

Directional Antenna Systems 1700 to 2700 MHz Operation

Features

- 50 Ω Passive Feed Dipole
- Integrated N Female Connector or
Optional 24" pigtail with N Male or N Female Connector
- Horizontal or Vertical Polarity
- 15, 19, or 24 dBi Antenna Gain
- Rugged, Lightweight and Waterproof
- Heavy Duty Adjustable Tilt Bracket



19 dBi Antenna System*

Applications

- 2.4 GHz ISM Band Applications
- Point to Point Repeaters
- Wireless Local Loop
- Point to Multipoint Receive Sites
- Wireless Internet Access
- Streaming Video
- Wireless Bridges
- MMDS Applications

Description

The directional antenna systems offered by RF Linx Corporation incorporate parabolic grid type antenna reflectors with the PMPF, patented 50 ohm passive feed dipole. Dipoles come in 2 basic configurations, RFL-MPF-xx with integral Female N type connector and RFL-MPF-xxP with 24" pigtail equipped with an N Male or RFL-MPF-xxPF with an N Female type connector. The antenna reflectors and RFL-MPF dipole can be bought separately for maximum system flexibility. Installation is simple with the RF Linx Corporation adjustable tilt "Heavy Duty" bracket which is standard on all antennas. The bracket accommodates poles from 1" up to 2" OD. Brackets are full galvanized for extreme corrosion protection and each reflector assembly comes complete with Stainless Steel hardware and complete assembly instructions.

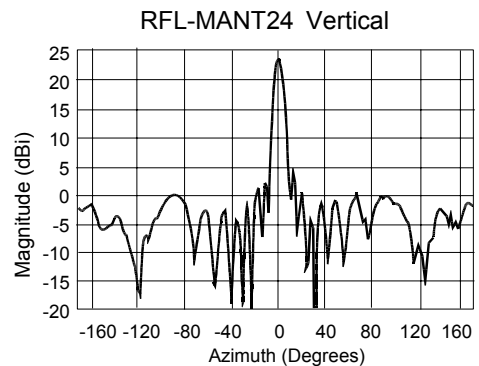
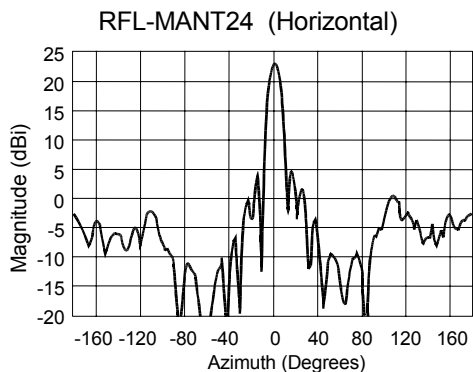
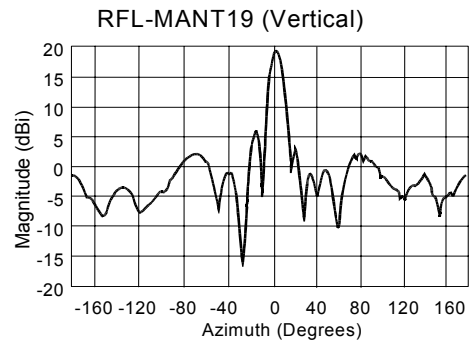
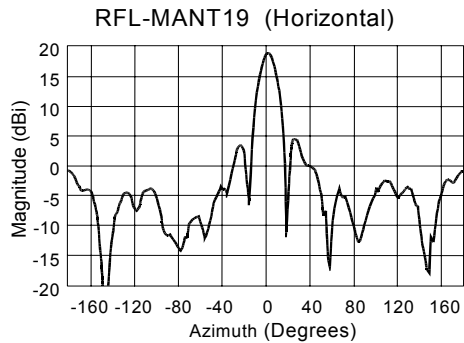
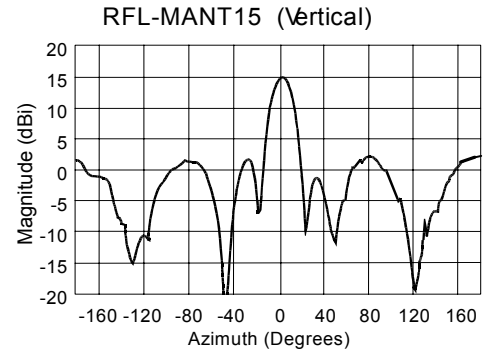
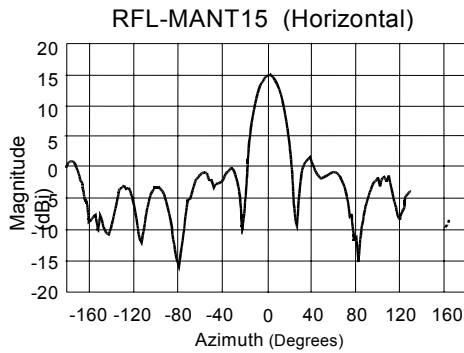
Specifications

