

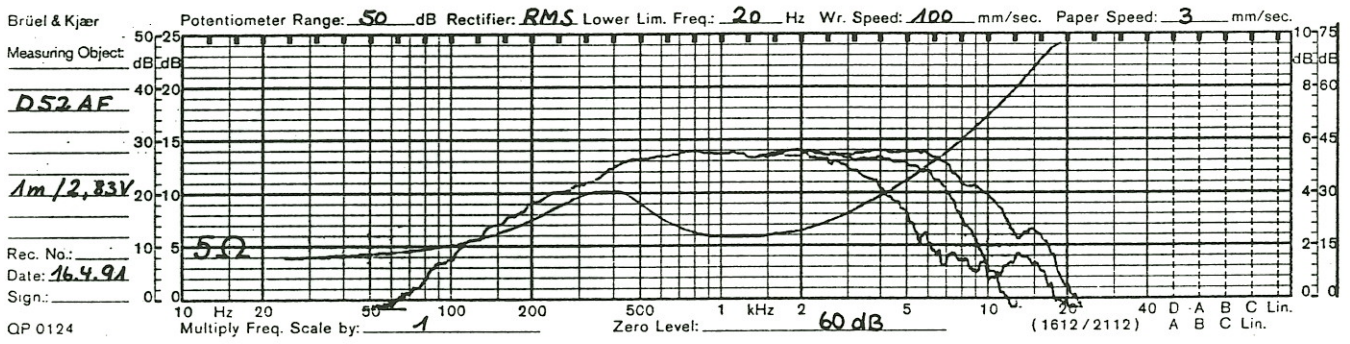
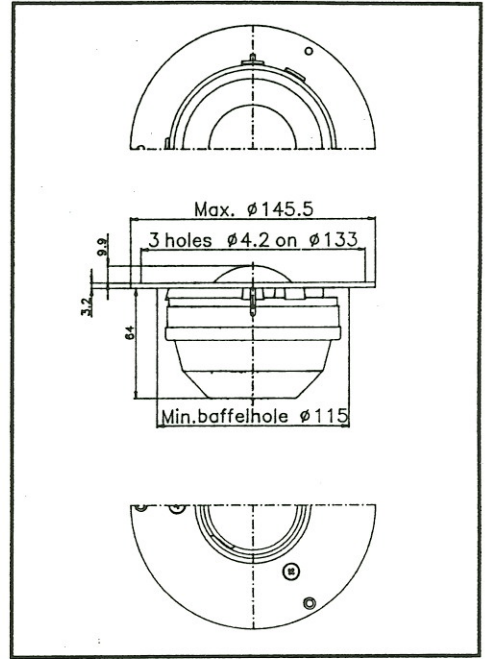
Soft Dome Midrange D-52 AF

The D-52 AF is a soft dome midrange with a 2 inch (54 mm) voice coil.

The frequency response is rather smooth and the phase response is straight without jumps and shifts.

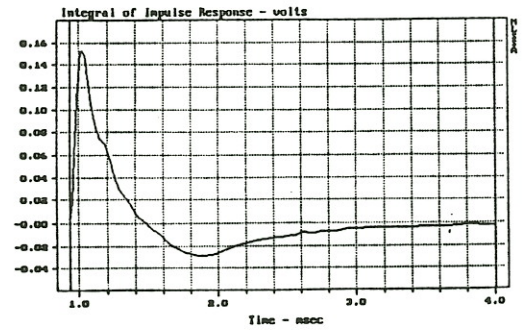
The dome material is doped fabric. The internal damping is well controlled and the suspension is a soft roll-off type. Reflexions inside the driver are taken care of and the air pressure is aperiodically damped. Even at very high SPL no compression is observed.

The efficiency matches most common drivers and with respect to the price/feature relation the D-52 AF is quite inexpensive.

