AST8001900GPS

provides wideband coverage of 800/900 MHz, PCS frequencies

and GPS tracking

support



ASP574 low profile transit antenna series for VHF coverage



## **Technical Data**

Maximum Power: 25 watts (AST8001900GPS) 100 watts (all other models)
Polarization: Vertical Right hand circular (GPSL1 frequencies)
Nominal Impedance: 50 ohms
VSWR: < 1.5:1 (GPSL1 frequencies) < 2.0:1
Radome Material: White, high impact molded ASA
Termination: (See Electrical Specifications)
Cable: Sold separately. Call factory for cable assembly options.
Connector Options: See Mechanical Specifications
Mount Method: Standard 1-5/16" roof hole mount Supplied with screws and weather-proof gasket.

For detailed specifications, visit http://antenna.pctel.com.

# Silhouette Transit Antennas

Our Antenna Specialists<sup>®</sup> Silhouette antennas are is designed for transit vehicle installations including buses, police vehicles, fire-fighting engines, railroad equipment, airport service vehicles, and construction equipment. These low profile multi-band antennas provide wideband coverage of specific frequencies without field tuning required.\* They are housed in a high impact molded ASA radome for long-lasting performance under severe environmental conditions. A GPS multi-band model is also available.

#### Features

- Rugged high impact molded ASA radome assures long, reliable performance and protection against the elements
- High Performance when mounted on a flat surface, maximum radiation is vertical and omnidirectional
- Disguised Appearance low profile for minimum exposure to theft or vandalism
- Wideband Coverage requires no field tuning\*
- GPS Tracking Support Capability AST800/1900GPS model

### Antenna Electrical Specifications

Model	Frequency Range	Bandwidth**	Gain
ASPB574**	148-160 MHz	0.5 MHz	Unity
ASPC574**	160-174 MHz	0.5 MHz	Unity
ASP372	380-400 MHz	20 MHz	Unity
ASP572	450-470 MHz	20 MHz	Unity
ASP772	450-470 MHz	20 MHz	Unity
ASPB572	470-488 MHz	18 MHz	Unity
ASPB772	470-488 MHz	18 MHz	Unity
ASPC572	488-512 MHz	24 MHz	Unity
ASPC772	488-512 MHz	24 MHz	Unity
ASP931	806-894 MHz	88 MHz	Unity
AST8001900GPS	806-960 MHz and 1850-1990 MHz 1575.42 +/-10 MHz (GPS L1)	154 MHz/ 140 MHz	Unity (800/900 MHz and 1850-1990 MHz) 3.5 dBic Nominal (GPS)
ASPG931	890-960 MHz	154 MHz	Unity

Main TOC

Section TOC

\* All models except those covering VHF frequencies \*\*(Field Tunable within Specified Frequencies)

	Model	Termination	Dimensions
	ASPB574**	SO-239	4.1" H x 17" L x 3.5" W
Г	ASPC574**	SO-239	4.1" H x 17" L x 3.5" W
	ASP372	UHF female bulkhead	3.4" H x 8" L x 3.5" W
	ASP572	UHF female bulkhead	3.13" H x 8" L x 3.5" W
	ASP772	BNC female bulkhead	3.4" H x 8" L x 3.5" W
	ASPB572	UHF female bulkhead	3.4" H x 8" L x 3.5" W
	ASPB772	BNC female bulkhead	3.4" H x 8" L x 3.5" W
	ASPC572	UHF female bulkhead	3.4" H x 8" L x 3.5" W
	ASPC772	BNC female bulkhead	3.4" H x 8" L x 3.5" W
	ASP931	N female bulkhead	3.4" H x 8" L x 3.5" W
	AST8001900GPS	N female bulkhead (800/1900 MHz frequencies) 17 ft RG-174/U with male SMA (GPSL1 frequencies)	3.4" H x 8" L x 3.5" W
	ASPG931	N female bulkhead	3.4" H x 8" L x 3.5" W

# **Mechanical Specifications**

# Low Noise Amplifier Specifications

Frequency Band	Axial Ratio	Amplifier Gain	Isolation between Antennas
1575.42 +/-10 MHz	< 3 dB @ boreside	26 dB +/-3 (across 20 MHz bandwidth)	<ul> <li>&gt; 65 dB active (806-960 MHz to GPS)</li> <li>&gt; 60 dB active (1850-1990 MHz to GPS)</li> <li>&gt; 20 dB passive (1575 MHz +/-1 MHz to GPS)</li> </ul>

DC Current	DC Voltage	Noise Figure	Filtering	Out-of-Band Signal Rejection	P1 dB	OIP3
20 mA nominal; < 30 mA @ -40°C to +85°C	3 - 13.5 V	< 1.8:1 typical @ 25°C < 2.2:1 @ -40°C to +85°C	Hybrid (including pre-selector)	> 30 dB @ +/-50 MHz	> 5 dBm typical	14 dBm typical

\* All models except those covering VHF frequencies \*\*(Field Tunable within Specified Frequencies)