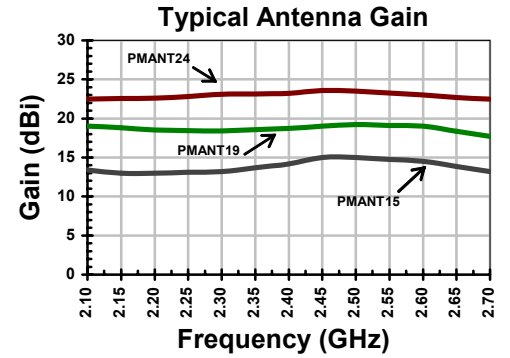
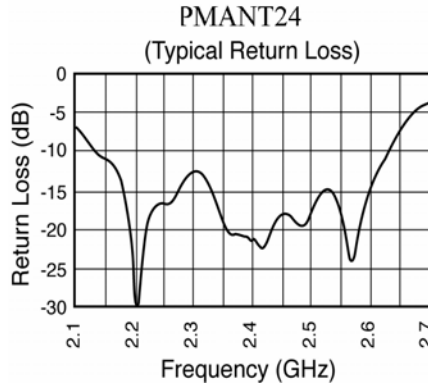
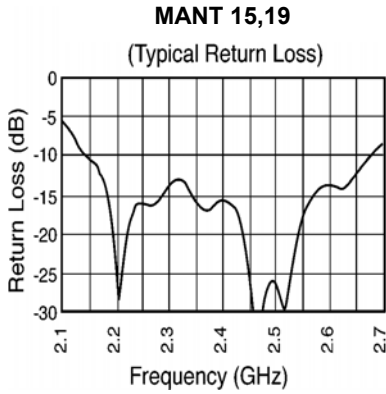
Parameter	Model	Min	Typ	Max	Units
<i>Frequency Range</i>	RFL-MPF-1	2300		2500	MHz
<i>Input Return Loss (S₁₁)</i>			-14		dB
<i>VSWR</i>			1.5:1		
<i>Impedance</i>			50		OHM
<i>Input Power</i>			50		W
<i>Pole Diameter (OD)</i>		1 25		2 50	inch mm
<i>Operating Temperature</i>		-45		+70	Deg C

*Note: RF LINX CORPORATION does not supply the mounting pole or coax cable. Antenna system assembly is required.

1700 □ 2700 MHz	RFL-MANT15	RFL-MANT19	RFL-MANT24
Gain	15 dB	19 dB	24 dB
3dB Beam Angle	19 deg	17 deg	8 deg
Cross Pole	21 dB	32 dB	26 dB
Front to Back	> 19 dB	> 22 dB	> 24 dB
Side Lobe	-15 dB	-17 dB	-20 dB
Wind Loading	100MPH	16.6 Lbs	40 Lbs
	140MPH	32.5 Lbs	78 Lbs
	100MPH: ½" Radial Ice	33.2 Lbs	72.4 Lbs
Weight	2.6 Lbs	3.9 Lbs	8.2 Lbs
Dimension (LxW)	14" x 11.5"	23.6" x 16.7"	34" x 28"
Focal Length	7"	9.5"	16"

