

Electro-Voice | EVH-1152D/96 Premium arrayable point-source coaxial horn-loaded loudspeaker

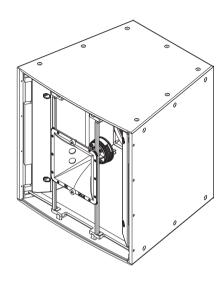
EVH-1152D/96 Premium arrayable point-source coaxial horn-loaded loudspeaker

- Rotatable Mid-bass and High Frequency Waveguides for consistent pattern control down to 500 Hz
- Rotatable mid- and high-frequency constant directivity waveguides
- Partially-weatherized PI and fully-weatherized FG versions available with gland nut and stainless-steel grille rated IEC 60529 IP55
- Integrates easily with EVF Low Frequency and Subwoofer Systems
- EN54-24 type B certification 1438-CPR-0299 with CDG cover installed (Only available in select regions)

The Electro-Voice EVH-1152D/96 is a high-power, two-way horn-loaded coaxial loudspeaker system that can be used in a wide variety of applications where excellent intelligibility, wide bandwidth directivity control, and high efficiency are required in a compact, cost-effective package.

For high frequencies, the EVH-1152D/96 utilizes the DH7N, a high-output 3-inch titanium compression driver, coupled to a rotatable Constant Directivity 90° x 60° waveguide. Both the mid-bass and high frequency waveguides may be rotated to maintain uniform pattern control over the entire critical vocal range regardless of enclosure orientation. For low frequencies, the SMX2151 15-inch woofer was developed using FEA optimization for motor, suspension, and electrical design to ensure very low distortion, high efficiency, and maximum intelligibility at high SPL. The crossover uses steep, 24-dB peroctave slopes with equalization for very smooth response in the vocal range, linear off-axis response, and an HF protection circuit for long-term reliability. This combination of technologies results in extended frequency response and excellent pattern control down to 500 Hz.

The EVH-1152D/96 features make it ideal for many fixed-install applications. The trapezoidal enclosure is constructed out of weather-resistant birch and coated with EVCoat for enhanced durability. For protection against outdoor elements, weatherized versions are available (PI and FG). The enclosure is built with 28



M10 suspension points for single hang (four shoulder eyebolts included) or an array (optional HRK or VRK kits).

The innovative input panel provides Phoenix-style connectors (included in all models) and a dual gland nut cover plate (CDG included in PI and FG models). For convenience in temporary installation you may add a dual NL4 type connector cover plate (CDNL4). An external easy to access jumper card is provided with each loudspeaker to assist you in the selection of passive (standard shipping configuration) or bi-amp operation. An available 70.7/100 Volt internal transformer kit (TK-150) may be easily mounted to the input panel for use in distributed systems. No matter what the application and budget, all these features provide you with the tools to increase flexibility during system design to meet and support your customer's requirements with fewer items in inventory.

EVF and EVH loudspeakers feature precise acoustics and rigging design for easy to configure vertical and horizontal arrays as part of the solutions provided in the EV innovation family.

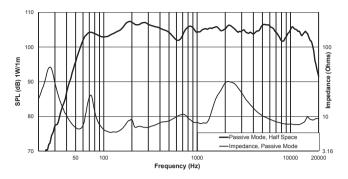
Technical specifications

Frequency response (-3 dB)	60 Hz-17 kHz ¹
Frequency range (-10 dB)	50 Hz-20 kHz ¹
Rotatable coverage	90° x 60°
Rec. high-pass frequency	60 Hz

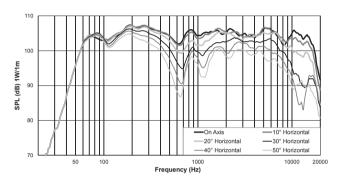
Passive crossover frequency	1300 Hz			
Axial sensitivity	105 dB (1 W/1 m) ¹			
Max. calculated SPL	138 dB ¹			
Passive power handling	500 W continuous, 2000 W peak ²			
Impedance	8 ohms (nominal), 6.0 ohms (min.)			
Transformer	70 V	100 V	Z nom	
Standard 50 Hz BW24 high pass	37.5 W	75 W	130 ohms	
	75 W	150 W	65 ohms	
	150 W	Do Not Use	e 33 ohms	
Transformer	70 V	100 V	Z nom	
89 Hz high pass per EN54-24 spectrum	50 W	100 W	100 ohms	
	100 W	200 W	50 ohms	
	200 W	400 W	25 ohms	
LF transducer - SMX2151, 15 in	(381 mm) drive	r		
LF axial sensitivity	106 dB (1 W/1	m) ⁴		
LF max. calculated SPL	138 dB			
LF power handling	400 W continuous, 1600 W peak ³			
LF impedance	8 ohms (nominal), 6.1 ohms (min.)			
HF transducer - DH7N, 3 in (76 m	nm) diaphragm (compression (driver	
HF axial sensitivity	111 dB (1 W/1 m) 4			
HF max. calculated SPL	136 dB			
HF power handling	75 W continuous, 300 W peak ³			
HF impedance	8 ohms (nominal), 6.0 ohms (min.)			
Connectors	Dual four-pin 10 AWG Phoenix/ Euroblock screeterminals	CDG d w- input p	PI/FG versions: CDG dual-gland-nut input panel cover included	
Enclosure	13-ply weather- resistant birch with EVCoat FG version: 13-p weather-resistant birch with fiberglass finish		er-resistant vith	
Grille	16 GA powder- coated galvann with rotatable l	eal Stainle	versions: ess steel with phobic cloth	
Environmental	IEC 60529 IP5	5 for PI and F	G versions	
Suspension	(28) M10 threaded suspension points			
Dimensions (H x W x D)	30.26 in x 30.26 in x 26.77 in			
	(768.6 mm x 768.6 mm x 680.1 mm)			
Net weight	145.5 lb (66.1 kg)			
Shipping weight	160.5 lb (72.9	kg)		

