FEATURES

- Exceptional audio clarity with small footprint and attractive styling
- Uniform coverage from coaxially mounted HF/LF drivers
- 6-position switch selects 70 V/100 V taps or low impedance bypass
- ETL listed to comply with UL 1480A, CSA 62368-1, CE marked, and RoHS compliant
- EN54-24 and ISO 7240-24 certification

TECHNICAL SPECIFICATIONS

<table>
<thead>
<tr>
<th>OPERATING MODE</th>
<th>Passive with selectable low-impedance or 70 V/100 V operation</th>
</tr>
</thead>
<tbody>
<tr>
<td>OPERATING ENVIRONMENT</td>
<td>Indoor/Outdoor</td>
</tr>
<tr>
<td>OPERATING RANGE (-10dB)²</td>
<td>58 Hz to 20 kHz</td>
</tr>
<tr>
<td>NOMINAL BEAMWIDTH (H x V)</td>
<td>120° x 120°</td>
</tr>
<tr>
<td>TRANSUCERS</td>
<td>LF 1 x 6.5” (165 mm) treated paper cone</td>
</tr>
<tr>
<td></td>
<td>HF 1 x 1” (25 mm) treated soft dome tweeter w/ waveguide</td>
</tr>
<tr>
<td>SENSITIVITY³</td>
<td>@ 1 m 89 dB (2.83 V)</td>
</tr>
<tr>
<td></td>
<td>@ 1 m 89 dB (1 W, 8 Ω)</td>
</tr>
<tr>
<td>NOMINAL CONTINUOUS POWER HANDLING²</td>
<td>40 V (200 W, 8 Ω Nominal Impedance)</td>
</tr>
<tr>
<td>NOMINAL MAXIMUM SPL² (Processed)</td>
<td>@ 1 m Continuous 112 dB</td>
</tr>
<tr>
<td></td>
<td>Peak 118 dB</td>
</tr>
<tr>
<td>RATED CONTINUOUS VOLTAGE⁶</td>
<td>31.6 V (30 dBV)</td>
</tr>
<tr>
<td>RATED MAXIMUM SPL² (Processed)</td>
<td>@ 1 m Continuous 109 dB</td>
</tr>
<tr>
<td></td>
<td>Peak 121 dB</td>
</tr>
<tr>
<td>TRANSFORMER</td>
<td>70 V: 80 W, 40 W, 20 W, 10 W; 100 V: 80 W, 40 W, 20 W</td>
</tr>
<tr>
<td>CROSSOVER / PROTECTION</td>
<td>1.58 kHz crossover, driver protection circuitry</td>
</tr>
<tr>
<td>REQUIRED ACCESSORIES</td>
<td>50 Hz, 12 dB / oct. Butterworth high pass filter; DSP preset</td>
</tr>
<tr>
<td>RECOMMENDED AMPLIFIERS</td>
<td>200 W - 400 W, 8 Ω (40 V - 57 V)</td>
</tr>
</tbody>
</table>

PHYSICAL

| INPUT CONNECTION | Lever-actuated wire clamping 4-position terminal block with pass-through |
| CONTROLS | Wattage / low impedance selector switch |
| MOUNTING PROVISIONS | ClickMount pan-tilt bracket or ClickMount U-Bracket |
| COMPLIANCE | ETL listed to comply with UL 1480A, CSA STD C22.2# 62368-1 ENS4-24, ISO 7240-24, IEC 62368-1 |
| ENVIRONMENTAL RATING | IP54 per IEC 60529, IEC 60068-2-5 (Solar Radiation), IEC 60068-2-11 (Salt Mist), IEC 60068-2-42 (SO2), IEC 60068-2-60 (Chlorine) |
| DIMENSIONS H x W x D | 349 mm x 217 mm x 220 mm [13.7” x 8.5” x 8.6”] |
| WEIGHT (loudspeaker only) | 6.5 kg [14.4 lbs] |
| FINISH | Refer to the Technical Drawings (pages 3-4) |
| MODELS (ORDER BY MOUNTING OPTION) | EX-S6-CM [-B,-W] - loudspeaker with small ClickMount pan-tilt bracket |
| | EX-S6-UB [-B,-W] - loudspeaker with ClickMount U-Bracket and ClickPlug |

APPLICATIONS

DISTRIBUTED

Bars and Restaurants · Hotels · Casinos
Shopping Malls · Health and Fitness Clubs
Houses of Worship · Presentation Spaces
Sports Facilities · Outdoor Entertainment
Exhibit Halls · Amusement and Theme Parks

DESCRIPTION

The Desono EX surface mount loudspeakers provide excellent acoustic performance in elegant, attractive aesthetics for a diverse range of indoor and outdoor distributed applications. EX Series includes three two-way, full-range models and one matching-enclosure subwoofer. All full-range models include 70 V/100 V transformers and low impedance inputs. They deliver high voice intelligibility, wide bandwidth and exceptional uniform coverage.

The Desono EX-S6, the smallest member of EX Series, 6.5” two-way surface mount loudspeaker provides discreet, distributed sound in applications requiring exceptional audio clarity with a small visual footprint. With its wide coverage angle at 120° and flat response down well below 80 Hz, the EX-S6 is optimal for near-field listening.

