## ADIRE AUDIO<sup>®</sup> EXTREMIS 6.8™ MIDWOOFER DATA SHEET





The Extremis 6.8 is a high performance midwoofer with a cast aluminum frame, suitable for use in mid-sized ported and sealed cabinets. It has an exponentially flared polypropylene cone, concave/flat polypropylene dustcap, rubber surround for excellent cone termination.

C: 98.4mm / 3.88" D: 44.5mm / 1.75" E: 70.0mm / 2.76"

90.5mm / 3.63"

F:

The driver has an aluminum former with a 4 layer copper wound voice coil for high power handling. A progressive spider with flat landing attachment is used to ensure linear suspension operation. The motor uses a neodymium magnet mounted on the pole to create an extremely compact, inherently video shielded motor structure.

The motor uses our patent-pending  $XBL^{2_{TM}}$  motor for extreme linearity over the entire range of motion. This motor yield a very high motor force factor of 9 Newtons per Ampere, and maintains over 90% of its peak force over the center 20mm of excursion. Combined with a linear excursion rating of 13mm one way this motor yields the highest level of low distortion stroke available in any 6.5"/7" woofer on the market today.

The flat progressive spider and soft rubber surround combine to yield an extremely linear suspension as well. Suspension compliance has less than a 25% change over the center 20mm of excursion, and provides a full 26mm of peak to peak throw capability to equal that of the motor.

Inductance nonlinearities are kept to a minimum by the use of a full copper sleeve on the pole. This sleeve is a full 1mm thick copper ring that extends 9mm beyond the top plate. The result is a very low inductance of 0.13 mH, and inductance that does not change by more than 15% over the entire usable range of throw.





Nominal Impedance:	8 Ohms	DC Resistance:	7.02 Ohms
Usable Bandwidth:	30-5000 Hz	Inductance:	0.13 mH
Rated Power:	100W RMS	BL:	9.0 N/A
Peak Power:	300W	Resonant Frequency:	30 Hz
Rated Efficiency:	86 dB	Moving Mass:	23.3 g
VC Diameter:	40mm	Compliance:	1.2 mm/N
Linear Travel:	26mm p-p	Vas:	33.2 L
Maximum Travel:	26mm p-p	Qms:	2.54
Cone Area:	$140 \text{ cm}^2$	Qes:	.383
Driver Weight:	2.5 kg	Qts:	.332

RECOMMENDED PORTED BOX: 21 liters tuned to 33 Hz RECOMMENDED SEALED BOX: 9.5 liters with 100% stuffing SUITABLE FOR DIPOLE AND TRANSMISSION LINE USE