

DATA SHEET

CM1-6W AND CM1-6WS

MINIATURE HIGH OUTPUT CEILING MIC

The CM1-6W and CM1-6WS are miniaturized condenser microphones with a fully integrated preamp designed with very high sensitivity for distance miking. The primary applications for the CM1 include ceiling-mounted video conferences, distance learning, hospital rooms, surveillance, and ambient room miking.

The CM1 has complete immunity from RF interference caused by cell phones and GSM devices. The CM1 is available with a cardioid capsule (CM1-6W), or with a supercardioid capsule (CM1-6WS), allowing the microphone to be used in a wide variety of applications.

The CM1 is easy to install, requiring only that a 5/8 inch (15.9 mm) hole be drilled in the ceiling with no additional tools required. The cable assembly is equipped with a Phoenix connector. For installations where plenum rated cable is to be used, an optional nickel-plated metal junction box is available.



APPLICATIONS

- Video Conferences
- Distance Learning
- Surveillance
- Hospital and Medical Procedures
- Ambient room miking

FEATURES

- High output for distance miking
- Optimized for voice recognition
- Immunity from RF interference
- Operates on 18-52 volts phantom power
- Point and shoot directivity
- Miniaturized integrated preamp circuitry
- No external power adapter needed
- 12 mm gold vapor diaphragm
- Extremely low noise, high sensitivity
- Available with a cardioid or supercardioid capsule
- Optional junction box available
- Covered by three-year warranty

SUPPLIED ACCESSORIES

- Twelve-inch (304.8 mm) integrated mic cable terminating with Phoenix connector (CONN170F).
- The mating Phoenix connector (CONN170M) is also provided for easy solder-less connection.

OPTIONAL ACCESSORIES

- JB-CM1 - Metal junction box to house connectors and plenum rated cable where required by code.

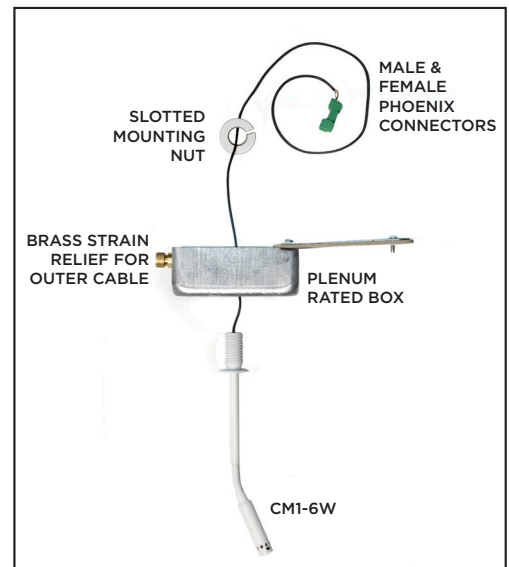
MODEL VARIATIONS

- CM1-6W - White finish, cardioid capsule, 6-inch (152.4 mm) gooseneck
- CM1-6WS - White finish, supercardioid capsule, 6-inch (152.4 mm) gooseneck

SPECIFICATIONS

Transducer Type:	Condenser
Frequency Response:	60 Hz — 10 kHz
Polar Pattern:	Cardioid or Supercardioid
Output Impedance:	150Ω
Sensitivity:	37 mV / Pa @ 1k
Signal/Noise Ratio (A-weighted):	72 dB
Equivalent Noise Level (A-weighted):	22 dB
Maximum SPL @ .5% THD:	≥ 130 dB
Dynamic Range:	108 dB
Power Requirements:	18 — 52V phantom
Connector:	3 pin mini-XLRm
Polarity:	Positive pressure on diaphragm produces positive voltage on pin 2 relative to pin 3
Housing:	Copper and steel
Finish:	Powder coat
Weight:	0.7 ounces (20 g)
Length:	2.1 inches (54 mm)

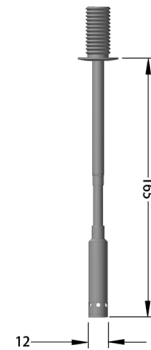
EXPLODED VIEW



ARCHITECTS AND ENGINEERS SPECIFICATIONS

The microphone shall be of the condenser type with a modular threaded capsule available in cardioid and supercardioid polar patterns. The microphone shall be protected from RF interference. The microphone shall have a fully integrated preamp circuitry thereby eliminating the need for a remote preamplifier module. The microphone shall operate on 18-52 Volts DC and the nominal output impedance shall be equal to 150 ohms at 1 kHz. The microphone shall have a sensitivity of 37 mV / Pa at 1 kHz. The microphone shall have a maximum SPL level of ≥ 130 dB with THD of 0.5%. The microphone shall be machined out of brass and the dimensions shall be 12 mm in diameter by 54 mm in length. The microphone shall be the Biamp CM1.

DIMENSIONS (MM)

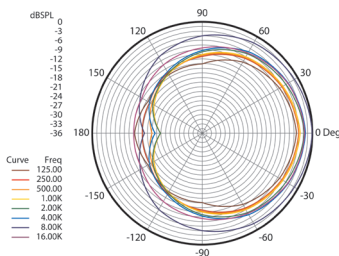


OPERATION

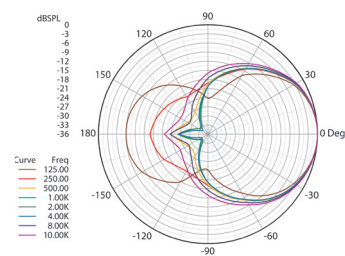
The CM1 is a low impedance microphone and should be plugged into a “mic level” input on your console, mixer, or recording device. The CM1 requires phantom power and will NOT operate without phantom power voltage (18-52 volts) which is available on most professional mic preamps and mixing devices. If phantom power is not available on your equipment, you will have to procure a phantom power supply. Avoid plugging or unplugging the microphone into or out of the audio system unless the channel is muted or the volume of the system turned down. Failure to do so may result in a loud “popping” noise which could seriously damage the speakers in the sound system.

POLAR PATTERNS

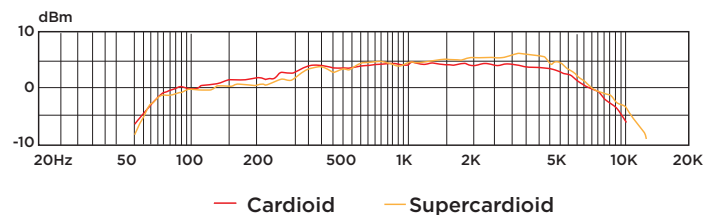
Cardioid



Supercardioid



FREQUENCY RESPONSE



All specifications subject to change without notice.