



## 900 MHz 8 dBi Flat Patch Antenna

### Antennas Technical Data Sheet

PE51FP1005

#### Features

- Superior performance
- Light weight and only 8.5 inches square
- Durable UV-stable, UL flame rated radome
- Low loss solid brass elements and 12 in. coax lead
- Can be installed for either vertical or horizontal polarization

#### Applications

- 900MHz ISM Band
- Wireless LAN systems
- Cellular, GSM
- LPWAN, LoRA, IoT, M2M applications
- SCADA, RFID

#### Description

Only 8.5 inches square This high gain flat patch antenna provides 8 dBi gain with broad coverage. It is suitable for both indoor and outdoor wireless LAN and wireless video applications in the 900MHz ISM band, GSM, 900MHz cellular,RFID, and LPWAN/IoT/M2M applications.

This antenna's construction features sealed internal elements and an aesthetic UV-stable, UL flame rated white plastic radome. Can be wall or mast mounted using U-bolts.

Custom Connectors are available for this antenna.

#### Configuration

Design	Panel
Band Type	Single
Radiation Pattern	Directional
Polarization	Vertical or Horizontal
Cable Length	12 in [304.8 mm]
Connector Type	N Female
Number of Ports	1

#### Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Input VSWR		1.5:1	1.5:1	
Impedance		50		Ohms
Gain		8		dBi

#### Specifications by Band

Description	Band 1	Band 2	Band 3	Band 4	Band 5	Units
Range	902-928					MHz
Gain	8					dBi
Horizontal Beam Width	75					Degees
Vertical Beam Width	65					Degees

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [900 MHz 8 dBi Flat Patch Antenna PE51FP1005](#)



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**Mechanical Specifications**

Radome Material

UV-inhibited Polymer

**Size**

Overall Length

8.5 in [215.9 mm]

Width

8.5 in [215.9 mm]

Height

1.2 in [30.48 mm]

Weight

1.17 lbs [530.7 g]

Color

White

**Environmental Specifications**

**Temperature**

Operating Range

-20 to +60 deg C

Environment

UL-94HB

Wind Loading

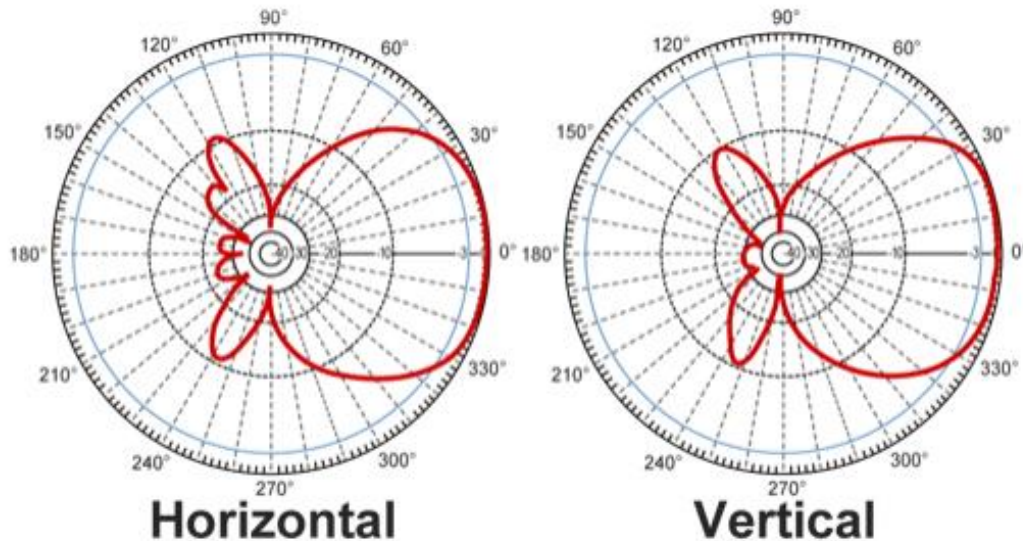
150 MPH [241.4 KPH]

**Compliance Certifications** (see [product page](#) for current document)

**Plotted and Other Data**

Notes:

**Typical Radiation Pattern**



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900 MHz 8 dBi Flat Patch Antenna from Pasternack Enterprises has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99.4% availability and are part of the broadest selection in the industry.

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [900 MHz 8 dBi Flat Patch Antenna PE51FP1005](#)

