Forsythe Series

EAW KF400C "One Box" Full Range Sound Reinforcement System



System Features:

- High Output 137 dB SPL
- Wide Bandwidth 40 to 20,000 Hz (with Optional TAD Driver)enabling the reproduction of all the subtleties in modern electronic keyboard based music.
- Advanced Mid-Bass Forsythe MR102L for low distortion vocal reproduction at high sound pressure levels.
- Constant Horizontal Coverage 90 degrees to 16k Hz is ideal for side stage monitor or large cluster use.
- High Technology RCF LAB Drivers including the new RCF L18/851 18-in driver with 1000 watts AES power handling.

Introduction

The EAW Forsythe Series KF400 is a horn loaded high output, three way, sound reinforcement loudspeaker system. Its "One Box" design permits ease of transport and also of ensures optimum driver alignment and integration for ideal frequency and phase response linearity. The KF400 benefits from the years of development EAW has amassed since we introduced the world's first "One Box" horn system the KF-550.

Applications

The KF-400 is intended for use in high sound reinforcement, music playback, motion picture sound, and performing arts appli cations. It will produce sound pressure levels greater than 135 dB @ 1m over the 40 to 16,000 Hz band. Its ability to provide natural sonic reproduction nearfield at high sound pressure levels make it a natural side stage monitoring system. As with all EAW horn loaded

Low Frequency Section

The KF400 makes use of a vented low frequency horn with a RCF LAB L18/851 440mm 0 8-inch) bass driver. This design offers full horn loading and flat response down to 90 Hz, with extended usable response down to 40 Hz. The horn uses a true mathematical exponential flare for maximum output and response linearity. The flare is constructed of 3mm birch with polyurethane foam reinforcement for best rigidity.

Mid Frequency Section

The mid-frequency section of the KF400 consists of EAW's famous MR102L mid bass horn and RCF LAB L12/P11W 300mm (12-in) driver. This design is in use in hundreds of systems throughout the world. It has become the recognized standard where sonic quality is the first priority. It provides smoother response, lower distortion and better pattern control than any other device on the market.

High Frequency Section

The high frequency section of the KF400 consists of the EAW HF590Z constant coverage horn and TAID 4001 or EC320A high frequency driver. For applications where maximum high frequency energy is required, the TAD 4001 driver offers flat response up to 20,000 Hz. The NEW HF590Z provides uniform coverage to beyond 16,000 Hz

Architect's & Engineer's Specifications

The loudspeaker system shall be of the three-way type, with all component drivers horn loaded. The mid and high frequency horns shall provide a minimum of 90 degrees horizontal coverage to beyond 16,000 Hz. Mid frequency horn shall utilize a center displacement plug for off axis response to 1,500 Hz +- 4 dB. The bass horn shall be of the vented horn type incorporating one 18-inch low frequency loudspeaker. The system shall meet the following performance criteria: Frequency range:40 to 20k Hz. Pressure sensitivity: 106 dB SPL I w@1m LF, 109 dB PSL I w@1 m MF and 110 dB SPL I w@1 m HF. Power Handling in accordance with AES standard specification: 1000 watts LF, 400 watts MF, 100 watts HF. Horizontal coverage: 90 degrees between -6 dB points.

The cabinet shall be constructed of void-free crossgrain-laminated birch plywood with polyurethane foam reinforcing for the mid and low frequency horns and coated with catalized polyurethane finish. All the drivers shall be protected with a perforated steel grill coated in vinyl.

The loudspeaker system shall be the Eastern Acoustic Works model KF400.

Specifications

MODEL: KF400C

Frequency Response 40 to 20kHz-10 dB

90 to 17,000 Hz+- 3 dB

Axial Sensitivity:

(1w@1m)) LF: 106 dB SPL

MF: 109 dB SPL HF: 110 dB SPL

Power Handling LF:1000/350 watts (AES/ Sine Wave) MF: 400 / 150 watts

HF: 100 / 60 watts

Coverage Angles

Horizontal: 90 degrees Vertical: 40 degrees

Max SPL: 136 dB SPL

Maximum Acoustic

Output: 200 acoustic watts

Transducer complemented

Low Frequency: LAB L18/851
Mid Frequency: LAB L12.P11W
High Frequency: TAD 4001

Recommended crossover

Frequencies: Minimum 18 dB/octave

250 Hz, 1,500 Hz

Enclosure Type: Horn loaded

Construction: Birch Ply-Hardwood with

Polyurethane reinforcing

Finish: Black Polyurethane

Dimensions: 55.12x29.75x25.6 inches

Specifications subject to change without notice.