Designed for easy and fast installation, our innovative, patented ClickMount™ brackets provide installers with two distinct mounting options. The ClickMount pan-tilt bracket provides indexed aiming control and allows for mounting EX Series quickly in either vertical or horizontal orientation without moving the bracket position. The ClickMount U-Bracket is also available for low-profile mounting or exterior use and includes the ClickPlug with an integrated gland nut for weather-resistant applications. Both brackets are theft and tamper resistant.
DESONO
EX-S6
TWO-WAY COAXIAL 6.5-INCH SURFACE MOUNT LOUDSPEAKER

AXIAL PROCESSED SENSITIVITY (dB SPL)

HORIZONTAL OFF-AXIS RESPONSE (dB SPL)

AXIAL SENSITIVITY (dB SPL)

VERTICAL OFF-AXIS UP RESPONSE (dB SPL)

IMPEDANCE (Ω)

VERTICAL OFF-AXIS DOWN RESPONSE (dB SPL)

DIRECTIVITY INDEX (dB)

BEAMWIDTH (degrees)

Minimum Impedance: 6.2 @ 224 Hz

100%

50%

0%

-50%

-100%
DESONO
EX-S6
TWO-WAY COAXIAL 6.5-INCH SURFACE MOUNT LOUDSPEAKER

**TECHNICAL DRAWING / DIMENSIONS / FINISH [EX-S6-CM]**

**H x W x D**
349 mm x 217 mm x 220 mm
[13.7" x 8.5" x 8.6"]

**Unit Weight**
6.5 kg [14.4] lbs loudspeaker only
7.0 kg [15.5 lbs] loudspeaker + bracket

**Shipping Weight**
8.46 kg [18.7 lbs]

**Grille**
Powder-coated perforated Marine Grade aluminum backed with hydrophobic cloth
Black or White

**Enclosure / Bracket / Finish**
High-impact UL94 5VB rated polycarbonate/ABS blend, painted UV resistant matte finish
Bracket: Heavily reinforced glass-filled nylon with UV-resistant painted matte finish cover
Color: Black (RAL 9017) or White (RAL 9016)
DESONO

EX-S6
TWO-WAY COAXIAL 6.5-INCH SURFACE MOUNT LOUDSPEAKER

TECHNICAL DRAWING / DIMENSIONS / FINISH [EX-S6-UB]

H x W x D (loudspeaker)
349 mm x 217 mm x 220 mm
[13.7” x 8.5” x 8.6”]

Unit Weight
6.5 kg [14.4] lbs loudspeaker only
7.0 kg [15.5 lbs] loudspeaker + bracket

Shipping Weight
8.46 kg [18.7 lbs]

Grille and U-Bracket
Powder-coated Marine Grade aluminum. Grille is perforated and backed with hydrophobic cloth
Black (RAL 9017) or White (RAL 9016)

Enclosure / Finish
High-impact UL94 5VB rated polycarbonate/ABS blend, painted UV resistant matte finish
Black (RAL 9017) or White (RAL 9016)
DESONO
EX-S6
TWO-WAY COAXIAL 6.5-INCH SURFACE MOUNT LOUDSPEAKER

EX-S6-CM
EX-S6 Loudspeaker with ClickMount pan-tilt bracket

EX-S6-UB
EX-S6 Loudspeaker with ClickMount U-Bracket and ClickPlug

Pivot angle (portrait orientation)
Horizontal 120° in 10° increments
Vertical 56° in 8° increments (32° down-tilt)

U-Bracket
ClickPlug
Small ClickMount Pan-tilt Bracket

Pivot angle
200° in 10° increments

SPECIFICATIONS FOR EN54-24

<table>
<thead>
<tr>
<th>Specification</th>
<th>Low Z</th>
<th>80 W</th>
<th>40 W</th>
<th>20 W</th>
<th>10 W</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sensitivity (1 W, 4m)</td>
<td>76.5</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Maximum SPL (4m)</td>
<td>95.0</td>
<td>95.5</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Coverage (-6 dB)</td>
<td>500 Hz: 195°/165°</td>
<td>2 kHz: 115°/115°</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>1 kHz: 160°/130°</td>
<td>4 kHz: 95°/110°</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rated Impedance for Taps</td>
<td>7.5Ω</td>
<td>50Ω</td>
<td>100Ω</td>
<td>210Ω</td>
<td>430Ω</td>
</tr>
</tbody>
</table>

AXES AND PLANES

1. Reference Plane (green) is coincident with the front of the LF mounting ring
2. Reference Axis (black) perpendicular to the reference plane, passing through the center of the coaxial LF/HF driver
3. Horizontal Plane (red) intersects the reference plane and the vertical plane at a right angle and includes the reference axis
4. Vertical Plane (blue) intersects the reference plane at a right angle including the reference axis and the center point of the cabinet’s front radius

Biamp strives to improve its products on a continual basis. Specifications are therefore subject to change without notice. Data presented on this data sheet represents the basic performance specifications for the model. For a detailed analysis of this loudspeaker’s performance, please download the GLL file and/or the CLF file from our website: biamp.com
CAUTION: Installation of loudspeakers should only be performed by trained and qualified personnel. It is strongly recommended that a licensed and certified professional structural engineer approve the mounting design.