¹Half-space measurement

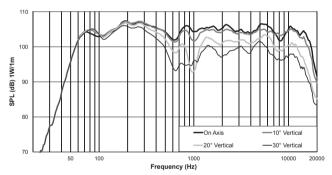
Frequency Response and Impedance:



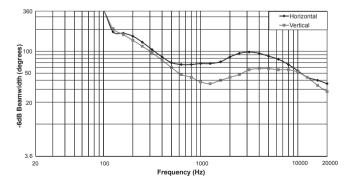
Horizontal Off-Axis Frequency Response:



Vertical Off-Axis Frequency Response:



Beamwidth (Active):

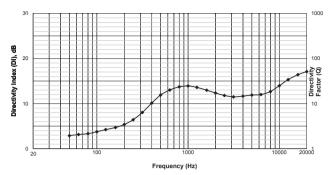


²EIA RS-426A, tested for eight hours

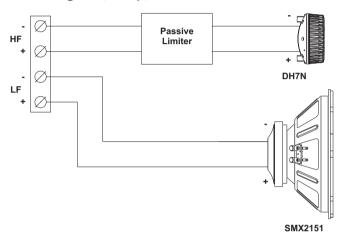
³AES 2-1984, tested for eight hours

 $^{^4\}mathrm{Arithmetic}$ averages, 300-1,300 Hz (LF) and 1,300-5,000 Hz (HF)

Directivity (Active):

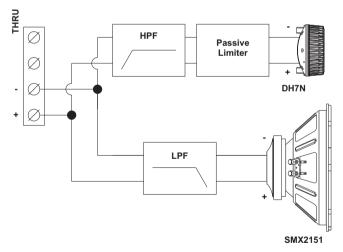


Block Diagram (Biamp):



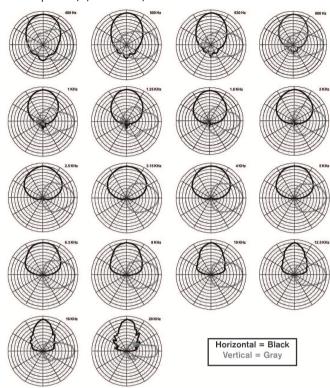
Block Diagram (Passive):

Standard shipping configuration



Horizontal and Vertical Polar Response (Active):

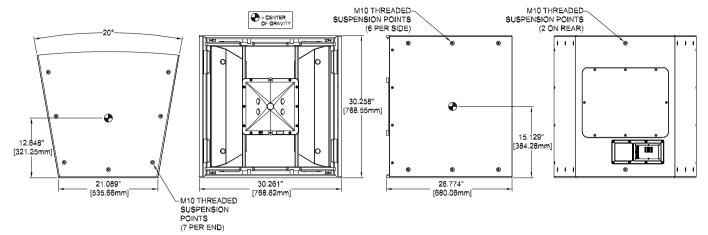
Polar plots (1/3 octave)



- (i) Notice
 Using EVH-1152D v.1.1 DSP standard IIR settings for the Beamwidth, Directivity and Polar Response.
- (i) Notice

Acoustic measurement reference axis is the center of the grille.

Dimension Drawing:



(i) Notice

This Electro-Voice loudspeaker should be suspended overhead only in accordance with the procedures and limitations specified in the User's Manual. This system should be suspended with certified rigging hardware by an authorized rigging professional and in compliance with local, state, and federal overhead suspension ordinances.



1438

Bosch Security Systems Inc. 12000 Portland Ave South, Burnsville, MN 55337, USA

1438-CPR-0299

EN 54-24:2008

Voice alarm loudspeakers
for fire detection and fire alarm systems for buildings

Loudspeakers type: EVH-1152D/43, EVH-1152D/64, EVH-1152D/96, EVH-1152D/94, EVH-1152D/96, EVH-1152D/99 (BLK, WHT, PIB, PIW)

DoP: REG000666000

EN54-24 type B certification 1438-CPR-0299 with CDG cover installed (Only available in select regions)

Compatible System Solutions:

	compatible system solutions.
EVH-1152D/43	40° x 30° Coverage
EVH-1152D/64	60° x 40° Coverage
EVH-1152D/66	60° x 60° Coverage
EVH-1152D/94	90° x 40° Coverage
EVH-1152D/99	90° x 90° Coverage
EVF-2151D	Dual 15 inch Bass Element
EVF-1181S	Single 18 inch Bass Element
DX46	Dx46 Loudspeaker Controller ⁵
N8000	N8000 Digital Matrix Controller ⁵
CPS2.9	CPS 2.9 Power Amplifier ¹

Compatible System Solutions:

CPS2.12	CPS 2.12 Power Amplifier ¹
CPS4.10	CPS 4.10 Power Amplifier ¹

¹Contact your sales representative for voltage information.

