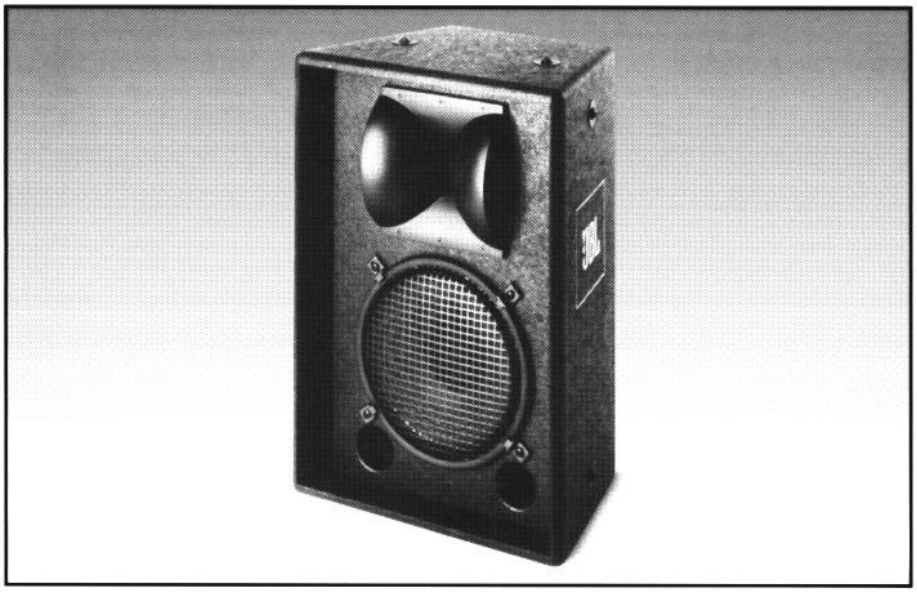
AS4722-STD, AS4722NW

Two-Way Ultra-Compact Loudspeaker Systems With 12 in Transducer

Architectural Series



Key Features:

- VGC™ (Vented Gap Cooling) low frequency transducer with 100 mm (4 in) diameter edgewound voice coil and SFG™ magnet structure.
- Compact trapezoidal enclosures for accurate cluster design.
- Rugged black textured finish.
- Multiple attachment points for efficient mounting.
- 100° x 100° Bi-Radial® horn for wide, smooth coverage.
- Options include: finish, input connections, and grilles.

The JBL Architectural Series is a family of modular loudspeaker systems designed for fixed installation applications ranging from speech reinforcement to large scale music reinforcement. All models in the series can be customized to meet specific designer needs in details of finish, mounting, and input wiring, resulting in economy and time saving in the field.

The model AS4722 is an ultra-compact system that provides 100° x 100° high frequency coverage. With its 600 watt power rating, it produces considerable output for its modest size. In many small to medium size rooms, a single AS4722 will provide excellent coverage and ample level for speech reinforcement.

Components

The two models in the AS4722 group have been designed with rugged JBL transducers. The 2206H 300 mm (12 in) low frequency transducer incorporates JBL's exclusive VGC™ (Vented Gap Cooling) for efficient removal of heat from the voice coil resulting in a continuous power rating of 600 watts with minimum power compression. Another JBL innovation, SFG™ (Symmetrical Field Geometry), reduces second and third harmonic distortion to extremely low levels, resulting in clean reproduction at the highest drive levels. JBL's continuing research in cone, surround, and suspension materials has made the 2206H an extremely smooth and predictable performer.

The 2416H-1 compression driver used in the AS4722 incorporates a pure titanium diaphragm that is both light and strong. It has a three dimensional embossed pattern which controls high frequency resonances and results in usable response to 18 kHz.

Enclosure

The model AS4722 is a trapezoidal enclosure which facilitates arraying for a wide variety of coverage requirements. The enclosure is made of rugged, high-grade birch plywood, and each joint is either dado or rabbet type. The enclosure is finished in textured black and has ten internal corner mounted steel plate attachment points which accept only 3/8 inch forged shoulder steel eye bolts for maximum safety. The trapezoidal enclosure is tapered front-to-back at 15°, allowing adjacent enclosure splaying at 30°. The enclosure grille is made of black fire retardant, vermin and fade resistant material. The grille cloth is removable from its hardwood frame for replacement to match decor.

The AS4722-STD system is intended for biamplification and for this purpose comes with a standard barrier strip input connector. The recommended crossover point is 1200 Hz and standard high frequency power response equalization is recommended. The AS4722NW includes a passive dividing network with 1/4-inch phone jack input connectors.

Options

The AS4722 system may be tailored to specific applications in terms of finish, grille options, and input connections. Optional finishes include a fiberglass covering for increased structural and surface durability, neutral paint which more easily facilitates repainting, and bare wood (premium Finnish birch) which can be stained to meet architectural requirements. Loudspeakers can also be ordered without attachment points.