Integrated Antenna Patterns

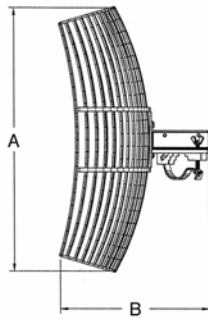




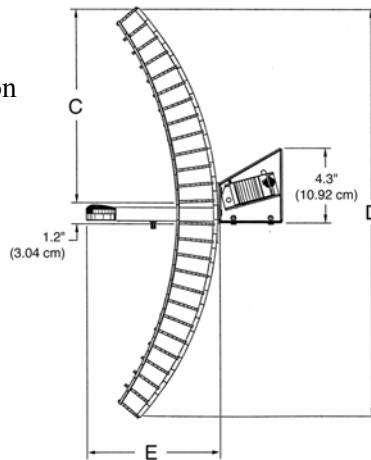
Note: Above are typical return loss and gain using MPF-1 Dipole

Mechanical Specifications

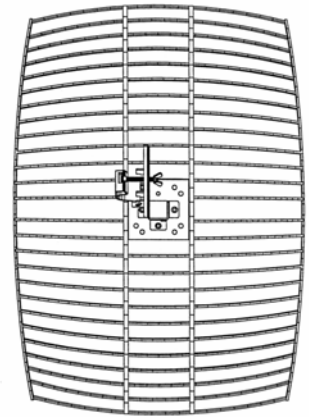
Antenna Reflector: Welded Wire Construction



Top View



Side View



Rear View

	A		B		C		D		E	
	in.	cm.	in.	cm.	in.	cm.	in.	cm.	in.	cm.
RFL-MANT-15	11.5	29.21	6.5	16.51	6.4	16.26	14.0	35.56	7.0	17.78
RFL-MANT-19	16.7	42.42	9.4	23.88	11.2	28.45	23.6	59.95	9.5	24.13
RFL-MANT-24	28.0	71.12	11.4	28.96	16.4	41.66	34.0	86.36	16.0	40.64

Approximate Installed Weight

• including PMPF Dipole

RFL-MANT15	2.6 lbs (1.18 kg)
RFL-MANT19	3.9 lbs (1.77 kg)
RFL-MANT24	8.2 lbs (3.72 kg)

Heavy Duty bracket fits up to 2" (50)mm dia. Pole

Ships standard with all models



Notes:

- Mounting brackets are disassembled from the antenna reflectors so the reflectors stack compactly, which saves volume in both shipping and warehouse storage.
- A complete antenna system includes one MPF-xx, one antenna reflector assembly and bracket with all necessary hardware for pole mounting.

Standard Packaging:

Model	Units per box	L x W x H	Weight	Dimensional Weight (For Air Freight Calculations)
RFL-MANT-15	10 Pack	17" x 15" x 13"	37 Lbs.	37 Lbs.
RFL-MANT-19	5 Pack	24" x 19" x 11"	27 Lbs.	27 Lbs.
RFL-MANT-24	5 Pack	35" x 29" x 12"	59 Lbs.	70 Lbs.

System Ordering: RFL-MANT□□-HD-PF□□ □□

Antenna Gain

15 – 15dBi
 19 – 19dBi
 24 – 24dBi

Bracket Type

HD – Heavy Duty

Feed Type

Blank – No Feed
PF1 – MPF-1 2.4 GHz ISM Band
PF2 – MPF-2 2.5 GHz MMDS Band
PF18 – MPF-18 1.75 to 1.85 GHz
PF18S – MPF-18S 1.70 to 1.85 GHz
PF19 – MPF-19 1.88 to 1.93 GHz DECT

Feed Option

Blank – Standard – N Type Integrated Connector

P – Pigtail with N Male connector

PF – Pigtail with N Female connector



For further information contact:

