



M21-100-3000 SPECIFICATIONS

M21-100-3000 Bender

OVERVIEW

The M21-100-3000 is a flexural disc projector belonging to the M21 bender family.

Like all of M21 products, it is omnidirectional, and can produce moderate power over a wide frequency band, or produce high power near resonance. M21s can also be used in a stack to produce greater power and bandwidth at lower frequencies, or in conventional arrays to produce a directive, high-power source.



CHARACTERISTICS

PHYSICAL:

Maximum Operating Depth	500 m
Mass	1.1 Kg
Thickness	32 mm
Storage Temperatures	-40°C to +70°C
Operating Temperatures	0°C to +35°C
Connector Type	Subconn OM3M
Locking Sleeve	Subconn DLSA-F

ACOUSTIC:

Resonance Frequency	3000 Hz
Maximum Transmitted Voltage Response	138 dB re $\mu\text{Pa}/\text{V}$ @ 1m
Maximum SPL	194 dB re 1 μPa @ 1 m
Maximum Drive Voltage	600 Vrms
Transmitting Range	800Hz-4.5kHz
Directivity	Omnidirectional
Capacitance	52 nF
Cavitation Depth at 194 dB re μPa @ 1 m	10 Meters

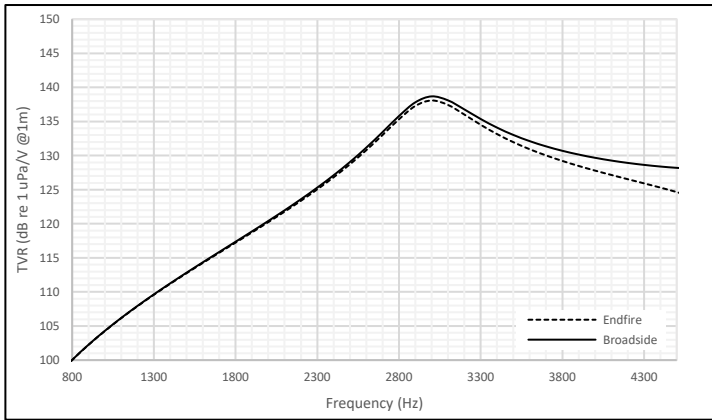


Figure 1: Transmit Voltage Response for M21-100-3000

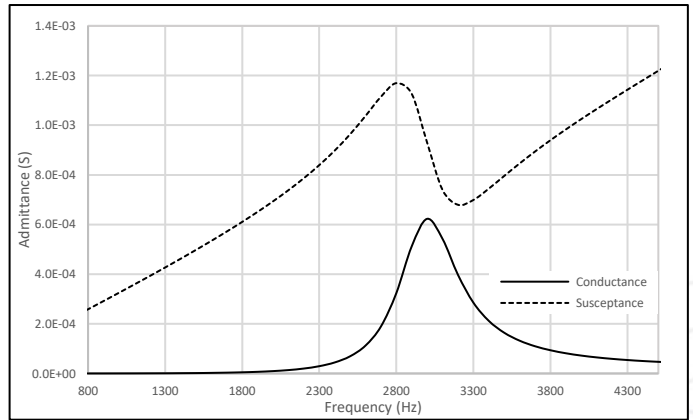


Figure 2: Admittance Plot for M21-100-3000

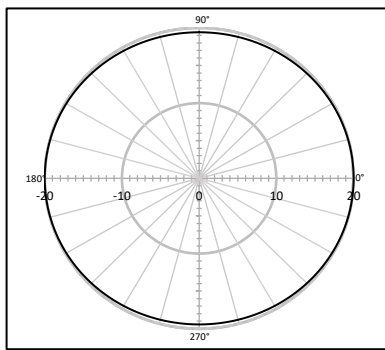


Figure 3: Typical Horizontal Beam Pattern for the M21-100-3000 at Resonance Frequency

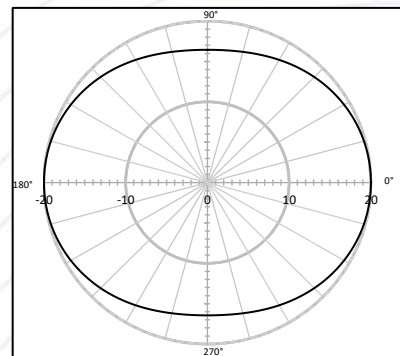


Figure 4: Typical Horizontal Beam Pattern for the M21-100-3000 at 4500Hz

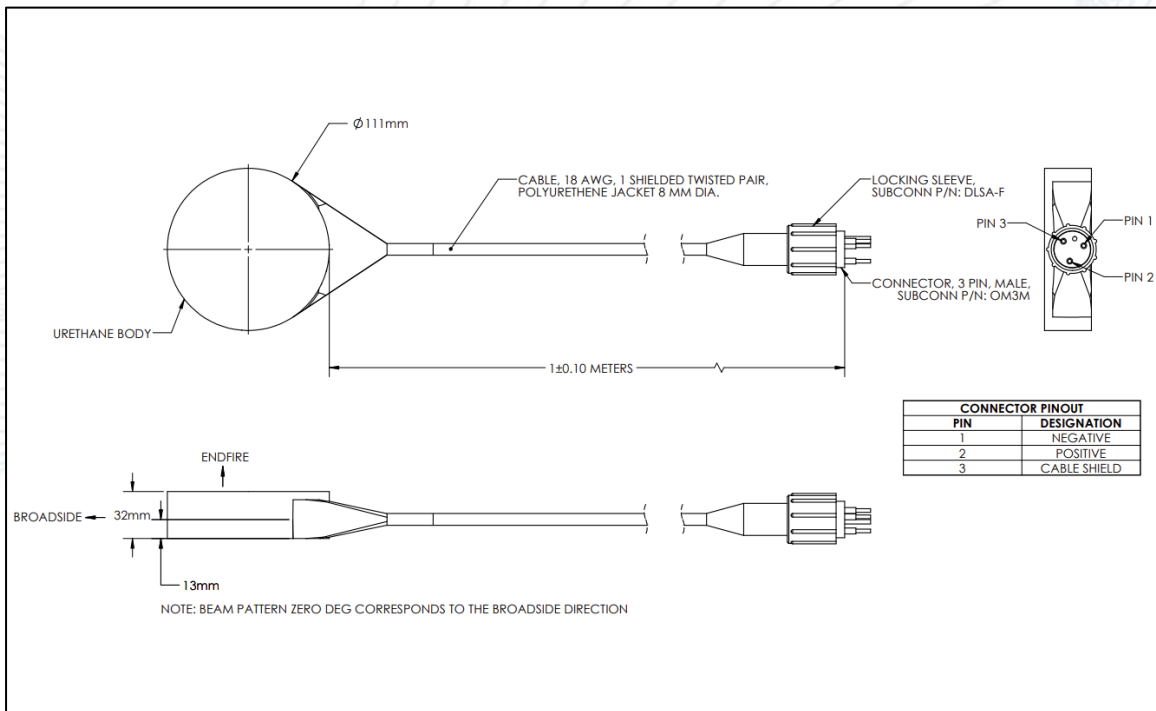


Figure 5: Dimensions of the M21-100-3000 with labeled pin out