

Directivity Index:



Off-Axis Frequency Response:



Mounting Dimensions:

Dimensions in mm (inches)