Ordering information

EVH1152D96BLB 15" speaker 90x60 indoor black

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, EVCoat, black SMX/DH7N

Order number EVH1152D96BLB | F.01U.272.810

EVH1152D96WLB 15" speaker 90x60 indoor white

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, EVCoat, white SMX/DH7N

Order number EVH1152D96WLB | F.01U.272.811

EVH1152D96PBLB 15" speaker 90x60 weathrized black

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, PI-weatherized, black SMX/DH7N

Order number EVH1152D96PBLB | F.01U.272.822

EVH1152D96PWLB 15" speaker 90x60 weathrized white

15" / 2 Way Fullrange Systems; SMX woofer & ND2B driver or DH7N driver - 500W cont.; 90 ° x 60°, PIweatherized, white SMX/DH7N

Order number EVH1152D96PWLB | F.01U.272.821

EVH1152D96-FBLB 15" speaker 90x60 fiberglass black

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, Fiberglass, black SMX/DH7N

Order number EVH1152D96-FBLB | F.01U.272.981

EVH1152D96-FWLB 15" speaker 90x60 fiberglass white

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, Fiberglass, white SMX/DH7N

Order number EVH1152D96-FWLB | F.01U.272.982

EVH-1152D/96-BLKE

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, EVCoat, black SMX/DH7N — EN54-24 certified Order number **EVH-1152D/96-BLKE | F.01U.246.022**

EVH-1152D/96-WHTE

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, EVCoat, white SMX/DH7N — EN54-24 certified Order number EVH-1152D/96-WHTE | F.01U.246.023

EVH-1152D/96-PIBE 15" 90x60 weatherized black EN54-24

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500 W cont.; 90° x 60°, Plweatherized, black SMX/DH7N — EN54-24 certified Order number **EVH-1152D/96-PIBE** | **F.01U.246.024**

EVH-1152D/96-PIWE 15" 90x60 weatherized white EN54-24

15" / 2-way Full-range Systems; SMX woofer & ND2B driver or DH7N driver - 500W cont.; 90 ° x 60°, Plweatherized, white SMX/DH7N — EN54-24 certified Order number **EVH-1152D/96-PIWE** | **F.01U.246.025**

Accessories

CSG-LB Input panel cover plate single gland nutSingle gland nut cover kit for EVA, EVC, EVF & EVH, black
Order number **CSG-LB | F.01U.283.496**

CDG-LB Input panel cover plate, dual gland nut Dual gland nut cover kit for EVA, EVC, EVF & EVH Order number CDG-LB | F.01U.283.497

CDNL4-LB Input panel cover plate, dual NL4 typeDual NL4 cover kit for EVA, EVC, EVF & EVH, black
Order number **CDNL4-LB | F.01U.283.495**

TK-150 70/100 Volt transformer kit Transformer kit for EVC, EVF, and EVH, 150W/70V Order number TK-150 | F.01U.132.318

HRK-2B-LB Horizontal rigging kit black, EVF + EVH
Horizontal rigging kit for EVF & EVH full-range to EVF sub,

Order number HRK-2B-LB | F.01U.283.504

HRK-2W-LB Horizontal rigging kit white, EVF + EVHHorizontal rigging kit for EVF & EVH full-range to EVF sub, white

Order number HRK-2W-LB | F.01U.283.505

HRK-3B-LB Horizontal rig kit black, EVH + EVH Horizontal rigging kit for EVH, black Order number HRK-3B-LB | F.01U.283.498

HRK-3W-LB Horizontal rig kit white, EVH + EVH Horizontal rigging kit for EVH, white Order number HRK-3W-LB | F.01U.283.499

VRK-2B-LB Vertical rigging kit black, EVF + EVH

Vertical rigging kit for EVF & EVH full-range to EVF subs, black

Order number VRK-2B-LB | F.01U.283.508

Represented by:

black

Germany: Bosch Sicherheitssysteme GmbH Robert-Bosch-Ring 5 85630 Grasbrunn Germany www.electrovoice.com

Bosch Security Systems, LLC 12000 Portland Avenue South Burnsville MN 55337 USA

VRK-2W-LB Vertical rigging kit white, EVF + EVH

Vertical rigging kit for EVF & EVH full-range to EVF subs, white

Order number VRK-2W-LB | F.01U.283.509

VRK-3B-LB Vertical rig kit black, EVH + EVH Vertical rigging kit for EVH, black Order number VRK-3B-LB | F.01U.283.500

VRK-3W-LB Vertical rig kit white, EVH + EVH Vertical rigging kit for EVH, white Order number VRK-3W-LB | F.01U.283.501