For continued field support and future recognition of the loudspeaker's configuration, once an option (alternate finish, input connector, etc.) is incorporated into and Architectural Series product, the system is no longer a standard ("STD" suffix) model, but becomes a special ("SP" suffix) model. The list of available options is continually growing. contact JBL Professional for current Option Code offerings, availability, and pricing.

► AS4722-STD, AS4722NW
Two-Way Ultra-Compact Loudspeaker Systems With 12 in Transducer

Architects and Engineers Specifications:

The loudspeaker shall consist of a 300 mm (12 in) low frequency transducer and a high frequency horn with uniform coverage above 1 kHz. The frame of the low frequency transducer shall be made of cast aluminum to avoid warping, and the magnetic assembly shall use a ferrite magnet and an aluminum flux stabilizing ring to reduce distortion. The nominal cone diameter shall be 300 mm (12 in), and the voice coil shall be 100 mm (4 in) in diameter and made of edgewound aluminum ribbon wire. The low frequency transducer shall be capable of handling 600 watts input power and have an axial sensitivity no less than 95 dB (1 W, 1 m). Power compression in the low frequency transducer shall not exceed 3.9 dB at an input power of 600 watts.

The high frequency section shall be driven by a compression driver capable of 50 watts power input above 1.2 kHz. The voice coil shall be no less than 47 mm (1-3/4 in) in diameter, constructed of edgewound aluminum ribbon wire, and shall operate in a magnetic gap of no less than 1.8 tesla flux density.

The enclosure shall be of trapezoidal shape with front-to-back tapering of 15° per side. The enclosure shall be constructed of high grade birch plywood, finished with water-resistant paint, and provided with no less than ten attachment points. Overall dimensions shall not exceed 711 mm H x 508 mm W x 343 mm D (28 in x 20 in x 13-1/2 in).

The system shall be the JBL model AS4722-STD (AS4722NW), with the pertinent system options. Other loudspeaker systems will be considered as equivalent provided that submitted data from a recognized independent test laboratory verify that the above performance specifications are met.

Specifications:

SYSTEM:	
Frequency Range (-10 dB):	50 Hz to 17 kHz
Sensitivity[1]:	LF: 95 dB SPL, 1 W @ 1 m (3.3 ft)
	HF: 109 dB, 1 W @ 1 m (3.3 ft)
Power Rating[1]:	LF: 600 W; HF: 100 W above 1.2 kHz
Rated Impedance:	LF: 8 ohms; HF: 8 ohms
Minimum Impedance:	LF: 6.9 ohms; HF: 5 ohms
LOW FREQUENCY SECTION	2206H
Nominal Diameter:	300 mm (12 in)
Input Power Rating:	600 watts, continuous pink noise
Sensitivity[1]:	95 dB, 1 W @ 1 m (3.3 ft)
Voice Coil:	100 mm (4 in) edgwound aluminum ribbon
HIGH FREQUENCY SECTION	2416H-1
Throat Diameter:	25 mm (1 in)
Input Power Rating[1]:	50 W, continous program
Nominal Impedance:	8 ohms
Sensitivity[1]:	109 dB, 1 W @ 1 m
Directivity Index (DI)	9 dB (+3, -2 dB)
Directivity Factor (Q):	8 (+8, -3 dB)
Diaphragm:	0.05 mm (0.002 in) pure titanium
ENCLOSURE:	
Shape:	Trapezoidal, 15° taper per side
Material:	High grade birch plywood
Attachment:	10 points; accepts 3/8 in - 24 x 1-1/2 in forged shoulder steel eye bolts
Finish:	Black textured paint
Grille Material:	Black, fire retardant on hardwood frame
Connector:	Barrier strip
Dimensions (H x W x D):	711 x 508 x 343 mm (28 x 20 x 13-1/2 in)
Net Weight:	21.6 kg (57.5 lb)
Shipping Weight:	29.1 kg (64 lb)
CAUTION:	Suspending this system should only be done by qualified persons following safe rigging standards.
ADDITIONAL SPECIFICATIONS, AS4722NW:	Passive Crossover Network Included
Input Connectors:	1/4 in phone jacks
NOTE:	In all other regards, the specifications of the AS4722-STD apply.

[1] See individual driver specification sheets for rating methodology
NOTE: For additional component data, refer to component specification sheet

JBL continually engages in research related to product improvement. New materials, production methods, and design refinements are introduced into existing products without notice as a routine expression of that philosophy. For this reason, any current JBL product may differ in some respect from its published description, but will always equal or exceed the original design speci-

JBL Professional
8500 Balboa Boulevard
Northridge, California 91329 USA
A Harman International Company

6/93 5M
P1201