

- ▶ Suited for reverberant environments
- ▶ 20° Vertical, 140° Horizontal Coverage
- ▶ 400W Program
- ▶ Stylish and visually discreet design
- ▶ Extruded aluminium enclosure
- ▶ Low and High impedance available

Technical Specifications

Transducers:	16 x 2.75" Diameter
Nominal Impedance:	8 ohm
Minimum Impedance:	5.8 Ohm @ 3650 Hz
RMS Power⁽¹⁾:	200W (40V rms)
Program Power⁽²⁾:	400W
Peak Power⁽³⁾:	800W (80V peak)
Sensitivity (2.83v @ 1m):	94 dB SPL
Peak SPL⁽⁴⁾:	123 dB SPL
Frequency Range⁽⁵⁾:	130Hz to 23kHz (-10dB) 150Hz to 20kHz (-6dB)
High Frequencies:	Top (Opposite to the logo end)
Recommended High Pass Filter:	Butterworth 24dB/Oct, 100Hz
Horizontal Coverage (-6dB):	140°
Vertical Coverage (-6dB):	20°
IP Rating:	IP65
Enclosure:	Aluminium
Grille:	Aluminium, water proof fabric backing
Connectors:	Speakon and barrier strip
Color:	Black or white.
Rigging:	Wall mounting accessory Wall 16. +/-90° horizontal & from 0° to 10° downwards or upwards in two degrees steps
Dimensions (HxWxD):	1145x104x116 mm, 45x4.1x4.6 in
Net Weight:	11.2kg, 24.7 lb
Included accessories:	Wall mounting accessory Wall 16
Optional accessories:	UDA 16 TL

(1) Based on a 2h power test run with pink noise, 6dB crest factor, IEC filtered

(2) Conventionally, 3dB higher than the RMS Power

(3) Corresponds to the crest factor for the test described in 1

(4) Calculated based on peak Power and sensitivity

(5) Free Field

Overview

The UDA 16 is a high output, full range, frequency shaded passive column speaker which provides voice intelligibility and musical clarity in acoustically challenging environments such as shopping malls, houses of worship, restaurants, congress halls, hotels, airports, train stations, swimming pools, conference rooms or museums, where reflective surfaces create a reverberant sound field.

Each unit features sixteen 2.75" diameter transducers, 0.75" voice coil, in a closed box enclosure. A proprietary IST (Interdependent Shading Topology) network has been designed to keep constant the ratio wavelength-column size, which results in a controlled 20° vertical coverage in the vocal range. This makes the UDA 16 suitable to be installed in rooms with problematic sound reflections where vocal intelligibility is paramount.

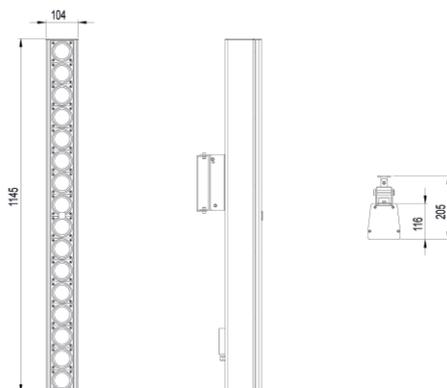
The narrow extruded aluminium enclosure has been designed for a seamless visual integration in every venue and is available in black or white finish. The grille is also made of aluminium and internally covered with a protective water repellent fabric which prevents splashed water and dust from damaging the transducers, featuring thereby an IP 65 protection rating. A wall mounting accessory is included allowing the column to be aimed up to +/- 90° sideways and from 0° to 10° downwards or upwards in two degrees steps.

The unit can be connected to either the input barrier terminal strip or an NL4 Speakon. Connections are protected by a metallic weather resistant cover featuring a cable gland on the bottom which prevents water or moisture from causing a shortcircuit.

The accessory UDA 16 TL (not included) allows for high impedance connection of the UDA 16. It houses a high quality 120Wrms@100V line transformer (60Wrms@70V) that makes it suitable for installations where long cables have to be deployed.

Tuning presets are available to enhance the frequency balance and intelligibility.

