

Surface Mount Antenna (Pat.Pnd.) For GSM/CDMA



Dual-Band Surface Mount

- Mounts easily to roof, trunk or any bulkhead
- Low Profile dual band combines popular GSM, EV-DO, GPRS, 1xRTT
- Models also available for Nextel & ISM 915
- Requires 5/8" (16 mm) mounting hole, nut and weather seal gasket provided

The Dual band antenna provides operation on a variety of network formats. The low profile surface mount style antennas can be mounted to any metal structure, vehicle, cargo container, trailer or ceiling.

These designs use a 5/8" feed thru (16 mm) for securing to the vehicle. Access to the underside of the body surface is required to aid the installation. The antennas are outfitted with 15 feet (4.5 meters) of cable and choice of RF connector (TNC and SMA are typical). Other cable lengths and connectors are available, please consult factory for details.

Electrical operation is provided by a low profile, yet high efficiency air dielectric radiating element. This maintains effective radiation across the desired frequency range, with omnidirectional coverage. Unity gain performance is maintained.

The antennas are enclosed in a weatherproof polycarbonate radome, and supplied with all mounting hardware and sealing gasket. The dual band series has a height of only 0.95" (24 mm). The standard color is white. The Dual Band SM series can also be provided in black or grey radome.

These models are additionally available with a built-in active GPS antenna & 26 dB amplifier. A separate GPS receiver would be required for operation.

Model Numbers

Model	Description
SM-900/1900	Surface mount US GSM/CDMA
SM-837/1900	Surface mount Nextel & 1.9 PCS
SM-925/1800	Surface mount EU GSM & DCS
SM-925/1900	Surface mount ISM/Mobitex & PCS

Please specify desired connectors at time of order. Special configurations available, please consult factory for details.

Specifications

Frequency:		Case Material:	Polycarbonate
US GSM	824-894 & 1850-1990 MHz	Case Size:	4.5"D x .95"H (114 mm x 24 mm)
DCS-1800	1710-1880 MHz	Mounting Stud:	5/8"D (16 mm)
Low SMR (Nextel)	806-870 MHz	Mounting Depth:	Mount up to 7/32" (5.3 mm) surface
High SMR/GSM/ISM	870-960 MHz	Connector:	Specify at time of order, typically TNC, SMA
Cellular / PCS Gain:	Unity or better	Option:	Integral GPS Antenna with amplifier
VSWR:	2:1 max over range	Other cable lengths and connectors are available, consult factory for details	
Operating Temp:	-40° to +85° C		
Impedance:	50 ohms		
Maximum Power:	10 Watts		
Cable:	RG-58, 15 ft (4.5 meters) Low loss RF-195 optional		

These plots can be used for the following models:

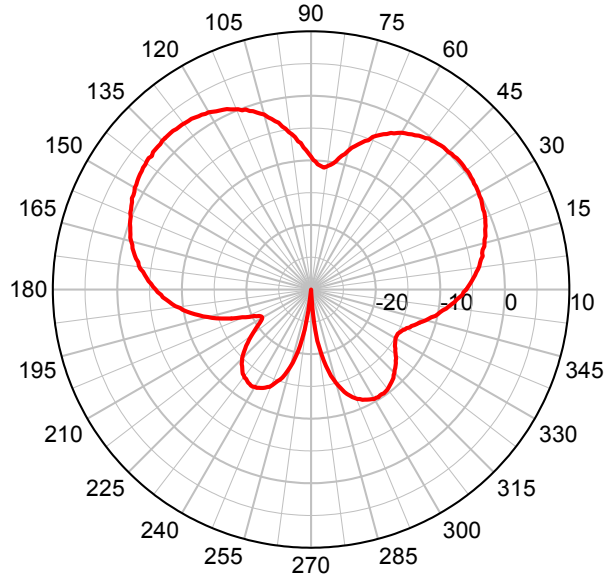
SM-900/1900 Antenna

Surface Mount, Dual Band, Low Profile

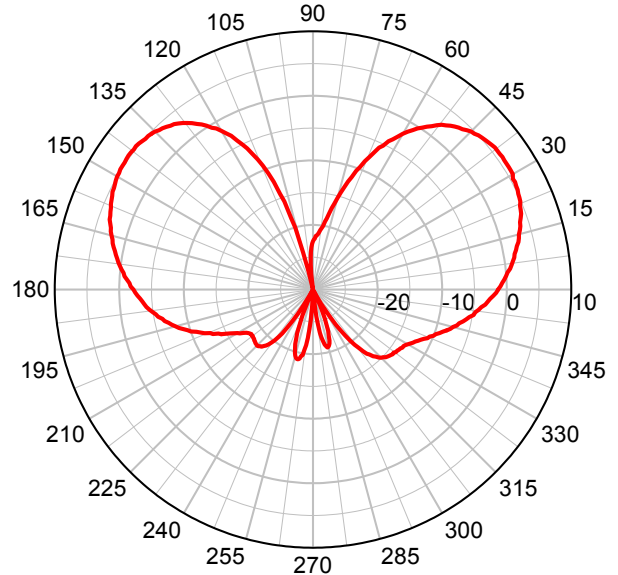
Unity Gain, Cellular/PCS (824-894 & 1850-1990 MHz)

SM-900/1900

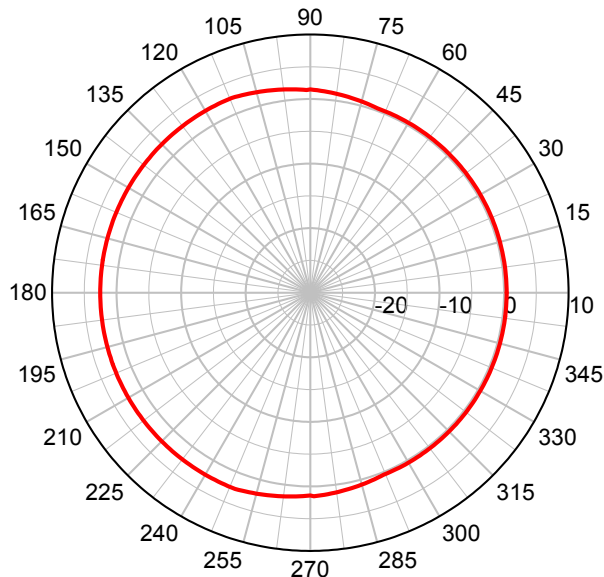
SM-900 – Elevation Plot



SM-1900 – Elevation Plot



SM-900 – Azimuth Plot



SM-1900 – Azimuth Plot

