

6P200Fe

LOW FREQUENCY TRANSDUCER Preliminary Data Sheet

KEY FEATURES

- 200 W AES power handling
- High sensitivity
- Low Resonant frequency: 65 Hz
- · Low harmonic distortion in all the usable frequency range
- Extended controlled displacement: Xmax ± 5.5 mm
- Extended mechanical displacement capability: Xpp 20 mm
- CONEX spider and waterproof materials
- Designed with MMSS technology
- · Forced air convection circuit for low power compression
- Ferrite magnet system
- Optimal for small/compact designs

TECHNICAL SPECIFICATIONS

Nominal diameter Rated impedance Minimum impedance	165 mm. 6.5 in. 8 ohms 5.9 ohms
Power capacity*	200 w AES
Program power	400 w
Sensitivity	92.7 dB 2.83v @ 1m @ 2π
Frequency range	60 - 9000 Hz
Recom. enclosure vol.	10 / 40 l 0.35 / 1.4 ft. ³
Voice coil diameter	51.7 mm. 2 in.
Magnetic assembly weight	2 kg. 4.4 lb.
BL factor	10.1 N/A
Moving mass	0.017 kg.
Voice coil length	14 mm.
Air gap height	9 mm.
X damage (peak to peak)	20 mm.

THIELE-SMALL PARAMETERS**

Resonant frequency, fs	65 Hz
D.C. Voice coil resistance, Re	5 ohms
Mechanical Quality Factor, Qms	3.58
Electrical Quality Factor, Qes	0.34
Total Quality Factor, Qts	0.31
Equivalent Air Volume to Cms, Vas	9.131
Mechanical Compliance, Cms	352 µ m / N
Mechanical Resistance, Rms	1.94 kg / s
Efficiency, ηο (%)	0.71
Effective Surface Area, Sd (m ²)	0.0135 m ²
Maximum Displacement, Xmax***	5.5 mm
Displacement Volume, Vd	74.25 cm ³
Voice Coil Inductance, Le @ 1 kHz	0.6 mH

Notes

*The power capacity is determined according to AES2-1984 (r2003) standard. Program power is defined as the transducer's ability to handle normal music program material.

**T-S parameters are measured after an exercise period using a preconditioning power test.

***The Xmax is calculated as (Lvc - Hag)/2 + Hag/3.5, where Lvc is the voice coil length and Hag is the air gap height.



MOUNTING INFORMATION

Overall diameter Bolt circle diameter	162.5 mm. 152 mm.	
Baffle cutout diameter:		
- Front mount	143 mm.	5.63 in.
- Rear mount	146 mm.	5.75 in.
Depth	85mm.	3.35in.
Volume displaced by driver	0.6 l	0.02 ft. ³
Net weight	3.2 kg.	7.04 lb.

FREE AIR IMPEDANCE CURVE



FREQUENCY RESPONSE AND DISTORTION



Note: on axis frequency response measured with loudspeaker standing on infinite baffle in anechoic chamber, 1w @ 1m.