



This lightweight microwave transmit antenna is fully automatic, requires no operator intervention during normal operation, has no moving parts for low maintenance costs, and incorporates a solid state switchable antenna array.

The pod is self-contained with integral electronics employing a high performance embedded processor which handles all control, supervision, and high speed streaming communication protocols, together with a solid state compass, 12 channel GPS receiver and modular I/O system.

Eight antenna elements are arranged to overlap patterns to provide 360° of azimuth coverage. At least one element is always selected, ensuring continuous signal transmission. High speed switching circuitry is used to select the appropriate sectors of eight narrow beam antenna elements. The directional antenna helps reduce signal multipath evident with the omni transmit antennas.

The cockpit terminal has a user-friendly operator interface for change of target and operating mode adjustments as needed. The generic rugged design has been extensively field proven in arduous conditions worldwide, and offers many benefits over traditional mechanically steered units.

The BMS GCA-11 can be used in both aircraft and ground based digital or analog applications utilizing up to a 12 Watt power amplifier.

Applications:

- ▶ Aerial and Ground ENG (Electronic News Gathering)
- ▶ Military
- ▶ Law Enforcement
- ▶ Surveillance

Key Features

- ▶ No Moving Parts- Totally Solid State
- ▶ Small and Light Weight Pod
- ▶ Integral Processor, Compass, & GPS Receiver
- ▶ Low Maintenance Costs
- ▶ Electronic High Speed Directional Tracking
- ▶ Ground Data Output for Receive Tracking
- ▶ Directional, Manual, & Omni Operation
- ▶ Models Available from 1.7-6.525 GHz

Antenna	
Polarization	RHC, LHC, or Vertical Linear
Gain	11 dBi Nominal (2 GHz)
AZ Beamwidth	45°
EL Beamwidth	35°
Frequency	1.7-6.525 GHz (500 MHz Bandwidth)
Return Loss	14 dB

Power	
Voltage Input	+8 to +32 VDC
Consumption	30 VA

Environmental	
Operating Temperature	-20 °C to +55 °C
Humidity	Up to 95% RH Non-Condensing

Mechanical	
Dimensions	12" Diameter x 9" High (30.48 x 22.86 cm)
Weight	9 lbs

Misc.	
A Complete System Incorporates External Analog or Digital Transmitter. Contact Factory for Details.	
Supplied Accessories	
GPS Antenna and Cable	
PDA Controller with System Software	
Cables and Connectors	

