

# FlexMic™ Series



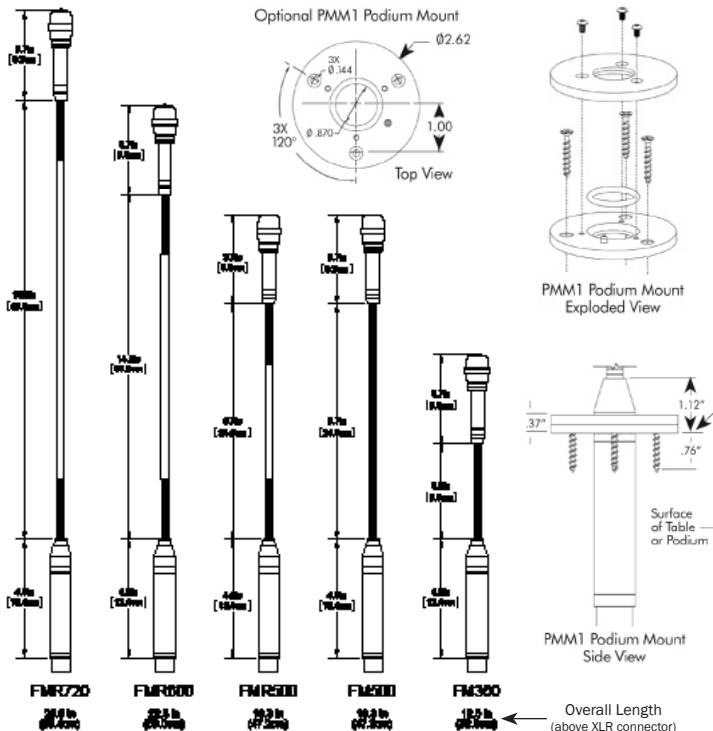
**FMR Series:** Gooseneck with Rigid Center and Flex at Both Ends, available in three lengths

**FM Series:** Fully Flexible Gooseneck, available in two lengths



"I have installed sound systems for churches in over 38 states. The FlexMic is always my first choice for podium microphones. It maintains its incredible, clear, sound quality at the front as well as at the sides of the microphone with phenomenal gain before feedback." Gary Emory, Brightwater Digital

- Uniform Frequency Response at 0°, 45° & 90°
- On or Off Axis, Always Hear the Orator
- Highly Intelligible
- More Gain Before Feedback
- No Handling Noise
- 139dB SPL Max Acoustic Input
- 20kHz High Frequency Response
- Incredible RFI Rejection
- Available in Cardioid or Hypercardioid
- Slim Gooseneck for Low Profile Appearance
- Available with Fully Flexible Gooseneck in Short or Medium Lengths
- Available with Rigid Center Gooseneck with flex at both ends, in Short, Medium or Long Lengths
- Optional PMM1 Podium Mount Accessory



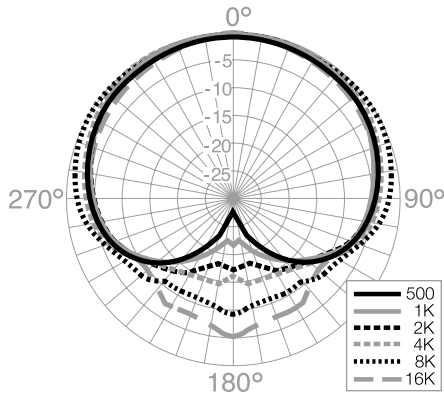
The Earthworks FM Series offers versatile options that will provide you with the ideal choice for a spectacular podium microphone. These microphones are the choice of those who demand the very best. Earthworks FlexMics™ are in use in civic centers, theatres, churches and houses of congress in several states.

Earthworks patented technologies provide high intelligibility and uniform off-axis response to ensure that the orator is always heard and well understood at the front, at the sides, below or above the microphone. This smooth off-axis response also provides more gain before feedback. With 139dB SPL max acoustic input, it is virtually impossible to overload the microphone. There is also no microphone handling noise in addition to incredible RFI rejection.

The Earthworks FM Series models offer you a variety of choices with fully flexible goosenecks or goosenecks with rigid centers that have flex at both ends. All models now have smaller diameter goosenecks and are available in either cardioid or hypercardioid polar patterns. The optional PMM1 podium mount will work with any FlexMic™ Series model.

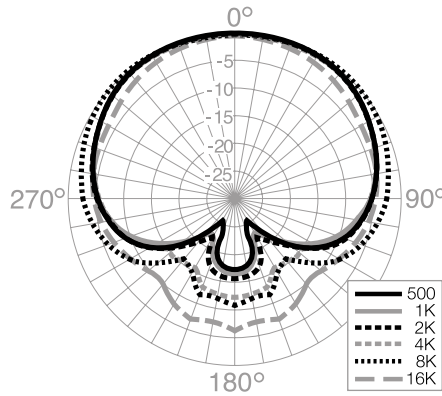
See full specifications on back of page

# SPECIFICATIONS



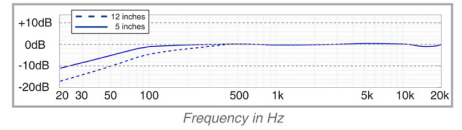
**Typical Cardioid Polar Response**

Above polar applies to all Cardioid models in the FM and FMR Series

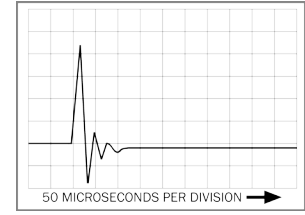


**Typical Hypercardioid Polar Response**

Above polar applies to all Hypercardioid models in the FM and FMR Series



**Frequency Response**



**Impulse Response**

Above graphs apply to all cardioid and hypercardioid models in the FM and FMR Series

