

KORA-SA Datasheet



KORA-SA is a self powered 1kw, compact, aperiodical loaded subwoofer with fast transient and ultra-low frequency bass response. Designed to be flown or ground stacked to enhance the bass response of KORA /KORA-A line array system or used as a three-way design in conjunction with large format system arrays such as E-05.

Using a high-power, 1 kW Class D amplifier with integrated DSP. Signal XLR Input and link output along powerCON® TRUE1 power and output are provided on the amplifier connection plate. LED indicators for signal present, peak, RMS and clip situations are also included.

This power is fully controlled & protected and coupled to a simplified back panel which removes unauthorised modification with pre-set selection and adjustments to gain, combined with peak and RMS limiting, give issue-free installation and performances.

With exceptional low frequency of 34 Hz and fast response time of the 15" long excursion neodymium driver, the KORA-SA is capable of 131 dB SPL. The compact lightweight 45.5 kg



design with integrated bar handles makes this product perfect for portable use. With discreet installation in mind, the 444 mm low profile design allows for easy installation under industry standard fixed seating.

The discreet HEX steel grill design with reticulated foam backing and acrylic textured paint finish achieves a high class look suitable for any application.

Shown with optional flying hardware which is a symmetrical designed for rotation of each subwoofer for both front facing and cardioid arrangements.

The rear connection plate has two input and two link XLR connectors and a powerCON® TRUE1 input and link fitted as standard.

Key Features:

- Compact cabinet designed
- 30 Hz low frequency response
- Flying and groundstack with KORA / KORA-A line array units
- Durable scratch resistant black textured paint finish
- Integrated Flying system
- HEX design front grill with reticulated foam backing
- · Symmetrical design for cardioid sub arrangement
- Integrated Class D Power module
- World-wide voltage compatibility
- Module power efficiency of 89%
- Fully integrated Look-Ahead and RMS limiters
- Rebated Baltic Birch Plywood construction
- Full input and output protection modes
- 32 bit floating-point signal processing
- Analog Devices Sharc processor
- Wide dynamic range 128dB(A) input converter
- Genuine Neutrik® Signal and Power connectors



Technical Specifications

Design

1 x 15" Active subwoofer with integrated DSP, aperiodic tuning

Amplifier Gain

25 dB

Internal Power Amp

1000 w

Internal DSP

32-bit floating point signal processing using Sharc processing. Integrated Peak and RMS limiting

Sensitivity 2.83V / 1m

96 dB

Max. SPL

125 dB cont

131 dB peak

Frequency Response (±3 dB)

29 Hz - 150 Hz

Usable Frequency Range (-10 dB)

23 Hz - 180 Hz

Mains Input Voltage

110 - 240 V AC only

Mains Input Power Draw (max)

400 W

Dispersion

Omni

SYSTEM OPERATION

System Controller

Integrated DSP

Input connection

Balanced XLR input with parallel link outputs

Protection

Internal multi-band Peak and RMS Limiter. DC, HF and thermal protection

PRODUCT FEATURES

Components

1 x 15" Low Frequency Driver

Crossover

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Connectors

1 x XLR female, 1 x XLR male and and 1 x powerCON® True1 Connector male, 1 x powerCON® True1 Connector female

Dimensions (H x W x D mm)

440 x 572 x 630

Weight (kg)

45.5

Shipping Weight (kg)

46 (1 cabinet per carton)

Colour

Black

Options

Available in white or RAL colours on request

Rigging

Foot and cup stacking system, KORA Flying System, TP-1P threaded plate

HARDWARE

Fitted as Standard

KORA-SFH flying hardware, Ergonomic carry handles, Stacking foot system, TP-1P threaded plate

Optional

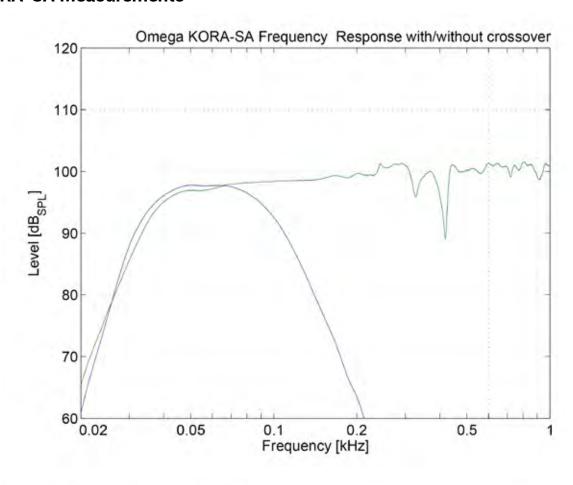
KORA-S dolly board, KORA-AF KORA array frame, TP-1 adjustable threaded pole

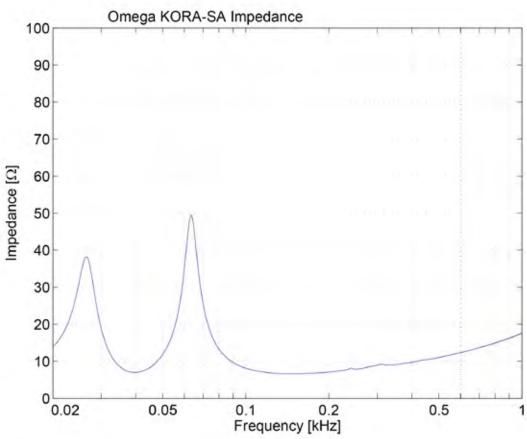
Additional Descriptive Data

Birch plywood construction, with durable scratch resistant black textured paint finish, kick-proof steel grill and internal black foam with Omega logo.

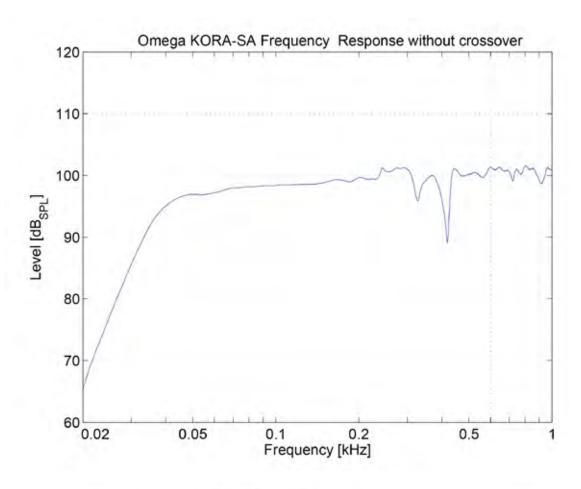


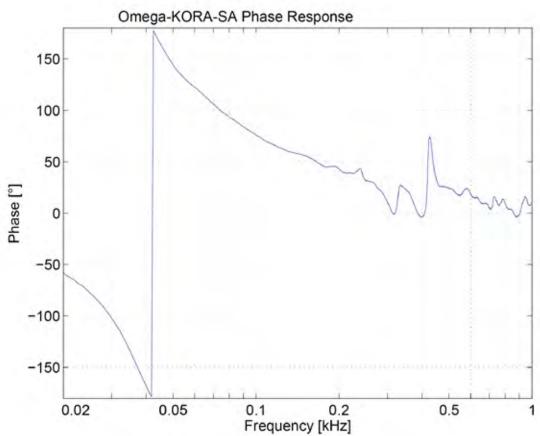
KORA-SA Measurements



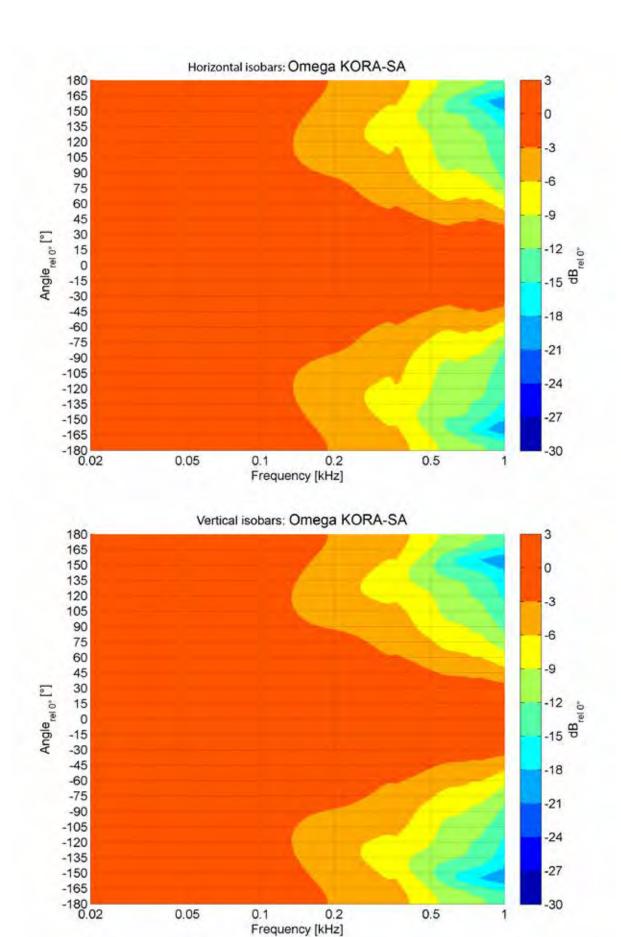








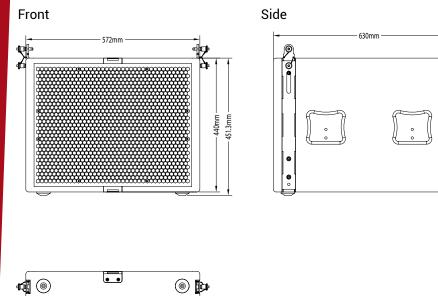


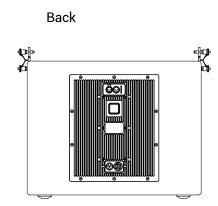


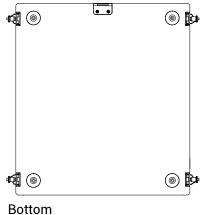
All Measurements are executed by the IFAA Institute for Acoustics in Aachen, Germany measurement conditions 4PI environment for full range cabinets, 2Pi environment for subwoofers.

