

Low Profile Wideband Rail Antenna

Rail Antenna

PCT-RSA-160, PCT-RSA-220



Description

Rugged and tough for railroad applications, this antenna is designed to meet stringent AAR environmental standards.

Frequencies

- 158-163 MHz
- 217-233 MHz

Features

- Versatile - may be mounted on locomotive, crew car, or other rugged vehicles
- Rugged - hard coat anodized fully welded aluminum construction
- Low-profile - only approximately 4.4 inches tall
- Field tunable - optimizes performance in various mounting conditions
- Two-hole stud mount - easy installation



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The rugged PCTEL® PCT-RSA directional antennas are designed to be roof mounted on locomotive, crew car, or other railroad vehicles exposed to severe vibration and harsh environmental conditions.

Features

- Versatile – may be mounted on locomotive, crew car, or other rugged vehicles
- Rugged – hard coat anodized fully welded aluminum construction
- Low profile – approximately 4.4 inches tall
- Field tunable – optimizes performance in various mounting conditions
- Easy of installation – Two-hole stud mounting
- AAR compliant design

Applications

- Roof mounting on locomotives, crew cars and other railroad vehicles

Certifications



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Standard Configuration

Model	Cable	Connector	Mount
PCT-RSA-160	Sold separately	Type N Female	Through-hole stud mounting for 1-inch holes
PCT-RSA-220			

Electrical Specifications – Band Specific

Model	Frequency Range	Gain*	VSWR	Average Power	Nominal Impedance	Polarization
PCT-RSA-160	158-163 MHz	2 dBi	< 1.5:1	100 watts	50 ohms	Vertical, linear
PCT-RSA-220	217-223 MHz					

Mechanical and Environmental Specifications

Model	Dimensions (L x H)	Temperature Range	Antenna Material
PCT-RSA-160	15.78 L x 4.32 H in (40.08 x 10.9 cm)	-40°C to +85°C	Aluminum, black hard coat anodized
PCT-RSA-220	6.81 L x 4.32 H in (17.2 x 10.9 cm)**		

*Gain is ground plane dependent; more gain can be achieved with larger ground plane.
 ** Specified height is height above mounting surface.

CONTACT US

**For more information about
this product contact your
sales representative or visit
> pctel.com/antenna-products**

Solving Complex Wireless Challenges

PCTEL, an Amphenol company, is a leading global provider of wireless technology, including purpose-built Industrial IoT devices, antenna systems, and test and measurement products. Trusted by our customers decades, we solve complex wireless challenges to help organizations stay connected, transform, and grow.



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