



## 3978D-HR-DH-W-TAD High Gain, High Rejection Pipe End Mounted GPS Antenna

The 3978D-HR-DH-W-TAD high gain, high rejection pipe end mounted GPS Antenna provides 40 dB gain and great high out-of-band rejection performance. It is the optimal choice for GPS Tracking and Timing applications with long cable runs and stand alone GPS applications. It features a precision tuned custom ceramic patch element for maximum signal reception, 15KV ESD circuit protection, a very low noise 3 stage LNA circuit and dual SAW filters for superior out-of-band rejection. This enables the 3978D-HR-DH-W-TAD to provide a reliable and clear GPS signal while minimizing loss-of-lock, even when conditions are less than ideal. Available in an all-plastic, non-corrosive low profile package with nickel zinc trivalent steel adapter for pipe end installations.

### Features

- Weather proof, all-plastic, non-corrosive, cone-shaped enclosure
- Included adapter for pipe end mounting
- Unique radome sheds water and ice, while eliminating problems associated with bird perching
- Voltage range: 2.7 to 5.5 V
- High gain: 40 dB (typical)
- 15 KV ESD circuit protection

### Low Noise Amplifier Specifications

<b>Nominal Gain:</b> 40 dB
<b>Noise Figure:</b> 3.1 dB (typical)
<b>Voltage:</b> 2.7-5 VDC
<b>ESD Circuit Protection:</b> 15 KV

### RF/Electrical Specifications

Center Frequency	Nominal Gain	Polarization	Current Draw
1575.42 MHz	3 dBic @ 90° -2 dBic @ 20°	Right Hand Circular	15 mA from 2.7-5.5 VDC

### Mechanical Specifications

Antenna Dimensions (diameter x height)	Weight	Shock	Vibration
2.56" x 1.73" (65 x 44 mm)	.12 lbs (50 g)	Vertical axis 50G, other axes 30G	3 axis, sweep = 15 min 10 - 200 Hz log sweep: 3G

Housing	Connector	Mounting Method
GE Lexan® EXL9330	TNC jack	Nickel Zinc Trivalent Steel Adapter Included for Pipe End Mount

### Environmental Specifications

Temperature Range	Weatherproof
-40°C to +85°C operating	IP67

### Out-of-band Filter Rejection

