



Size: 1.0m

PMA-100

Rapid Deployment, Anywhere

The Man-Pack type PMA-100's advanced feed structure delivers high gain, low side lobes, and exceptional RF performance. Available in various frequency bands, it's equipped with GPS, position detection, polarization adjustment, and a servo drive integrated.

Truly Portable, Instantly Operational

The PMA-100 fits into an IATA-compliant backpack, easily carried by a single user. Deploy within minutes and go live instantly—no additional tools needed. Whether you're racing to a breaking news scene or establishing communications in remote terrain.

Mission-Critical Communications

Ideal for broadcasting, corporate networks, military operations, and emergency communications, the PMA-100 thrives in challenging locations—including hills and mountains. Its rugged design ensures reliable performance wherever duty calls. From natural disasters to remote news gathering, this antenna puts reliable satellite communications in the hands of those who need it most.

Key Features

- X, Ku, and Ka Bands
- LEO/MEO Overhead Tracking Option
- Carbon-fiber reflector with an accuracy of R.M.S 0.25mm
- 3-Axes simultaneous motorisation
- Optional 4G / 5G/ LTE supported modem for load balancing and bonding solutions
- Built-in Wi-Fi and a Web-Based User Interface
- Supports Wide Range BUCs (from 6W to 40W)
- Powered by Mains or Battery
- Integrated / External modem (iDirect, Comtech, Newtech, Hughes)
- Supports OpenAmip



GENERAL SPECIFICATIONS

Reflector Diameter
Antenna Type
GPS
Third Axis Rotation Range

PMA-100

1.0m
Circular symmetric reflector with center feed
Dual GPS Module
±7°

RF CHARACTERISTIC

Frequency (GHz) Tx
Frequency (GHz) Rx
Gain (dBi) (±0.2 dBi) Tx
Gain (dBi) (±0.2 dBi) Rx
Tx/ Rx Isolation (dB)
Rx/ Tx Isolation (dB)
Cross Polarization (dB) Tx
Cross Polarization (dB) Rx
Polarization
VSWR Tx
VSWR Rx
Antenna Pattern Compliancy
Pointing Accuracy

X-Band

7.9 ~ 8.4
7.25 ~ 7.75
36.4
35.7
85
40
1.0
1.5 (Axial Ratio)
RHCP/LHCP (2 Ports)
1.30:1
01:50:01
ITU-R S.580-6 and ITU-R S.465-6
<0.2°

Ku-Band

13.75 ~ 14.50
10.70 ~ 12.75
41.4
39.3
85
40
35
-
Linear H/V (2 Ports)
1.30:1
01:50:01

Ka-Band

27.50 ~ 31.00
17.70 ~ 20.20
48.0
44.5
85
40
1.0
1.5 (Axial Ratio)
RHCP/LHCP (2 Ports)
1.30:1
01:50:01

MECHANICAL/ POWER SPEC.

Antenna Motion Range
Antenna Travels
DC Input
DC Output
Antenna Weight
Backpack Size

Azimuth

10°/s (Variable)
+ 200°
10-72 VDC @ 15 ADC (max) (External: Hand generator, Solar, AC and Vehicle)
24VDC @ 8 ADC
16.5 Kg
680x450x350mm

Elevation

10°/s (Variable)
10°~90°

Polarization

3°/S (Variable)
± 110° (Ku Model Only)

ENVIRONMENTAL SPECIFICATION

Temperature Range Operational
Temperature Range Survival
Wind Speed Operational
Wind Speed Operational w Gusts
Humidity (Relative)
Altitude Above Sea Level
Protection

PMA-100

-30 ~ +60°C
-40 ~ +70°C
50km/h (With weight balance)
65km/h (With reinforcement weight)
0-98%
≤5000m
IP67

Specifications are subject to change.