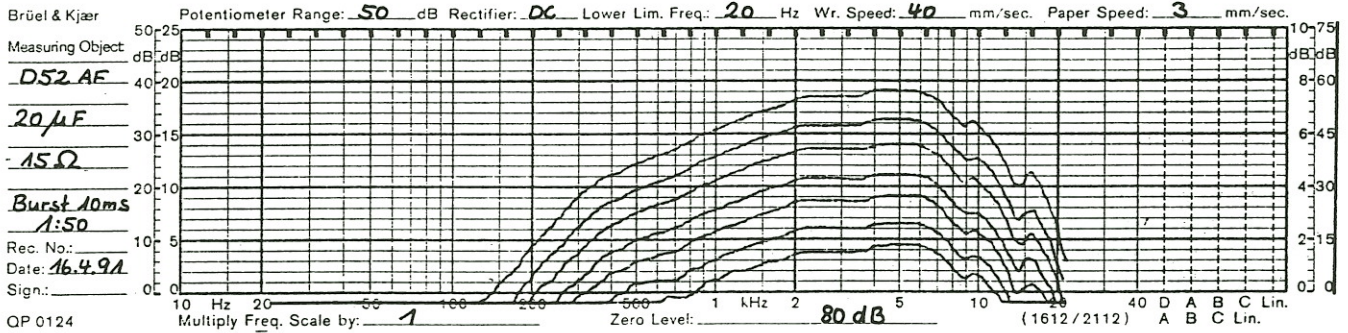


Frequency response and impedance curve of the D-52 AF on-axis, 30° and 60° (distance 1 m).

The MLSSA measurements show the pulse response of the D-52 AF.



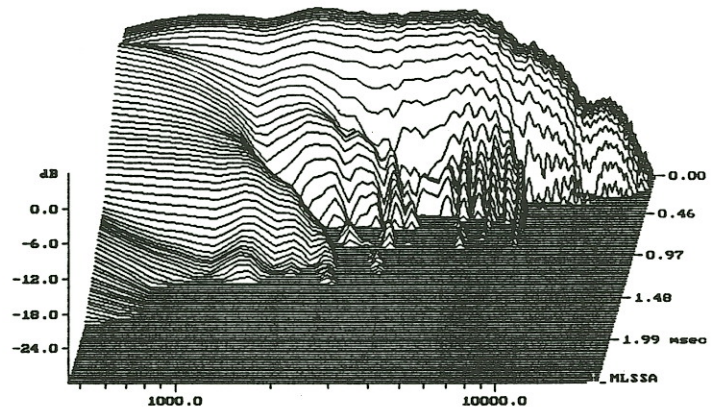
Dynamic Measurements



Levels of 1, 3, 10, 30, 100, 300 and 1,000 watts were applied while recording the curves. The parallel arrangement of the curves indicates that even fast 1,000 W peaks do not produce any compression. Signal: Tone-Burst 10 ms, Signal-Pause 1:50

MLSSA Waterfall Plot

The MLSSA cumulative spectral decay (waterfall) plot shows the energy/time response of the D-52 AF. These unique results clearly show that delayed reflections have been reduced to a minimum.



Specifications D-52 AF

Thiele-Small Parameter:

Q, mechanical	Q_{ms}	0.9
Q, electrical	Q_{es}	0.7
Q, total	Q_{ts}	0.4
Resonance free air	f_s	350 Hz
force factor	$B \times L$	6.4 Tm
eff. cone area	S_D	28 cm ²
moving mass	M_{ms}	3 g
lin. excursion (p-p)	X_{max}	2 mm
max. excursion (p-p)		5 mm

Voice coil:		
diameter	d	54 mm
length	h	7 mm
layers	n	2
inductance(10 KHz)	L_e	0.2
nom. impedance	Z_{vc}	8 ohms
DC resistance	R_e	4.5 ohms

Sensitivity 2.83 V see curve

Power handling,
 depending on crossover:
 nominal (long term)
 transient

IEC	>100 W
10ms	>1000 W

Net weight 1200 g

Overall dimensions Ø 145 x 78mm