

**ON A BOOKSHELF**, either horizontally or vertically placed.

IN A CORNER, between walls, or between a wall and ceiling.



# **BRILLIANTLY CLEAN**



**FOR MORE THAN 60 YEARS,** JBL has been the clear favorite of leading recording artists and sound engineers around the world, providing best-in-class audio equipment for concert halls, recording studios and movie theaters everywhere. Now the company that sets the standards changes the rules, with JBL Control NOW<sup>®</sup> speakers. Incorporating innovative proprietary technologies into an ingenious and uniquely versatile design, JBL Control NOW speakers will deliver evenly distributed sound with minimal distortion at any volume level in any listening environment, indoors or out. Media rooms, rec rooms, kitchens, decks, pool houses, patios – anywhere you want great sound and need installation flexibility – JBL Control NOW speakers are the high-style, high-performance choice.



**ON A WALL**, horizontally, vertically or in a two-speaker array.

AS A THREE-SPEAKER HORIZONTAL ARRAY, mounted on a wall corner.



# JBL<sup>®</sup> SOUND...ANY WAY, ANYWHERE.

**ONE SPEAKER, DOZENS OF POSSIBILITIES.** The shape of the JBL Control NOW speaker makes it perhaps the most flexible speaker ever developed. Mounting options for single speakers and multispeaker arrays are literally too numerous to list in detail. But just to get you thinking in the right direction, here are a few possibilities.

Single speakers may be mounted horizontally or vertically on walls, and in corners between walls, or between walls and ceilings. They can sit horizontally or vertically on a shelf or tabletop. Arrays of two, three and four speakers can be mounted virtually anywhere, in any environment – on walls, on ceiling poles, even spanning reverse corners – and can be configured for either single-channel or single-point stereo use. With an included floor stand adapter, they can work with a multitude of third-party stands. And everything a JBL Control NOW speaker can do, JBL Control NOW AW speakers can do outdoors.\*

Use them in traditional stereo setups, for home theaters or for whole-house-music and background-music systems. Forget the usual technical challenges that come with wiring multiple-speaker systems. JBL Control NOW speakers eliminate impedance restrictions with a wiring adapter that makes configuring multi-unit arrays simple. If your amplifier can drive one JBL Control NOW speaker, it can drive up to four of them.

An optional pole-mount kit includes a bracket for hanging a four-speaker array from any standard ceiling-fan pole. A proprietary harness that simplifies both wiring and wire management (and increases sensitivity by 6dB, compared to wiring in series) is included.

HANG A FOUR-SPEAKER ARRAY from the ceiling using the optional pole-mount bracket and standard ceiling fan hardware.



A patented Bi-Radial<sup>®</sup> horn delivers smooth frequency response over an exceptionally large listening area.

Stiff, yet lightweight woofers eliminate internal resonances without increased cone mass, delivering tight, deep bass response.

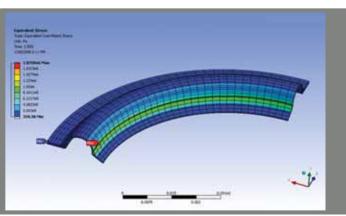


### **ADVANCED TECHNOLOGY FOR A MORE**

#### HIGH-FREQUENCY TRANSDUCER WAVEGUIDE DESIGN.

JBL Control NOW speakers can go places where other speakers cannot, including places that can present unique acoustical challenges. Corner-mounting and some multi-unit configurations would sometimes cause unwanted sound reflections that would normally adversely affect frequency response across the listening area. It's a common problem in professional installations, and JBL engineers have addressed it with an all-new adaptation of its patented Bi-Radial® horn, a proven technology that strictly controls the directivity of high-frequency sound. For JBL Control NOW speakers, a new Bi-Radial-horn profile with smoothly blended edges was developed to minimize diffraction artifacts. The result is remarkably wide and uniform high-frequency response, which is also exceptionally smooth.

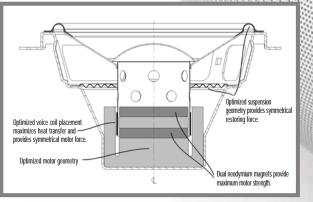
Each JBL Control NOW tweeter uses 3/4" (19mm) titanium-laminate diaphragms and ferrofluid-cooled voice coils that are driven by high-strength neodymium boron-iron magnets. It's a high-efficiency design for maximum power handling, minimal thermal compression and very little magnetic flux leakage. The tweeter/ Bi-Radial-horn combination produces more than 100dB at 2kHz, from 2.83 volts at 1 meter.



**FINITE ELEMENT ANALYSIS (FEA)** is a computer analysis technique using the finite element method to break large, complex systems into small pieces (or elements). In the real world, many systems are so complex that an analytical solution is not practical or even possible. In other words, a simple formula will not give an answer with an acceptable level of accuracy. This is the case with many transducer components, such as the suspension system or the magnetic circuit of the motor. By breaking the complex system down into small pieces, the system becomes predictable, as each element is solvable and the solution to the system is simply the combination of all the element solutions.

