

GENERAL CHARACTERISTICS

Nominal Overall Diameter	320	mm
Nominal Voice Coil Diameter	75	mm
Magnet Weight	360	g
Flux Density.....	1.21	T
Weight.....	3.10	Kg

THIELE-SMALL PARAMETERS

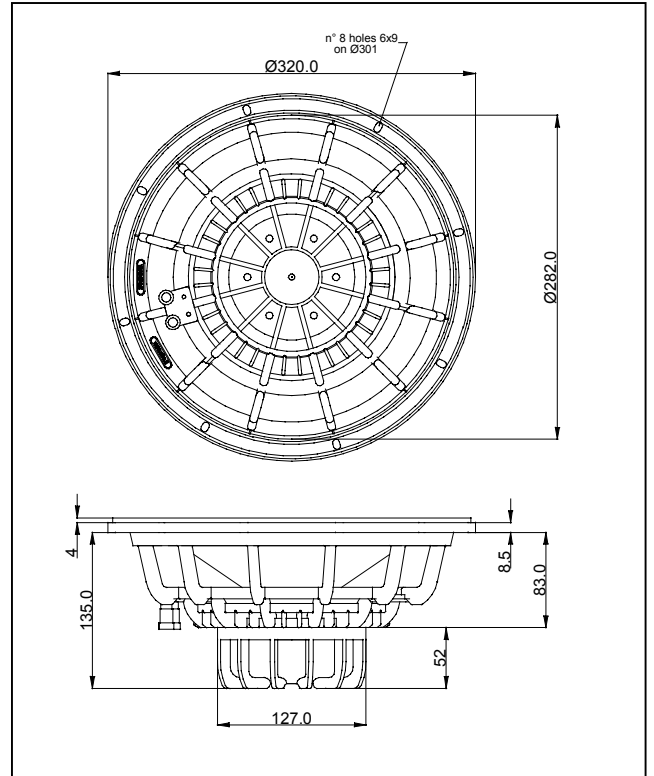
Voice Coil DC Resistance	R_E	5.27	Ω
Resonance Frequency	f_s	50.0	Hz
Mechanical Q Factor.....	Q_{MS}	10.07	
Electrical Q Factor.....	Q_{ES}	0.34	
Total Q Factor	Q_{TS}	0.33	
Mechanical Moving Mass	M_{MS}	58.7	g
Mechanical Compliance	C_{MS}	170	μm/N
Force Factor	$B \times l$	16.90	Wb/m
Equivalent Acoustic Volume.....	V_{AS}	69.0	lt.
Maximum Linear Displacement	X_{MAX}	+/-5.0	mm
Reference Efficiency	η_0	2.44	%
Diaphragm Area	S_D	530.9	cm ²
Losses Electrical Resistance.....	R_{ES}	156.3	Ω
Voice Coil Inductance @ 1kHz	L_E	0.60	mH

CONSTRUCTIVE CHARACTERISTICS

Magnet.....	Neodymium
Voice Coil Winding.....	Aluminium
Voice Coil Former.....	Kapton
Cone	Paper
Surround.....	Treated Cloth
Dust Dome	Solid Paper
Basket	Aluminium Die-Cast

