

KAS10W700ND

LOW & MID FREQUENCY TRANSDUCER

KEY FEATURES — maltcross

- High power handling: 1.400 W program power
- Exclusive Malt Cross[®] Technology Cooling System .
- Low power compression losses .
- High sensitivity: 97 dB (1W / 1m) .
- FEA optimized neodymium magnetic circuit .
- Optimized non-linear behaviour .
- 3" DUO double layer in/out copper voice coil



TECHNICAL SPECIFICATIONS

250 mm

76,2 mm

97 dB 1W / 1m @ Z_N

10 in

8Ω

7,5 Ω

700 W_{AES}

65 - 4.000 Hz

1.400 W

 $V_{h} = 14$ l

21,8 N/A

0.054 kg

18 mm

10 mm

48 mm

3 in

 $F_{h} = 76 \text{ Hz}$

- Aluminium demodulating ring
- · Weatherproof cone with treatment for both sides
- Extended controlled displacement: Xmax ± 7 mm
- 48 mm peak-to-peak excursion before damage
- Weight 3,7 kg
- Optimized for bass or mid-bass high performance audio systems



THIELE-SMALL PARAMETERS³

Resonant frequency, f _s	63 Hz
D.C. Voice coil resistance, R _e	5,2 Ω
Mechanical Quality Factor, Q _{ms}	3,8
Electrical Quality Factor, Q _{es}	0,24
Total Quality Factor, Q _{ts}	0,22
Equivalent Air Volume to C _{ms} , V _{as}	20 I
Mechanical Compliance, C _{ms}	115 μm / N
Mechanical Resistance, R _{ms}	5,6 kg / s
Efficiency, η₀	2,1 %
Effective Surface Area, S _d	0,035 m ²
Maximum Displacement, X _{max} ⁴	7 mm
Displacement Volume, V _d	245 cm ³
Voice Coil Inductance, L _e @ 1 kHz	1 mH

Notes

¹ The power capaticty is determined according to AES2-1984 (r2003) standard

² Program power is defined as power capacity + 3 dB.

X_{damage} (peak to peak)

Nominal diameter

Rated impedance

Power capacity¹

Program power²

Frequency range

Recom. enclosure

Voice coil diameter

(Bass-reflex design)

Sensitivity

BI factor

Moving mass

Air gap height

Voice coil length

Minimum impedance

³T-S parameters are measured after an exercise period using a preconditioning power test. The measurements are carried out with a velocity-current laser transducer and will reflect the long term parameters (once the loudspeaker has been working for a short period of time).

⁴ The X_{max} is calculated as $(L_{vc} - H_{ag})/2 + (H_{ag}/3,5)$, where L_{vc} is the voice coil length and H_{ag} is the air gap height.



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120 180 100 150 80 120 [dB] 60 90 60 40 20 30 0 0 100 1 k 10 k [Hz]

Note: Frequency response measured with loudspeaker standing on infinite baffle in anechoic chamber, 1W @ 1m $\,$

Frequency response on axis
Frequency response 45° off axis

MOUNTING INFORMATION

Overall diameter	261 mm	10,3 in
Bolt circle diameter	243,5 mm	9,6 in
Baffle cutout diameter:		
- Front mount	228 mm	9,0 in
Depth	127 mm	5,0 in
Net weight	3,6 kg	7,9 lb
Shipping weight	4,1 kg	9,0 lb

DIMENSION DRAWING





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