Sazka Arena Opens to Rave Reviews with Apogee Speakers

Sazka Arena, Prague, Czech Republic

The Challenge

• Provide audio for modern multipurpose venue in Europe, attracting 1,500,000 visitors annually
• Meet wide-ranging audio needs in an arena that hosts sporting events, classical music concerts, opera, rock concerts, exhibits, fairs, and other events
• Enable 18,000 spectators to hear music and announcements

The Solution

Sazka Arena, Prague, Czech Republic, is a multipurpose venue. Designed to serve as the Czech Republic’s leading social, entertainment and shopping area, the arena seats 18,000 visitors in the main area; 2,460 in the club area; 2,900 in bars, restaurants and cafes; and more in 66 skyboxes and 4 party boxes. With 376,736 square feet of floor space, this arena hosts concerts, sporting events and other performances. In an area that has a long history of taking its sound seriously, SONING, one of the Czech Republic’s leading consulting firms, focused on the latest technologies to ease the difficult task of using one facility for a wide variety of events. With such diverse sound requirements, an Apogee Sound system was installed to meet the venue’s needs.

The arena includes closed circuit TVs, a TV studio, display panels, a giant video cube, illumination, telecommunication systems, and AES/EBU (Audio Engineering Society/European Broadcasting Union) digital audio distribution all the way to the loudspeakers. SONING’s design for the sound system uses 90 Apogee Powered Loudspeakers (APL-500) flown in eight clusters near the main floor's perimeter. Also, a ring of APL-500 speakers cover the upper-most seating areas. Additionally, 8 Apogee Powered Loudspeakers (APL-800) are mounted under the center scoreboard.

System Components

Apogee Powered Loudspeakers (APLs) provide the same superior sound quality Apogee’s non-powered models are known for. These speakers rely on compact, internal amplifiers that equal or exceed the power and fidelity of traditional amplifiers that are mounted away from the speaker. In addition, the Apogee APL speakers with the integral amplifiers weigh far less than traditional speakers. Patented amplifier technologies eliminate the need for cooling fans, greatly reducing maintenance and extending service life.

Each speaker’s processor circuitry mates to the drivers using 8-order crossovers. Apogee's exclusive VIProtect™ circuits with voltage and current sensors increase driver linearity while reducing the likelihood of damage or failure. Installers can assemble the APL speakers in arrays and experience shows they produce lifelike sound when used alone or as the building block for a large system. The speakers provide high power (maximum sound pressure level of 125 decibels continuously at 1 meter), well-defined directional control, low distortion and accurate response. The APL speakers were designed with intelligent signal processing ability, making setup easy and fast.

The Results

Thanks to the superior sonic quality achieved by Apogee APL Series loudspeakers, visitors to Sazka Arena now attend their favorite events with the expectation of a pristine sound quality experience.

From sporting event announcements and paging to high fidelity concerts, all stadium broadcasts are clear and pleasing to the ear.

Speakers

The APL-500 has a 12-inch low-frequency driver and a 1-inch high frequency driver. The Apogee APL-800 loudspeaker features a 15-inch low frequency driver and a 2-inch high frequency driver. Both models are equipped with dual 400-watt RMS amplifiers. The speakers’ low-frequency and high-frequency drivers are treated with Ferrofluid® for greater power handling ability, lower distortion and control of short-term impedance rise.

Specifications

• 90 Apogee APL-500 Powered Loudspeakers
• 8 Apogee APL-800 Powered Loudspeakers
Key Products

APOGEE APL-500 Powered Loudspeakers (shown without grille)

APOGEE APL-800 Powered Loudspeakers (shown without grille)