

CSF102.50K

Lavoce

10" COAXIAL

FERRITE COMMON HF\LF MAGNET
STEEL BASKET DRIVER

PRELIMINARY

- 2.5 INCH LF EDGEWOUND CCA VOICE COIL
- 1.7 INCH HF EDGEWOUND CCA VOICE COIL
- 96 dB/SPL SENSITIVITY
- 600 WATT PROGRAM POWER HANDLING
- FEM OPTIMIZED COMMON MOTOR, PHASEPLUG AND DIAPHRAGM
- 65 - 20000 Hz FREQUENCY RANGE
- 70° NOMINAL COVERAGE
- POLYIMIDE HF DIAPHRAGM
- DOUBLE ALUMINIUM DEMODULATING RINGS
- COMPACT AND LIGHTWEIGHT DESIGN



GENERAL SPECIFICATIONS

	LF	HF
LF Nominal diameter / HF Exit	mm (in.) 250 (10)	25,4 (1)
Nominal impedance	Ω 8	8
Minimum impedance	Ω 6,6	7,6
Program power (1)	W 600	120
AES Power rating (2)	W 300	60
Sensitivity (3)	dB 96	105
Frequency range	Hz 65 ÷ 4000	1000 ÷ 20000
Voice coil diameter	mm (in.) 65 (2.5)	44,4 (1.7)
Chassis material	Steel	
Magnet material	Ferrite	
Magnet dimensions	mm 175 x 85 x 22	
OD x ID x h	(in.) (6.88 x 3.34 x 0.87)	
Coil material	Edgewound CCA	Edgewound CCA
Former material	Glass Fiber	Kapton
LF Cone / HF Dome material	Waterproof Treated Paper	Polyimide
Surround material	Polycotton	Polyimide
Flux density	T 1,07	1,75
Recommended crossover (4)	Hz -	1600
Xmax (5)	mm (in.) 6,25 (0.25)	-
Xmech (6)	mm (in.) 10,25 (0.40)	-
Gap height	mm (in.) 8 (0.31)	-
Voice coil winding height	mm (in.) 16,6 (0.65)	-
Driver displacement volume	l (ft ³) 1,9 (0.067)	
Recommended enclosure	l (ft ³) 35 (1.24)	
Recommended tuning	Hz 65	

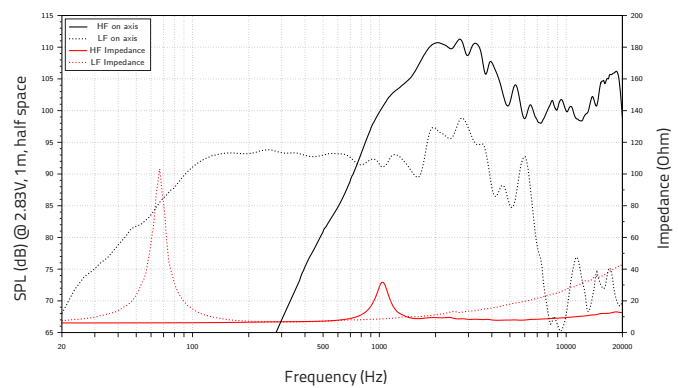
LF SMALL SIGNAL PARAMETERS

DC resistance	Re	Ohm	5,8
Resonance frequency	Fs	Hz	65
Moving mass	Mms	g (oz)	34,2 (1.2)
Compliance	Cms	mm/N	0,17
Force factor	BxL	N/A	12,9
Mechanical Q-factor	Qms		7,39
Electrical Q-factor	Qes		0,48
Total Q-factor	Qts		0,45
Equivalent air volume	Vas	l (ft ³)	29,93 (1.06)
Voice coil Inductance	Le	mH	0,46
Diaphragm area	Sd	cm ² (in. ²)	350 (54.25)
Reference efficiency	Eta 0	%	1,68
Efficiency bandwidth product	EBP	Hz	135

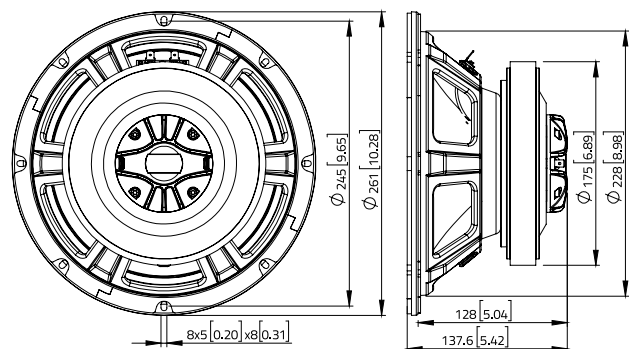
SHIPPING INFORMATION

Net weight	kg (lb.)	4,9 (10.9)
Multipack size (1)	mm	304 x 281 x 176
W x D x H	(in.)	(12 x 11.1 x 6.9)
Multipack weight	kg (lb.)	5,7 (12.5)

FREQUENCY RESPONSE AND IMPEDANCE



DIMENSIONS mm (in.)



(1) Program power is defined as 3 dB greater than AES Power.

(2) Tested in free air for two hours using a continuous:

LF: band-limited pink noise signal as per AES 2-1984 Rev. 2003.

HF: band-limited (1600-20000 Hz, 12dB/oct.) pink noise signal as per AES 2-1984 Rev. 2003.

(3) LF: From T/S parameters, measured with Klippel DA LPM module.

HF: Measured on axis at 2.83V, 1m, SPL averaged in the frequency range 1000 ÷ 20000 Hz.

(4) High pass filter with slope 12dB/oct. or higher.

(5) The Xmax is calculated as: $(Hvc - Hg)/2 + Hg/4$. Hvc is the voice coil height and Hg the gap height.

(6) The Xmech is calculated as: $(Hvc - Hg)/2 - (Hg/2)$. Hvc is the voice coil height and Hg the gap height.

(7) Thiele-Small parameters are measured after preconditioning: a) at 20°C - 22°C, 50% humidity for 2 hours; b) by Klippel LSI measurement.

All specifications subject to change without notice_H,a