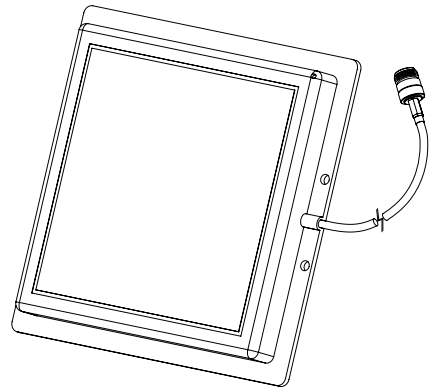
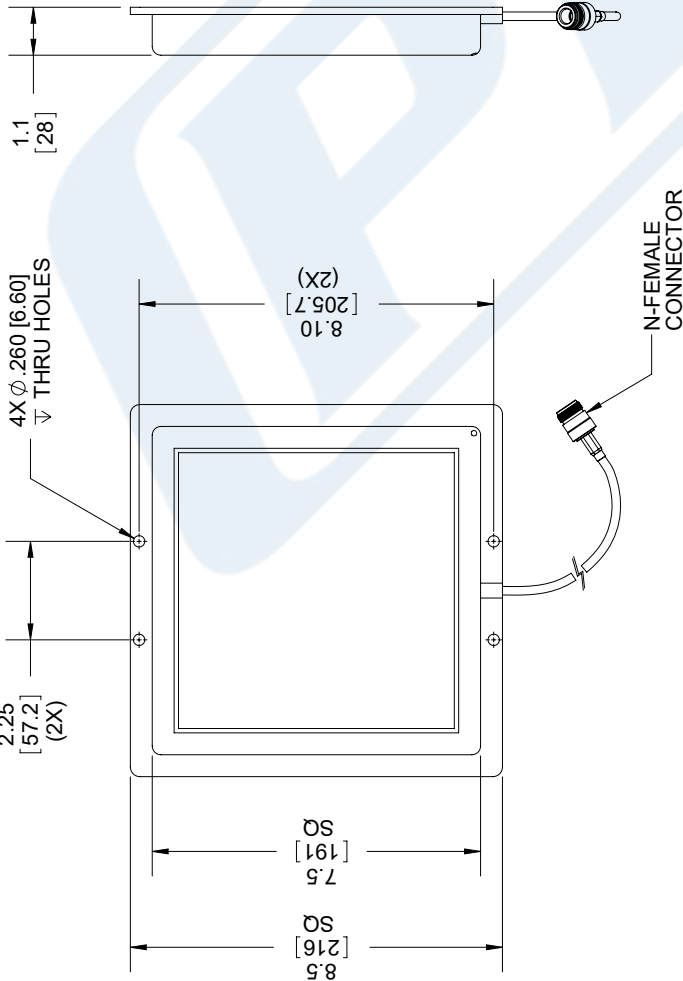
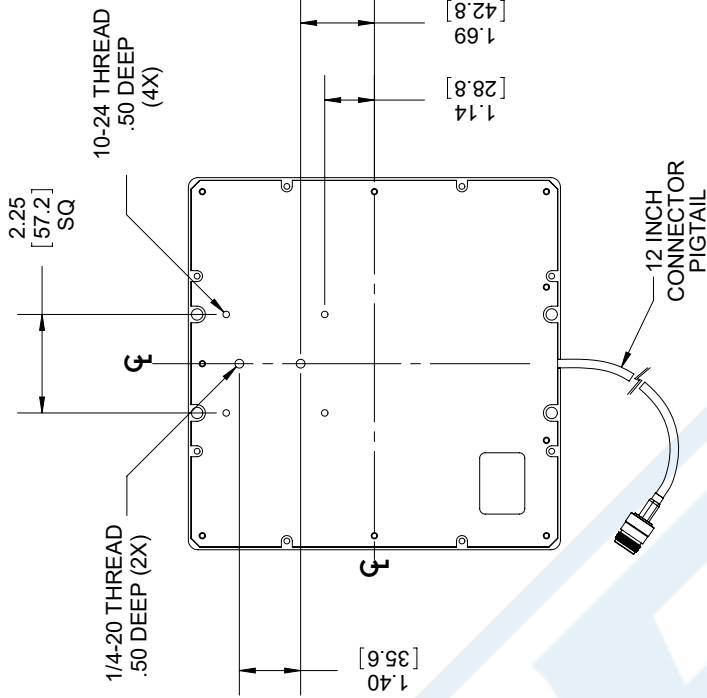
URL: <https://www.pasternack.com/single-antenna-8-dbi-gain-n-pe51fp1005-p.aspx>

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# PE51FP1005 CAD Drawing

## 900 MHz 8 dBi Flat Patch Antenna

REV.	DESCRIPTION	DATE	APPROVED
A	INITIAL RELEASE	2/11/2020	M.MILLER



UNLESS OTHERWISE SPECIFIED LEADING DIMENSIONS ARE INCHES DIMENSIONS IN [ ] ARE MILLIMETERS

TOLERANCES:  
 .X = ±.2 [5.08] FRACTIONS ± 1/32  
 .XX = ±.02 [.51] ANGLES ± 1°  
 .XXX = ±.005 [.13]

CABLE LENGTH (L) TOLERANCES:  
 L ≤ 12 [305] = +1 [25] / -0  
 12 [305] < L ≤ 60 [1524] = +2 [51] / -0  
 60 [1524] < L ≤ 120 [3048] = +4 [102] / -0  
 120 [3048] < L ≤ 300 [7620] = +6 [152] / -0  
 300 [7620] < L = +5% / -0

ALL DIMENSIONS SHOWN ARE FOR REFERENCE ONLY.

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 SHEET 1 OF 1  
 SCALE N/A

SIZE	CAGE CODE	DRAWN BY	ITEM NO
A	53919	K.DANG	PE51FP1005
REV	REV		
A	A		

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