Dual Polarized Steerable Beam Antenna for S-Band

SBA2025B-DP

The SBA2025B-DP is a small sized steerable beam antenna optimized for 2000-2500 MHz supporting MIMO with dual polarized radiators. The antenna beams can be steered to achieve optimal gain to the desired direction and to avoid interference from unwanted directions (LPI/LPD). The antenna provides up to 20 beams with a minimum of 25-degree beamwidth to cover the full 360-degree horizontal area. In addition to these narrow beams the antenna can also provide omni directional beam. It's extremely fast beam switching ability makes the antenna suitable for complex node network in tactical communication.

- Excellent performance in a small form factor
- Great directivity with very low side lobe levels to undesired direction (LPI/LPD)
- Integrated 3D sensors: accelerometer, gyroscope and magnetometer

Product details*	
Frequency range	2000 - 2500 MHz
Polarization	Nominally vertical
Antenna type	Steerable beam antenna
Radiation pattern	Directional and omni (Sharp and omni beam modes)
Gain	Up to 13 dBi (Sharp beam mode)
3 dB beamwidth, Elevation	30° (VP&HP, typical)
3 dB beamwidth, Azimuth	25 °(VP&HP, typical)
Sidelobe level(typical)	AZ -20 dB, EL -12 dB
VSWR	≤ 2.0
Nominal Impedance	50 Ω
Power rating	10 W (CW)
Power supply	19 – 32 VDC (<200 mA), MIL-STD-1275E
Beam switching speed	< 1 µs*
Standard color	Black
Radiator	Selectable patch array element, 20 elements
Height	420 mm including the mast mount element
Diameter	420 mm
Weight	8.0 kg

Installation*	
RF connection	2 x Female N-type connector
Power and control	MIL-DTL-26482, Shell size 12*
Mounting	Mast mount adapters for 40-60 mm masts included

Order number	
SBA2025B-DP	Antenna as described above

* more information on request

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