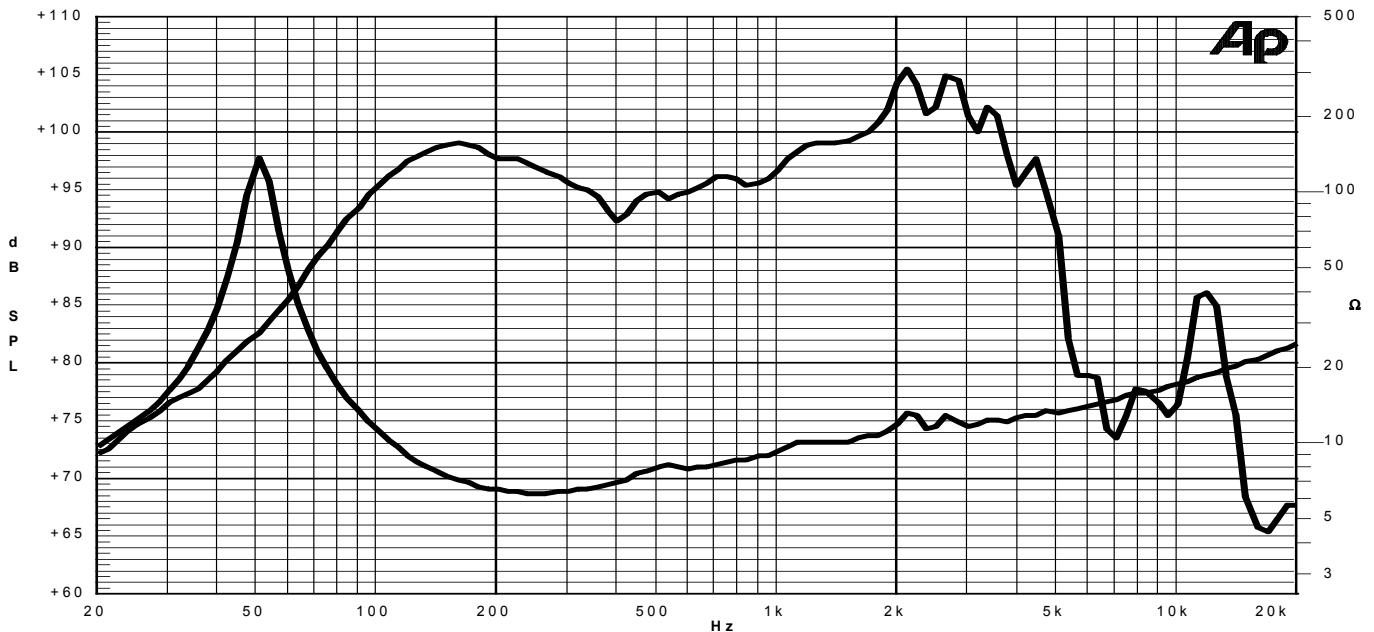
ELECTRICAL CHARACTERISTICS

Nominal Impedance.....	8	Ω
Musical Power	700	W
Rated Power*	350	W
Sensitivity @ 1 W, 1 m	97.9	dB



*rated power measured with 2 hours test with pink noise signal, 6 dB crest factor, loudspeaker mounted on enclosure
Thiele-Small parameters measured with LASER system

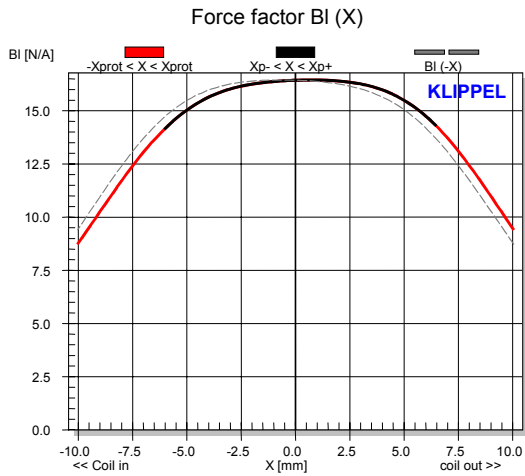
Frequency Response on IEC Baffle (DIN 45575) @ 1 W, 1 m - Impedance



