

# MICRONETIXX COMMUNICATIONS



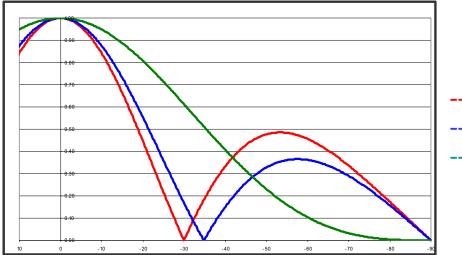
## FMP Series Medium to High power FM C/P Antenna

- Wide Bandwidth
- Rugged construction
- Omni-directional
- Up to 40 kW input rating
- End, Center or Corporate fed versions

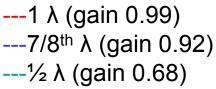
The **FMP** Series of FM antennas from Micronetixx features an excellent H to V ratio, and Omni-directional azimuth pattern. The rugged antennas are built with stainless steel for a long service life. Three versions of the **FMP** antennas are available – an end or center fed version with a tapped feedline or a corporate fed model using a power divider. The bays can be spaced at full wavelengths, half wave, or 7/8<sup>th</sup> wave intervals.

The input power rating per bay is up to 12 kW. The antenna has an excellent bandwidth and is available in a frequency range of 54 to 108 MHz. The FMP antenna has enough bandwidth to be used as a single channel low band VHF (Band I) antenna.

#### **FMP series sample elevation patterns**

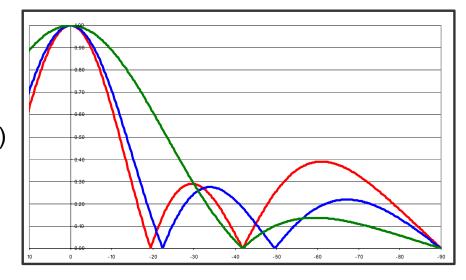


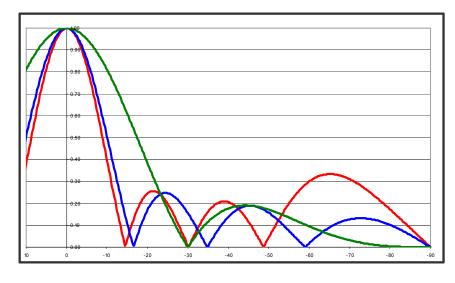
#### Two Bay





---1 λ (gain 1.50) ---7/8th λ (gain 1.46) ---½ λ (gain 1.00)





#### Four Bay

---1 λ (gain 2.05) ---7/8th λ (gain 1.95) ---½ λ (gain 1.30)

#### FMP series hardline and corporate fed options

The **FMP** series of antennas are available in three versions, end fed or center fed antennas with a hardline inter bay feed system and a corporate fed model with a power divider.

The end fed versions of the antenna use hardline inter bay feed lines. The inter by feed lines are either 1-5/8" or 3-1/8" inch depending on the desired power handling needed. The feed line sections are made of Aluminum and bolt to the antenna bays.

The corporate fed **FMP** models use a single pancake style input power divider and flex or semi flex feed lines that go to each bay. The outputs of the power divider can be furnished with N, 7/16" DIN, and 7/8 or 1-5/8 inch EIA flanges depending on the power handling needs

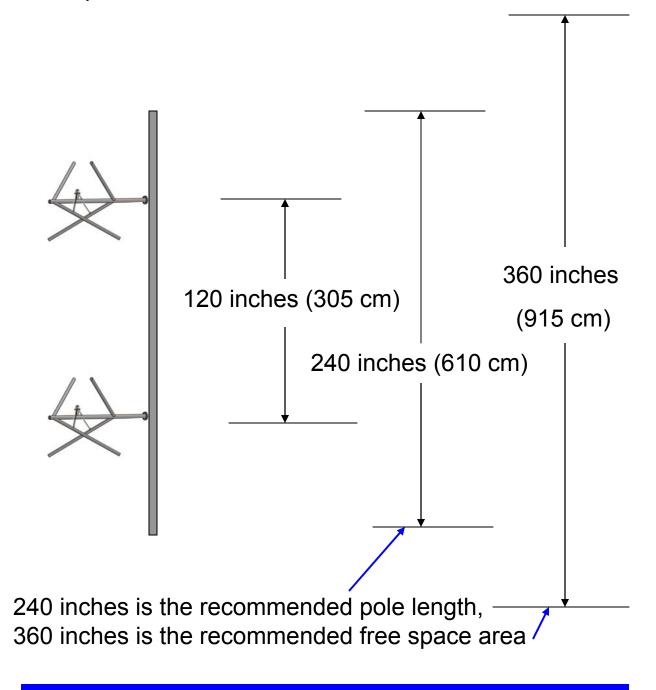
#### **Rugged stainless steel elements and mounts**

The rugged **FMP** antenna is constructed from stainless steel for a long dependable service life. The mounts for the **FMP** are also made of stainless for rust free operation on your tower.





The FMP antennas are easy to install and are pre tuned at the factory. The diagram below depicts a two bay antenna (FMP-2). The antennas will produce the best radiation pattern if mounted to a small support pole, and installed with free space above and below the antenna. The numbers provided are for operation at 98 MHz.



#### **FMP** series FM antenna input power ratings

Model	FMP1 1-5/8" input*	FMP3 3-1/8" input*
1 Bay End Fed	8 kW	12 kW
2 Bay End Fed	8 kW	20 kW
2 Bay Center Fed	10 kW	25 kW
3 Bay End Fed	10 kW	30 kW
4 Bay End Fed	10 kW	40 kW
4 Bay Center Fed	12 kW	40 kW
5 Bay End Fed	10 kW	40 kW
6 Bay End Fed	12 kW	40 kW
6 Bay Center Fed	12 kW	40 kW
7 Bay End Fed	12 kW	40 kW
8 Bay Center Fed	15 kW	40 kW
10 Bay Center Fe	d 15 kW	40 kW
12 Bay Center Fe	_	40 kW
*Note: Power ratings an good for up to 2000 fee (610 meters) above sea level. For higher elevations contact us	t ERI LPX	ERI MPX Jampro JHPC Shively 6810

Options: beam tilt, null fill, special inter-bay spacing, and de-icers. Contact Micronetixx for details

### **FMP Mechanical Data and Options**

Model	Weight	Wind Load Area
FMP3-1	25 lbs. (11.1	kg) 1.0 ft <sup>2</sup> (0.09m <sup>2</sup> )
FMP3-2	65 lbs. (29.5	kg) 4.7 ft <sup>2</sup> (0.43m <sup>2</sup> )
FMP3-3	100 lbs. (45.5	kg) 8.4 ft <sup>2</sup> (0.78m <sup>2</sup> )
FMP3-4	130 lbs. (59.1	kg) 12.1 ft <sup>2</sup> (1.12m <sup>2</sup> )

The data above is for a 98 MHz antenna, please contact us for other frequencies. The weight and wind loads are for the antenna only and are assume a 3-1/8" inter bay feeder. Basic wind speed rating is 125 M.P.H. (200 km/h)

 $\checkmark$ 3 bay and above models can be configured with beam tilt.

✓A four bay FMP antenna with a corporate feed system can have an input power rating of up to 40 kW

Need some assistance or advice in planning your station's antenna? Our engineers have decades of experience in antenna design and applications. Give us a call and we will help to design the best system for you. And after it is up and working we will love to hear from you how great the coverage area is.

