10G40

LOW FREQUENCY TRANSDUCER G40 Series

KEY FEATURES

- High power handling 400 W_{AES}
- High sensitivity: 95 dB (1W / 1m)
- 3" copper voice coil with polymide fiber glass former
- Large magnetic assembly for efficient heat disspitation
- Extended controlled displacement: X_{max} ± 7 mm
- 28 mm peak-to-peak excursion before damage
- Designed for woofer applications
- · Optimized for small bass-reflex cabinets





TECHNICAL SPECIFICATIONS

Nominal diameter	250 mm 1	0 in
Rated impedance		
•		8 Ω
Minimum impedance	6,	6 Ω
Power capacity ¹	400 W	AES
Program power ²	800	0 W
Sensitivity	95 dB 1W / 1m @) Z _N
Frequency range	45 - 4.000) Hz
Recom. enclosure vol.	20 / 70 I 0,7 / 2,	6 ft ³
Voice coil diameter	76,2 mm	3 in
BI factor	17	N/A
Moving mass	0,052	2 kg
Voice coil length	17,5	mm
Air gap height	7	mm
X _{damage} (peak to peak)	28	mm

THIELE-SMALL PARAMETERS³

Resonant frequency, f _s	45 Hz
D.C. Voice coil resistance, R _e	6,2 Ω
Mechanical Quality Factor, Q _{ms}	7,1
Electrical Quality Factor, Qes	0,32
Total Quality Factor, Qts	0,30
Equivalent Air Volume to C _{ms} , V _{as}	49 I
Mechanical Compliance, C _{ms}	241 μm / N
Mechanical Resistance, R _{ms}	2,1 kg/s
Efficiency, η ₀	1,4 %
Effective Surface Area, S _d	0,038 m ²
Maximum Displacement, X _{max} ⁴	7 mm
Displacement Volume, V _d	266 cm ³
Voice Coil Inductance, Le	0,6 mH

Notes

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

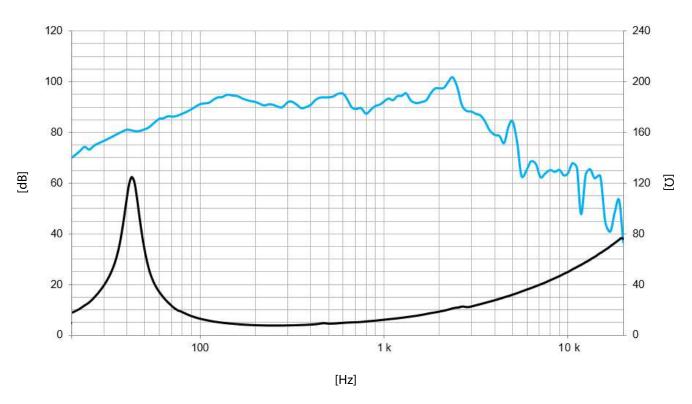
² Program power is defined as power capacity + 3 dB.

³ 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).

 $^{^4}$ 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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Note: Frequency response measured with loudspeaker standing on infinite baffle in anechoic chamber, 1W @ 1m

MOUNTING INFORMATION

Overall diameter	260,5 mm	10,3 in
Bolt circle diameter	243,5 mm	9,6 in
Baffle cutout diameter:		
- Front mount	228 mm	9,0 in
Depth	118 mm	4,6 in
Volume displaced by driver	3,0 I	0,10 ft ³
Net weight	5,7 kg	12,5 lb
Shipping weight	6,1 kg	13,4 lb

DIMENSION DRAWING