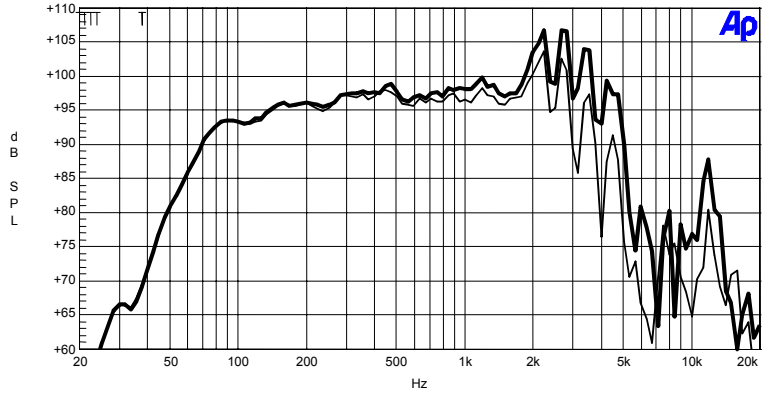
12K3

12" speaker – 3" voice coil

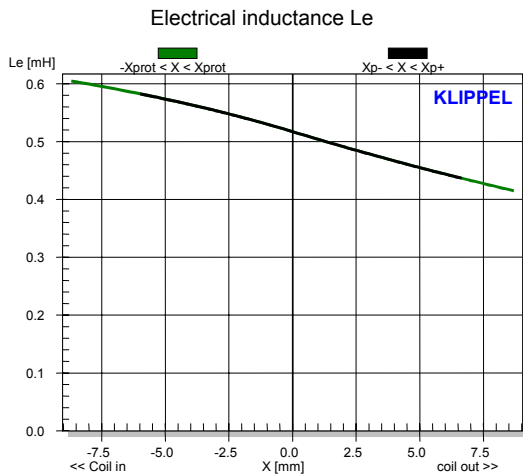
GRAPHICS AND MEASUREMENTS



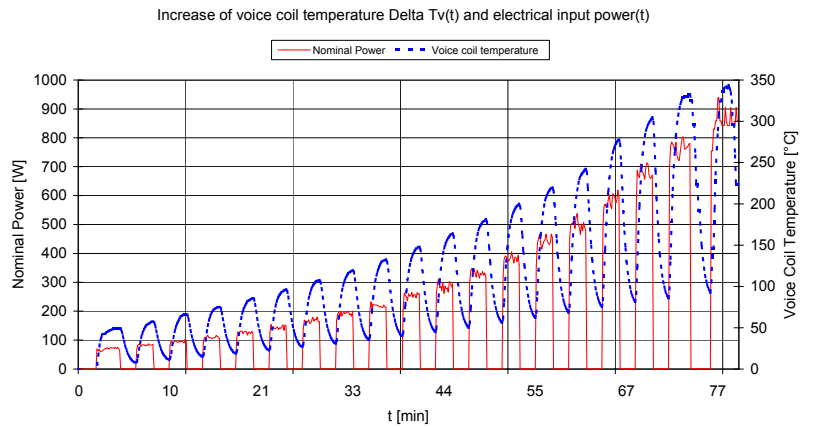
BI(X): force factor variation with voice coil displacement



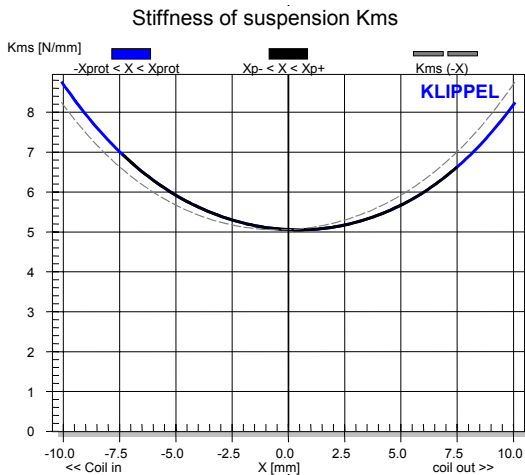
Frequency Response: enclosure volume 39l, port tuning 55Hz (thick curve on axis, thin curve 30° off axis)



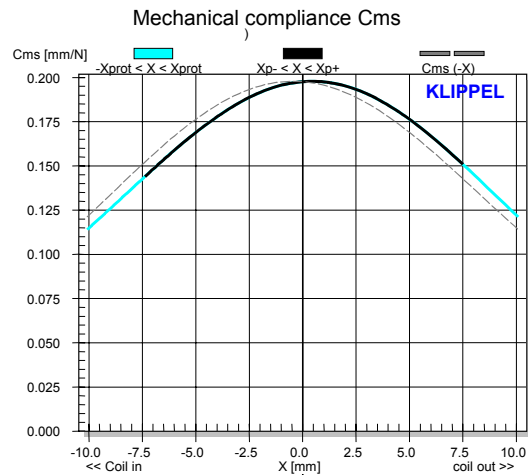
Le: electrical inductance variation with voice coil displacement



Power test done with intermittent excitation, ON interval 2min, duty cycle 50%, pink noise signal 6dB crest factor with frequency range 50-2000Hz.



K_{ms} : stiffness of suspension variation with voice coil displacement



C_{ms} : mechanical compliance variation with voice coil displacement