

POWER 12/N

CAR AUDIO
Competition Series

KEY FEATURES

- Excellent power handling (500 W_{RMS})
- High sensitivity (91 dB)
- Designed for subwoofer applications

TECHNICAL SPECIFICATIONS

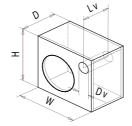
Nominal diameter 300 mm 12 in Rated impedance 4Ω Power capacity* 500 W_{RMS} **Program power** 1.000 W Sensitivity 91 dB @ 1W @ Z_N Frequency range 45 - 1.500 Hz Voice coil diameter 101,6 mm 4 in **BI** factor 20,9 N/A Moving mass 0,170 kg Voice coil length 25 mm 10 mm Air gap height

THIELE-SMALL PARAMETERS**

Resonant frequency, f _s	45 Hz
D.C. Voice coil resistance, R _e	3,7 Ω
Mechanical Quality Factor, Q _{ms}	4,8
Electrical Quality Factor, Q _{es}	0,41
Total Quality Factor, Qts	0,38
Equivalent Air Volume to C _{ms} , V _{as}	31,6 I
Mechanical Compliance, C _{ms}	$74~\mu m$ / N
Mechanical Resistance, R _{ms}	10 kg / s
Efficiency, η ₀	0,7 %
Effective Surface Area, S _d	$0,055 \text{ m}^2$
Maximum Displacement, X _{max} ***	10 mm
Displacement Volume, V _d	550 cm ³
Voice Coil Inductance, Le	1,0 mH

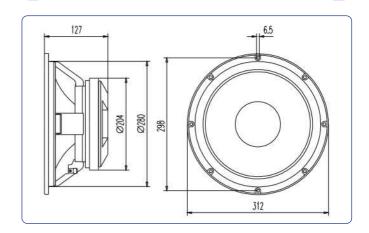
VENTED BOX

Volume	35 I	1,24 ft ³
Height	420 mm	16,54 in
Width	490 mm	19,29 in
Depth	240 mm	9,45 in
Wall thickness	19 mm	0,75 in
Nº of vents		1
D_V	100 mm	3,94 in
L_V	201 mm	7,91 in



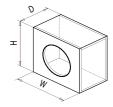


DIMENSION DRAWINGS



CLOSED BOX

Volume	35 I	1,24 ft ³
Height	420 mm	16,54 in
Width	490 mm	19,29 in
Depth	240 mm	9,45 in
Wall thickness	19 mm	0,75 in



Notes:

- * The power capaticty is determined according to AES2-1984 (r2003) standard. Program power is defined as the transducer's ability to handle normal music program material.
- ** T-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)
- *** 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.

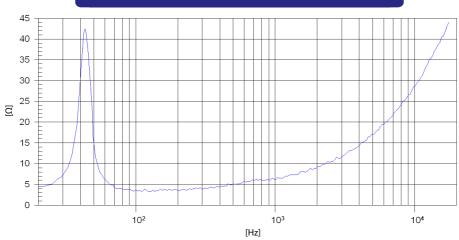
Drawings dimensions are refered to the external dimensions.



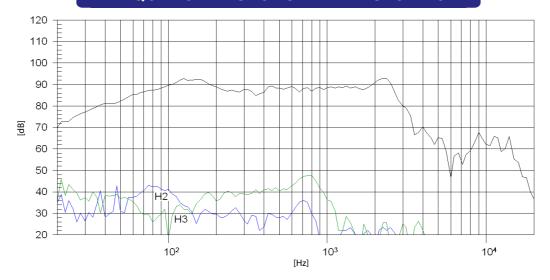
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FREE AIR IMPEDANCE CURVE



FREQUENCY RESPONSE AND DISTORTION



Note: On axis frequency response measured with loudspeaker standing on infinite baffle in anechoic chamber, 1W @ 1m

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