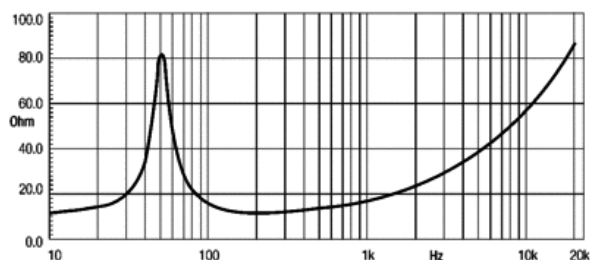
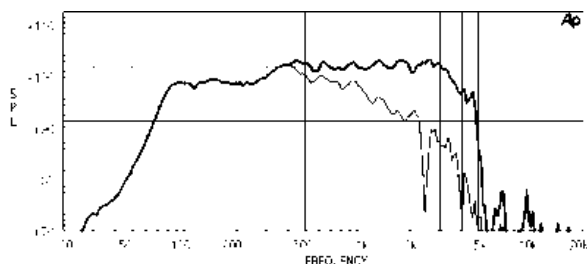


- 100,5dB SPL 1W / 1m average sensitivity
- 65 mm (2,5 in) Interleaved Sandwich Voice coil (ISV)
- 350 WAES power handling
- Excellent transient response and cone damping
- Improved heat dissipation via unique basket design
- Ideal for compact two way and multiway systems

The 15W500 is a fine example of a high quality transducer providing the right balance between performance and engineering costs. This ferrite low frequency driver satisfies the demand for a 15" loudspeaker which combines excellent linearity with good sensitivity and power handling characteristics. The 15W500 has been designed for two-way or multi-way reflex systems. The high quality paper cone has a smooth, Eighteen Sound specified curvilinear textured profile design that eliminates bell-mode resonance within the intended frequency range. The cone is carried by a specially treated and dampened multi-roll linen suspension designed to control excursion while maintaining piston action linearity. The 15W500 also employs our Interleaved Sandwich Voice coil (ISV) technology, in which a high strength fiberglass former carries windings on both the outer and inner surfaces to achieve a mass balanced coil. This results in an extremely linear motor assembly with a reduced tendency for eccentric behavior when driven hard. Voice coil cooling has been achieved by incorporating airways between the chassis back plate and the magnetic top plate, allowing heated air from the voice coil and gap to be channeled away and dissipated by the chassis basket. This technology is the result of a meticulous 3D CAD design project.



## SPECIFICATIONS

|                                        |                |
|----------------------------------------|----------------|
| Nominal Diameter                       | 380 mm ( in)   |
| Nominal Impedance                      | 8 Ω            |
| Minimum Impedance                      | 6.0 Ω          |
| Nominal Power Handling <sup>1</sup>    | 350 W          |
| Continuous Power Handling <sup>2</sup> | 500 W          |
| Sensitivity <sup>3</sup>               | 100.5 dB       |
| Frequency Range                        | 50 - 4500 Hz   |
| Voice Coil Diameter                    | 65 mm (2.5 in) |
| Winding Material                       | aluminum       |

## DESIGN

|                       |                                               |
|-----------------------|-----------------------------------------------|
| Surround Shape        | M-roll                                        |
| Cone Shape            | Curvilinear                                   |
| Magnet Material       | Ferrite                                       |
| Recommended Enclosure | 140.0 dm <sup>3</sup> (4.94 ft <sup>3</sup> ) |
| Recommended Tuning    | 52 Hz                                         |

## PARAMETERS<sup>4</sup>

|                     |                                                 |
|---------------------|-------------------------------------------------|
| Resonance Frequency | 50 Hz                                           |
| Re                  | 5.2 Ω                                           |
| Qes                 | 0.55                                            |
| Qms                 | 9.64                                            |
| Qts                 | 0.52                                            |
| Vas                 | 189.0 dm <sup>3</sup> (6.67 ft <sup>3</sup> )   |
| Sd                  | 850.0 cm <sup>2</sup> (131.75 in <sup>2</sup> ) |
| Xmax                | 4.0 mm                                          |
| Mms                 | 55.0 g                                          |
| Bl                  | 12.6 Txm                                        |
| Le                  | 1.04 mH                                         |
| EBP                 | 90 Hz                                           |

## MOUNTING AND SHIPPING INFO

|                             |                                          |
|-----------------------------|------------------------------------------|
| Overall Diameter            | 387 mm (15.24 in)                        |
| Bolt Circle Diameter        | 370 mm (14.57 in)                        |
| Baffle Cutout Diameter      | 353.0 mm (13.9 in)                       |
| Depth                       | 161 mm (6.34 in)                         |
| Flange and Gasket Thickness | 11 mm (0.43 in)                          |
| Net Weight                  | 4.3 kg (9.48 lb)                         |
| Shipping Weight             | 5.1 kg (11.24 lb)                        |
| Shipping Box                | 405 x 405 x 214 mm (15.94x15.94x8.43 in) |

1. 2 hours test made with continuous pink noise signal within the range Fs-10Fs. Power calculated on rated minimum impedance. Loudspeaker in free air.
2. Power on Continuous Program is defined as 3 dB greater than the Nominal rating.
3. Applied RMS Voltage is set to 2.83 V for 8 ohms Nominal Impedance.
4. Thiele-Small parameters are measured after a high level 20 Hz sine wave preconditioning test.