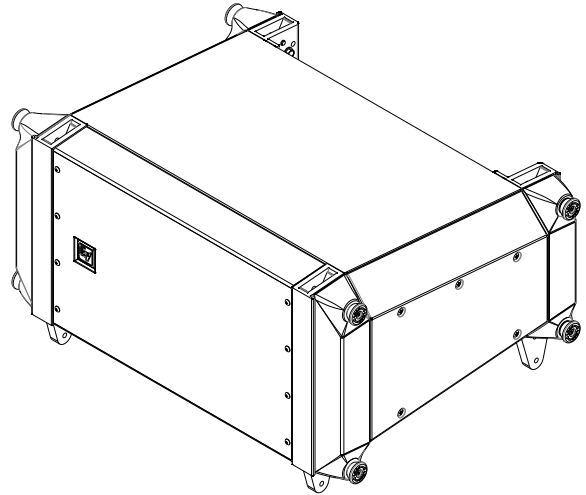


X2-212/90



Electro-Voice

- **MBH** – Mid-Band Hydra Line Source Technology
- **PDH** – Pin Diffraction Hydra
- **IRS** – Integrated Rigging System
- Proprietary EV FIR-Drive



The X2-212/90 from Electro-Voice is a two-way vertical line array loudspeaker can be used in a wide variety of applications where wide bandwidth, vertical and horizontal directivity control, and high efficiency are required in a compact cost-effective package. For high frequencies, the X2-212/90 utilizes two (2) ND6A high-output large format 3-inch titanium compression drivers directly coupled to a pair of PDH Plane Wave Generators on a 90° waveguide optimized for uniform pattern control and smooth, linear response. For low frequencies, the DVN3125 12-inch neodymium woofer was developed using Finite Element Analysis to optimize motor, suspension, and electrical design for very low distortion, high efficiency, and maximum intelligibility at high SPL. The MBH effectively emulates the acoustic behavior of a double line of four (4) 3-inch point sources to deliver superior mid-band coupling while maintaining the efficiency, power, and bandwidth of a 12-inch transducer. The Bi-amp only X2-212/90 requires proprietary Electro-Voice FIR-Drive.

Electro-Voice FIR-Drive is the combination of *brick wall* crossovers, phase correction, FIR EQ, peak anticipation limiter and Thermal Limiter. These technologies yield superior, nearly inaudible transducer protection with linear summation, smooth off-axis response, and unparalleled acoustical performance over the critical vocal and instrument range regardless of array size.

The X2-212/90 is a premium solution for demanding live sound reinforcement and fixed-install applications. The vertical trapezoidal enclosure is constructed of

weather-resistant birch and coated with EVCoat for enhanced durability. The enclosure features the IRS, a captive twist-lock multi-angle arraying system designed by Electro-Voice to significantly reduce load-in/load-out time of any size array. IRS has been engineered with the flexibility to deploy a system using the two (2) most common methods of array set-up:

- Compression method by using a pull-up kit (Sold separately).
- Fixed angles locked by using secondary rigging pins (Included).

X2-212/90 with IRS rigging is rated for use for up to 24 elements for normal arrays. **LAPS 3** or higher (Line Array Prediction Software) accurately provides fast array configuration for coverage results, rigging details and allowed rigging configurations. It also provides information for the creation of steered/shaped subwoofer arrays.

The input panel provides dual Neutrik NL8 connectors for fast connectivity between loudspeakers. X2-212/90 is Bi-amp operation only.

The advanced acoustic and mechanical designs of X2 series loudspeakers, combined with LAPS 3, provide the tools and flexibility to easily design and deploy high performance vertical line array systems.

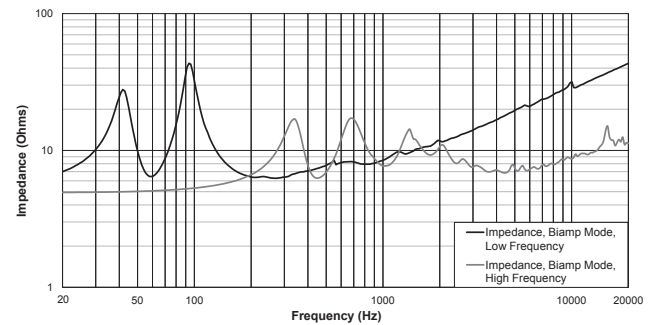
Technical specifications

Frequency Response (-3 dB):	52 Hz - 19 kHz ¹
Horizontal Coverage:	90°
Vertical Coverage:	Array dependent
Rec. High-Pass Frequency:	50 Hz
Max Calculated SPL:	146 db Peak ²
Configuration:	Bi-amp
LF Transducer:	DVN3125, 12-in (305 mm) driver
LF Axial Sensitivity:	101 db (1 W/1 m) ⁴
LF Power Handling:	500 W continuous, 2000 W peak
LF Impedance:	8 Ω (nominal), 6.1 Ω (min)
HF Transducer:	2 x ND6A, 3-in (76.2 mm) diaphragm compression driver
HF Axial Sensitivity:	112 db (1 W/1 m) ⁴
HF Power Handling:	150 W continuous, 600 W peak ³
HF Impedance:	8 Ω (nominal), 6.0 Ω (min)
Connectors:	Dual NL8 type connector
Enclosure:	13-ply weather resistant birch with EVCoat
Grille:	16 GA powder coated galvalneal
Suspension:	IRS—Integrated Rigging System
Dimensions (H x W x D):	13.5 in x 28.77 in x 12.04 in (342.9 mm x 730.8 mm x 534.4 mm)
Net Weight:	93 lb (42.2 kg)
Shipping Weight:	107 lb (48.5 kg)