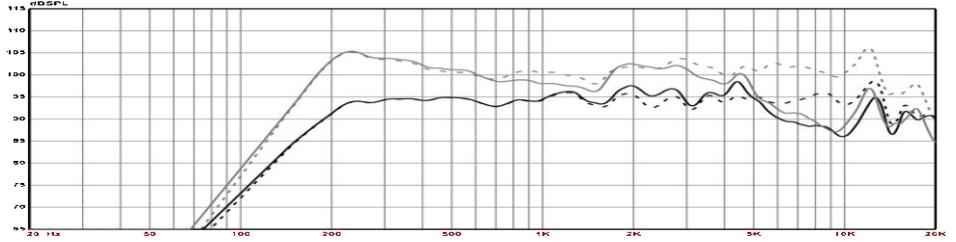
Dimensions



All dimensions in mm

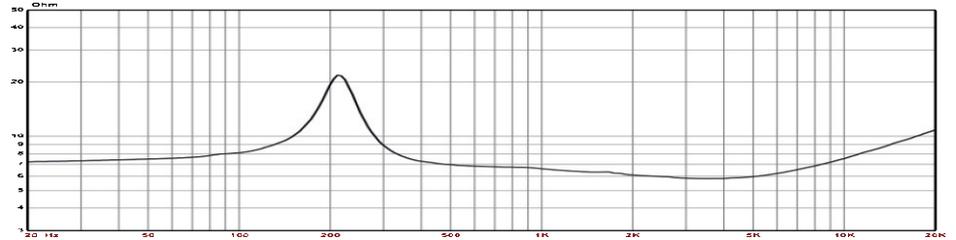
Frequency Response

On axis frequency response of UDA 16 driven by a swept sine wave signal at an input level of 2.83v. Measured in an anechoic chamber at 3m, SPL scaled down to 1m. In order to provide a more detailed frequency response curve only a 1/6th octave smoothing has been applied. Black Solid: 1 unit, without EQ. Black Dashed: 1 unit with recommended preset "UDA16_1UF1V1". Grey Solid: 2 units, without EQ. Grey Dashed: 2 units with recommended preset "UDA16_2UF1V1".

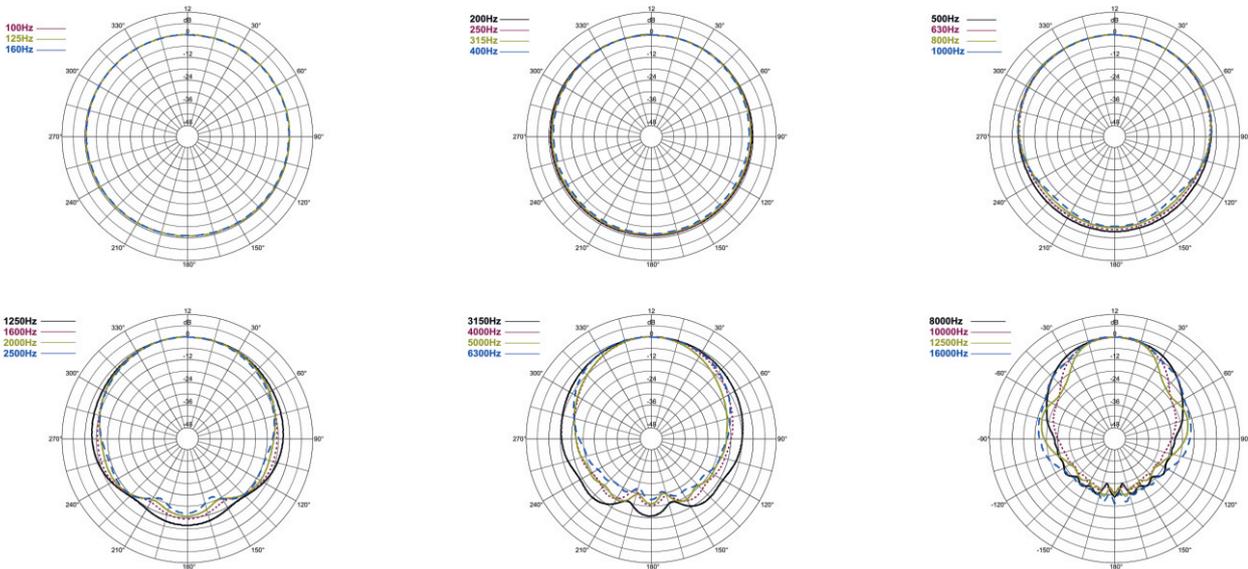


Impedance

Impedance curve of one UDA 16 unit measured with a stepped sinusoidal signal. Frequency resolution is 1/24th octave. In order to provide better magnitude resolution at lower impedance values a logarithmic vertical scale has been used.



Horizontal 1/3 Octave Polar Response



Vertical 1/3 Octave Polar Response (Left/Top Right/Bottom)

