

15P1000FeV2

LOW FREQUENCY TRANSDUCER
Preliminary Data Sheet

KEY FEATURES

- High power handling: 2.000 W program power
- 4" copper voice coil
- High sensitivity: 98 dB
- · FEA optimized magnetic circuit
- Designed with MMSS technology for high control, linearity and low harmonic distortion
- Low power compression losses
- Waterproof cone with treatment for both sides of the cone
- Extended mechanical displacement capability: X_{dam} ± 52 mm
- CONEX spider
- High excursion capabilities: X_{max} ± 8 mm
- Low frequency extension and high control



| Nominal diameter | 380 mm 15 in |
|------------------------------------|--------------------------------|
| Rated impedance | 8 Ω |
| Minimum impedance | 5,5 Ω |
| Power capacity* | 1.000 W _{AES} |
| Program power | 2.000 W |
| Sensitivity | 98 dB 1W / 1m @ Z _N |
| Frequency range | 40 - 2.000 Hz |
| Voice coil diameter | 101,6 mm 4 in |
| BI factor | 26,6 N/A |
| Moving mass | 0,147 kg |
| Voice coil length | 20 mm |
| Air gap height | 12 mm |
| X _{damage} (peak to peak) | 52 mm |

THIELE-SMALL PARAMETERS**

| Resonant frequency, f _s | 42 Hz |
|--|-----------------------|
| D.C. Voice coil resistance, R _e | 5,3 Ω |
| Mechanical Quality Factor, Q _{ms} | 6,6 |
| Electrical Quality Factor, Qes | 0,29 |
| Total Quality Factor, Qts | 0,28 |
| Equivalent Air Volume to C _{ms} , V _{as} | 100,2 I |
| Mechanical Compliance, C _{ms} | 97 μm / N |
| Mechanical Resistance, R _{ms} | 5,91 kg / s |
| Efficiency, η ₀ | 2,47 % |
| Effective Surface Area, S _d | 0,0855 m ² |
| Maximum Displacement, X _{max} *** | 8 mm |
| Displacement Volume, V _d | 684 cm ³ |
| Voice Coil Inductance, Le @ 1 kHz | 1,3 mH |

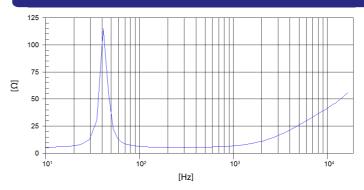
Notes:



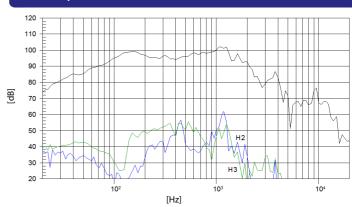
MOUNTING INFORMATION

| Overall diameter | 388 mm | 15,28 in |
|-------------------------|---------|----------|
| Bolt circle diameter | 370 mm | 14,57 in |
| Baffle cutout diameter: | | |
| - Front mount | 352 mm | 13,86 in |
| Depth | 170 mm | 6,70 in |
| Net weight | 13,1 kg | 28,9 lb |
| Shipping weight | 14,1 kg | 31,1 lb |

FREE AIR IMPEDANCE CURVE



FREQUENCY RESPONSE & DISTORTION



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

^{*} The power capaticty 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 measurements are carried out with a velocity-current laser transducer and will reflect the long term parameters (once the loudspeaker has been working for a short period of time).

^{***} The X_{max} is calculated as $(L_{vc} - H_{ag})/2 + (H_{ag}/3,5)$, where L_{vc} is the voice coil length and H_{ag} is the air gap height.