## FM Series

### Fully Flexible Gooseneck

FM360 & FM500  
FM360/HC & FM500/HC

## Specifications

**Frequency Response:** 20Hz - 20kHz  
**Polar Pattern:** Cardioid or Hypercardioid  
**Sensitivity:** 20mV/Pa (-34dBV/Pa)  
**Power Requirements:** 24-48V Phantom, 10mA  
**Max Acoustic Input:** 139dB SPL  
**Connector:** XLR-3 (pin 2+)  
**Min Output Load:** 600 ohms between pins 2 & 3  
**Noise:** 16dB SPL equivalent (A weighted)  
**Gooseneck:** Fully flexible gooseneck  
Diameter .275 in. (7mm)  
**Dimensions:** Base diameter is .860" (22mm)  
Lengths: FM360 12.5in. (31.8cm) & FM500 18.3in. (46.5cm)  
**Weight:** 0.3 lb. (137g)

## Architectural & Engineering Specifications

The microphone shall be a back-electret condenser type with a wide-range uniform frequency response of 20 Hz to 20 kHz. The microphone shall have an output level of 10 mV/Pa. The microphone shall be of a single capsule, single membrane design. The microphone shall have an impulse response with the rise time no longer than 25 microseconds, and total settling time, including the rise time, no longer than 120 microseconds. The microphone shall have polar characteristics uniform in all planes to form either a cardioid or hypercardioid of revolution. Response at any angular position up to 90° away from the major axis within frequency range from 500 Hz to 16 kHz shall deviate by no more than ±3 dB from the ideal cardioid or hypercardioid pattern as described by the following equation:  $SPL(a)=20 \cdot \log(1/2+\cos(a)/2)$  (dB), where  $a$  is the angle in radians between the measurement source position axis and the major axis. The microphone shall accept sound pressure levels up to 139 dB producing no more than 3% THD. Overall length above the XLR connector shall be 12.5 in. (31.8cm) long for FM360, 18.3 in. (46.5cm) long for the FM500. The maximum head diameter shall be 1.0 in (25 mm). The microphone shall be terminated with a professional gold-plated 3 pin XLR connector. The microphone shall include an external windscreen. The microphone shall require 24-48V phantom power. The microphone shall be made of metal with black finish. The microphone shall have its entire flexible portion encased in black vinyl. The Earthworks FM360, FM500 or FM360/HC, FM500/HC is specified.

## FMR Series

### Gooseneck with Rigid Center and Flex at both ends

FMR500, FMR600 & FMR720  
FMR500/HC, FMR600/HC & FMR720/HC

## Specifications

**Frequency Response:** 20Hz - 20kHz  
**Polar Pattern:** Cardioid or Hypercardioid  
**Sensitivity:** 20mV/Pa (-34dBV/Pa)  
**Power Requirements:** 24-48V Phantom, 10mA  
**Max Acoustic Input:** 139dB SPL  
**Connector:** XLR-3 (pin 2+)  
**Min Output Load:** 600 ohms between pins 2 & 3  
**Noise:** 16dB SPL equivalent (A weighted)  
**Gooseneck:** Rigid center with 2.5in. to 3in. flex on both ends. Diameter .316 in. (8mm)  
**Dimensions:** Base diameter is .860" (22mm)  
Lengths: FMR720 26.6 in. (67.6cm), FMR600 22.8 in. (58cm), FMR 500 18.3 in. (46.5cm)  
**Weight:** 0.3 lb. (137g)

## Architectural & Engineering Specifications

The microphone shall be a back-electret condenser type with a wide-range uniform frequency response of 20 Hz to 20 kHz. The microphone shall have an output level of 10 mV/Pa. The microphone shall be of a single capsule, single membrane design. The microphone shall have an impulse response with the rise time no longer than 25 microseconds, and total settling time, including the rise time, no longer than 120 microseconds. The microphone shall have polar characteristics uniform in all planes to form either a cardioid or hypercardioid of revolution. Response at any angular position up to 90° away from the major axis within frequency range from 500 Hz to 16 kHz shall deviate by no more than ±3 dB from the ideal cardioid or hypercardioid pattern as described by the following equation:  $SPL(a)=20 \cdot \log(1/2+\cos(a)/2)$  (dB), where  $a$  is the angle in radians between the measurement source position axis and the major axis. The microphone shall accept sound pressure levels up to 139 dB producing no more than 3% THD. Gooseneck will have a rigid center section with flexible gooseneck at both ends. Overall length above the XLR connector shall be 18.3 in. (46.5cm) long for FMR500, 22.8 in. (58cm) long for FMR600 and 26.6 in. (67.6cm) long for the FMR720. The maximum head diameter shall be 1.0 in (25 mm). The microphone shall be terminated with a professional gold-plated 3 pin XLR connector. The microphone shall include an external windscreen. The microphone shall require 24-48V phantom power. The microphone shall be made of metal with black finish. The Earthworks FMR500, FMR600 or FMR720 cardioid or FMR500/HC, FMR600/HC or FMR720/HC is specified.

Earthworks' sleek new metal windscreen design makes the FM and FMR series podium microphones more attractive and more durable than ever before!



### Perfect for:

- Performance Art Centers
- Corporate Boardrooms
- Educational Facilities
- Civic Centers
- Stadiums
- Courtrooms
- Congress



Earthworks FlexMics™ Series have been chosen for use in premium church installations, houses of congress, court rooms, political debates, corporate boardrooms, universities and other educational and governmental institutions.

Specifications Subject to Change without Notice