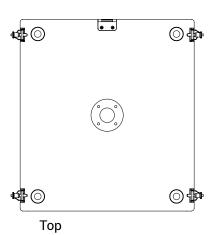


KORA-SA Dimensions





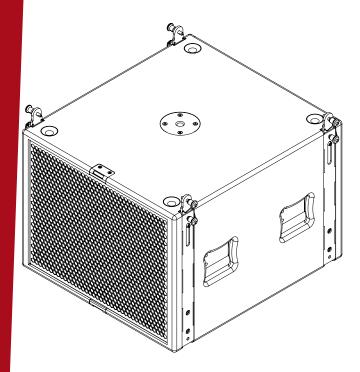


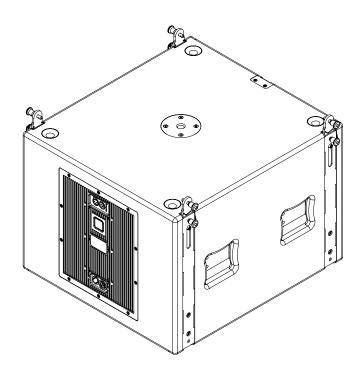


Further technical drawings for architectural requirements are available in DXF and DWG format for download on the website.



KORA-SA 3D View





Accessories and Spare Parts

- Stacking foot and cup system
- KORA-AF KORA array frame
- KORA-SFH KORA-S flying hardware
- 1 x 15" low frequency driver
- KORA-SA steel grill assembly
- Small Bar Handles
- KORA-SA backplate
- ST-CP castor pack
- KORA-SA dolly board



Architects' & Engineers' specifications:

Aperiodical loaded subwoofer design, housing 1 x 15" proprietary OHM low bass driver. Homogeneous radiating behaviour and linear response in the entire frequency range. Integrated active amplifier. Constructed from different multi-laminated wood, ecofriendly scratch resistant paint, Foot and cup stacking system to ensure cabinets stability when stacked in multiples, Flying system for hanging or groundstack to allow easy hang with KORA line array system, ergonomic carry handles, kick proof steel grill finished with internal reticulated foam and Omega logo.

Technical Data:

Frequency Response: 23 Hz - 180 Hz (-10dB), 29 Hz - 150 Hz (± 3 dB), Continuous SPL: 125 dB/1m, Program SPL 128 dB/1m, Peak 131 dB/1 m. Maximum Output: 1000 Watt LF, Dispersion Omni. Connectors: 1 x XLR female, 1 x XLR male and 1 x powerCON® True1 Connector male, 1 x powerCON® True1 Connector female. Dimensions (H x W x D): 440 mm x 572 mm x 630 mm, Weight: 45.5 kg. Options: Durable scratch resistant black textured paint finish. RAL colours available to order.

Safety Instructions

Professional speaker systems are able to produce sound pressure levels that could harm your health.

Never stand directly in front of loudspeakers for long periods. Whilst not immediately apparent to the listener, sound pressure levels in excess of 90dB@1m can be hazardous to the hearing.

Please refer to the following advice when setting up or dismantling OMEGA speaker systems.

- 1. Be sure to leave adequate distance between speakers and the public. Refer to your local authority for Health and Safety guidance when using loudspeaker systems.
- 2. Be sure to have safe and stable ground for your speakers, particularly when using speaker stands.
- 3. When stacking speaker systems, ensure they are secured to prevent individual speakers from falling down or moving around.
- 4. Only use OMEGA mounting hardware, as this has been specified and approved by KHZ LTD, for use with OMEGA speakers.
- 5. When flying speakers, appropriate materials and techniques must be employed in order to safely suspend enclosures, taking care to allow for specified enclosure weight.
- 6. Please observe any special instructions that appear on specific loudspeaker data-sheets.
- 7. Check your speaker hardware and flying material regularly for any visual or mechanical



Safety Instructions Cont.

failure. Replace damaged or suspect items when necessary.

- 8. Only use OMEGA DSP Solutions. Only technicians authorised by KHZ LTD are qualified to program digital controllers. Take note of recommended controllers as specified on the datasheets. Do not use OMEGA loudspeaker systems without the correct controller. If a system fails due to incorrect controller use, warranty is void.
- 9. Protect your speakers and electronics from freezing and do not expose them to humidity, water or rain without protection.

OMEGA loudspeakers and electronics are covered against defects in workmanship or materials for a period of two (2) years from original date of purchase. At the discretion of KHZ LTD, the defective item will be repaired/replaced with no charge for materials or labour. The item is to be adequately packed and dispatched, pre-paid, to an OMEGA authorised distributor/service centre. Unauthorised repair shall void the warranty. The OMEGA warranty does not cover cosmetics or finish and does not apply to any item which in OMEGA's opinion has failed due to user abuse, accident, modifications or any type of misuse.

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