Woofer performance is optimized through Finite Element Analysis of transducer motor and suspension components.

Low-frequency performance is optimized through Finite Element Analysis of transducer motor and suspension components.



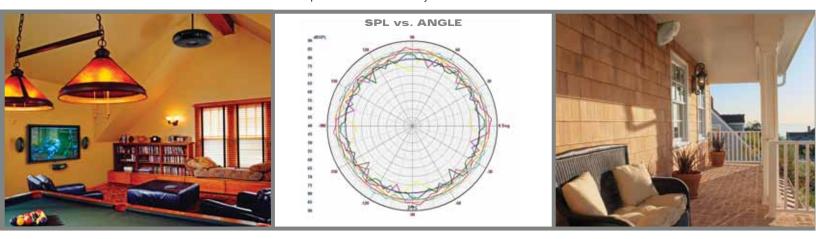
### NATURAL SOUND.

#### LOW-FREQUENCY TRANSDUCER DESIGN.

JBL Control NOW speakers' low-frequency transducers deliver an ideal combination of enhanced power handling and output, with reduced distortion. Finite Element Analysis was used to optimize motor strength and motorstrength symmetry. Dual neodymium boron-iron magnets are used to increase magnetic flux in the gap, and to provide greater magnetic saturation of the pole plate, which reduces flux modulation and harmonic distortion. The motor structure completely surrounds the 1-1/4" (32mm) voice coil, providing increased thermal coupling and reduced inductance modulation. The large contact area between the motor and the transducer frame allows the frame to act as a heatsink, dissipating thermal energy and improving reliability during high-output program peaks. Finite Element Analysis was also used to improve the suspension geometry of both the spider and the surround, reducing harmonic distortion. The spider employs a progressive-roll design, and the surround incorporates unique features such as variable-roll thickness and linear surround transition, contributing to the outstanding performance characteristics of JBL Control NOW loudspeakers.

UBL.

A polar plot of SPL vs. angle in a horizontal array of four JBL Control NOW loudspeakers. Tweeter axes correspond to 45, 135, 225 and 315 degrees. Measurements show uniform coverage across the bandwidth, the result of transducer placement and Bi-Radial directivity control.

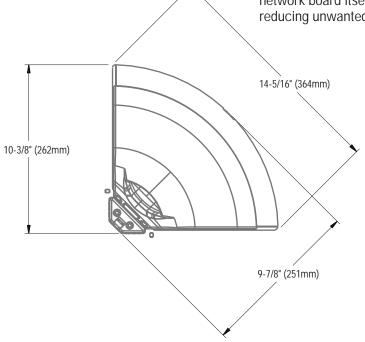


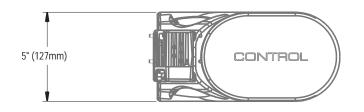
#### SYSTEM ACOUSTICAL DESIGN.

As you would expect, the frequency response of JBL Control NOW speakers is optimized for maximum placement flexibility, particularly relative to walls, ceilings and corners. The speakers have constant-directivity characteristics when wall-mounted, and omnidirectional characteristics when corner-mounted or grouped in a four-speaker circular array. The Straight-Line Signal Path<sup>™</sup> (SSP) dividing network ensures accurate reproduction along the shortest possible signal path by employing only the highest quality network components, including laminated-steel and air-core inductors.

### **MECHANICAL DESIGN.**

Enclosures and baffles are constructed of a thermoplastic composite material containing both glass and mineral fill. It's exceptionally stiff, yet well damped, and enclosure walls are double-thick (1/4"). A highly integrated mechanical design uses die-cast aluminum lock plates, port tubes – and even the electrical network board itself – to augment rigidity and structural integrity, further reducing unwanted resonances and acoustical loss.





All-weather JBL Control NOW AW, available in white.







### SPECIFICATIONS

Maximum recommended amplifier power <sup>†</sup> :	150W
Power handling:	50W continuous/300W
Frequency response:	80Hz – 30kHz (–6dB)
Nominal impedance:	8 Ohms
Sensitivity:	90dB @ 2.83V/1 meter
Crossover point:	2kHz
Crossover slope:	18dB/octave (LF driver 36dB/octave (HF drive
LF drivers:	Dual 4" (200mm) PolyPlas∛ shielded
HF driver:	3/4" (19mm) titanium- laminate, shielded

t The maximum recommended amplifier power rating will ensure proper system headroom to allow for occasional peaks. We do not recommend sustained operation at these maximum power levels.

tave (LF driver); tave (HF driver)

\* Please note that while JBL Control NOW AW is an all-weather outdoor speaker, it is not waterproof. It should be sheltered from direct exposure to ice, snow and sustained moisture.



















#### PRO SOUND COMES HOME

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