



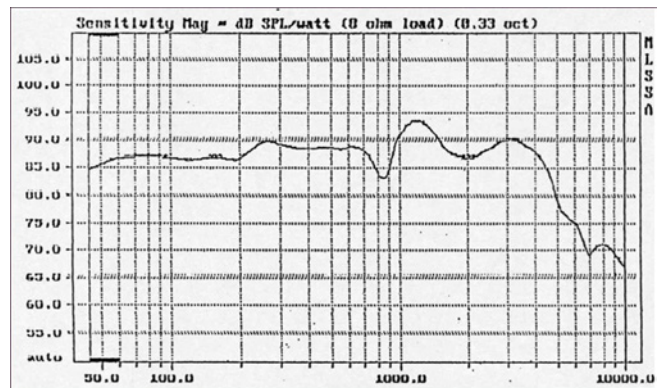
## H 8.1

### 8" Bass Mid-range driver

- Hybrid multi magnet system
- DPC cone
- 75mm Hexatech aluminium voice coil
- High power handling



SPECIFICATIONS		
Overall Dimensions		OD 220mm (8.7") x 69mm (2.70")
Nominal Power Handling (DIN)	P	180 W
Transient Power 10ms		1000 W
Nominal Impedance	Z	8 Ohms
Sensitivity 1W/1M		90 dB
Frequency Response		35-4000 Hz
Resonant Frequency	FS	32 Hz
VOICE COIL		
Voice Coil Diameter	DIA	OD 75mm (3")
Voice Coil Height		14,5mm (0.57")
Voice Coil Former		Aluminium
Voice Coil Wire		Hexatech Aluminium
Number of Layers		2
DC Resistance	RE	5,6 Ohm
Voice Coil Inductance @ 1KHz	LBM	0,86 mH
MAGNET SYSTEM		
Magnet System Type		Hybrid, rear vented
HE - Magnetic Gap Height	HE	6,0 mm (0.236")
B Flux density	B	1,0 T
BL Product	BXL	9,43 N.A
Max. Linear Excursion	X	+/- 4,25mm
OPERATIONAL PARAMETERS		
Suspension compliance	CMS	973 uM / Newton
Mechanical Q Factor	QMS	1,66
Electrical Q Factor	QES	0,36
Total Q Factor	Q/T	0,29
Mechanical Resistance	RMS	1,46 Kg.
Moving Mass	MMS	24,1 gm.
Equivalent Cas Air Load	VAS	65,0 L
Cone / Dome Material		DPC
Effective Piston Area	SD	219 cm <sup>2</sup>
Net Weight	Kg.	1,20 Kg.
Note		Also available in Uniflow basket



(Other graphs not available yet)

The H 8.1 is a bass midrange unit for a 2-way system.

This unit has a smooth frequency response up to 4kHz and a nice, gradual roll-off slope, allowing more flexibility of crossover design by using the minimum of components for better performance.

The cone material is a mica filled polypropylene with rubber surround. The two components were injected and moulded together during production. This creates a component with high mechanical strength that can withstand high power.

The voice coil is Morel's EVC (External Voice Coil) Hexatech aluminium, with 75mm (3") diameter. The large diameter allows support of the cone over a larger area, preventing cone break-up distortion, particularly at high levels. This Hexatech voice coil, despite its large diameter, is lightweight (1/3 the weight of a copper voice coil), considerably reducing the moving mass and improving sensitivity.



The H8.1 Hybrid magnet system employs an ingenious magnet system based on a combination of Neodymium and ferrite magnets. This complex system ensures a very linear magnetic flux and therefore a very linear motion of the cone. Indeed, a very low Qts of 0,29 is the basis of a powerful and deep bass in a bassreflex system.



The centre pole is hollow, creating a large venting. This venting is important for the circulation of air through the system, cooling the voice coil, and also improving the acoustic loading into the cabinet.

The chassis is of particularly heavy pressed steel designed to allow the cone maximum freedom of movement, thanks to the addition of ventilation holes under the suspension. This unit is due to the magnet construction INSIDE it, this driver, is like most MOREL drivers magnetically shielded in a sufficient way.



Note that it is also available in the aluminium UNIFLOW basket giving it even better performance.