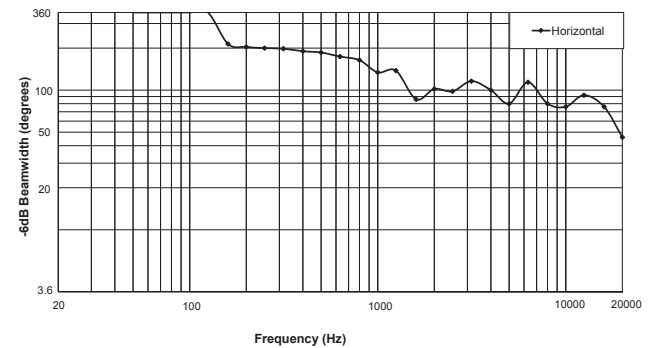
1. Full-space anechoic array performance with FIR-Drive preset.
2. Full-space measurement of HF section of 4 elements. SPL adjusted for 1m distance.
3. AES 2-1984 power test.
4. Full-space anechoic measurement of a single element.


System overview

Impedance:

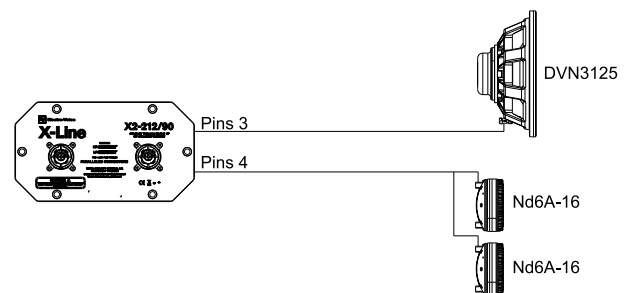


Beamwidth (Active):

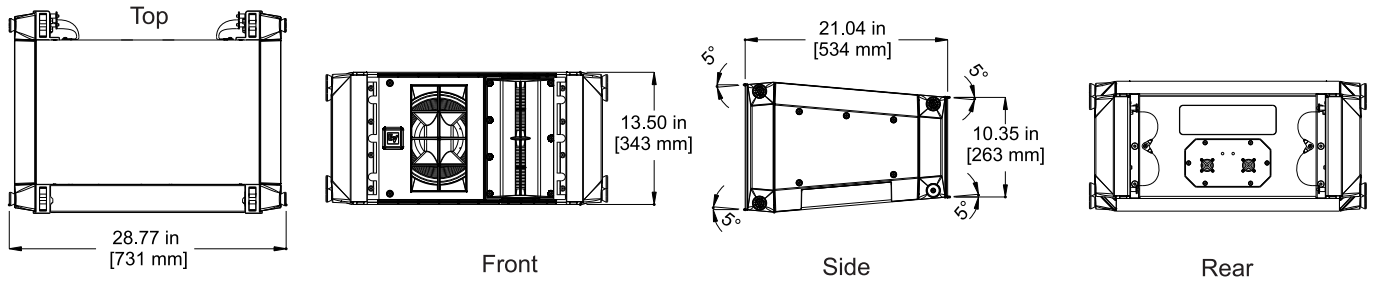


Notice!
 Using X2-212/90 v.0.2 DSP FIR-Drive settings for the Beamwidth.

Block Diagram:



Dimensions:



Notice!

Acoustic measurement reference axis is the center of the grille.



Notice!

Do not mix X1 and X2 full-range loudspeaker model types in the same vertical array. Although enclosure and rigging is identical for X1 and X2 line array elements they are designed to use only one (1) model type in a vertical array.

Compatible System Solutions:

N8000-1500	N8000-1500 NETMAX Controller including DSP-2 Extension for a total of 1800 MIPS processing power, 12V. *This must be ordered as two (2) separate items: (1) N8000 120 V and (1) DSP-2. ⁵
DM-1	DM-1 NetMax Dante audio network module
TG7	Tour Grade 7 Power Amplifier ^{5,6}
RCM-28	OMNEO Network and DSP Module for Tour Grade Amplifiers

- Contact your sales representative for available voltage versions.
- Maximum recommended three (3) elements in parallel for a 2.6 ohm load.

Caution!

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



Ordering information

X2-212/90

X2 high performance compact 2-way 1 x 12-inch 90° line array; black
Order number **X2-212/90**

Accessories

X12TC-GRID

Compact grid for up to 24 X1 or X2 tops, black
Order number **X12TC-GRID**

X12TE-GRID

Extended grid for up to 24 X1 or X2 tops, black
Order number **X12TE-GRID**

X12PU-BGK

Pull up bottom grid kit for X1/X2 tops, black
Order number **X12PU-BGK**

X12T-DOLLY

Dolly for six X1 or X2 tops, black
Order number **X12T-DOLLY**

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