



## 698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna

### Antennas Technical Data Sheet

PE51SE1004

#### Features

- Frequency coverage for 700 MHz, 850 MHz, AWS and PCS bands
- Dual cross polarized (X-Pol) in one antenna
- All weather operation
- Heavy duty steel mounting bracket with easy elevation and tilt adjustment
- Dual polarity feed system - (2) N-Female connectors

#### Applications

- DAS (Distributed Antenna Systems)
- Cellular networks
- Public safety
- IEEE 802.11b/g WiFi applications
- LPWAN, LoRA, LTE-M, NB-IoT, IoT, M2M applications

#### Description

The HyperLink PE51SE1004 is a professional grade 65 degree cross polarized sector panel antenna specifically designed for DAS (Distributed Antenna Systems). It is ideal for LPWAN/IoT/M2M applications including LoRA, LTE-N, and nB-IoT. This outdoor all weather antenna helps wireless carriers to quickly increase capacity as well as deploy new spectrum in zoning challenged locations. The PE51SE1004 combines several different frequency bands to allow multi-user options.

The PE51SE1004 features two independent antennas with cross polarization. This feature doubles the wireless capacity over the same channels. The antenna is fed via two N-Female ports, one for +45° polarized and one for -45° polarized signals. This feature makes these antennas ideal for polarization diversity systems. This antenna's construction features a durable UV resistant PVC radome for durability and aesthetics. Its mounting system features heavy-duty up/down tilt mounting brackets. This allows installation at various degrees of incline for easy alignment.

#### Configuration

Design	Sector
Band Type	Multi
Radiation Pattern	Directional
Polarization	45 Deg. Slant
Connector Type	N Female
Number of Ports	2
Lightning Protection	DC Ground

#### Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Input VSWR		1.9:1	1.9:1	
Impedance		50		Ohms
Gain		10		dBi
Gain	9		10	dBi
Isolation	26			dB
Front to Back Ratio		21		dB
Input Power			100	Watts

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna PE51SE1004](#)



698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna

Antennas Technical Data Sheet

PE51SE1004

**Specifications by Band**

Description	Band 1	Band 2	Band 3	Band 4	Band 5	Units
Range	698-960	1,710-2,700				MHz
Gain	10	10	10			dBi
Horizontal Beam Width	63	62				Degrees
Vertical Beam Width	62	56				Degrees
Maximum Input Power	100					Watts

**Mechanical Specifications**

Radome Material

PVC

**Size**

Overall Length

17.6 in [447.04 mm]

Width

11 in [279.4 mm]

Height

4.9 in [124.46 mm]

Weight

8.1 lbs [3.67 kg]

**Environmental Specifications**

**Temperature**

Operating Range

-40 to +60 deg C

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

**Plotted and Other Data**

Notes:

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna PE51SE1004](#)



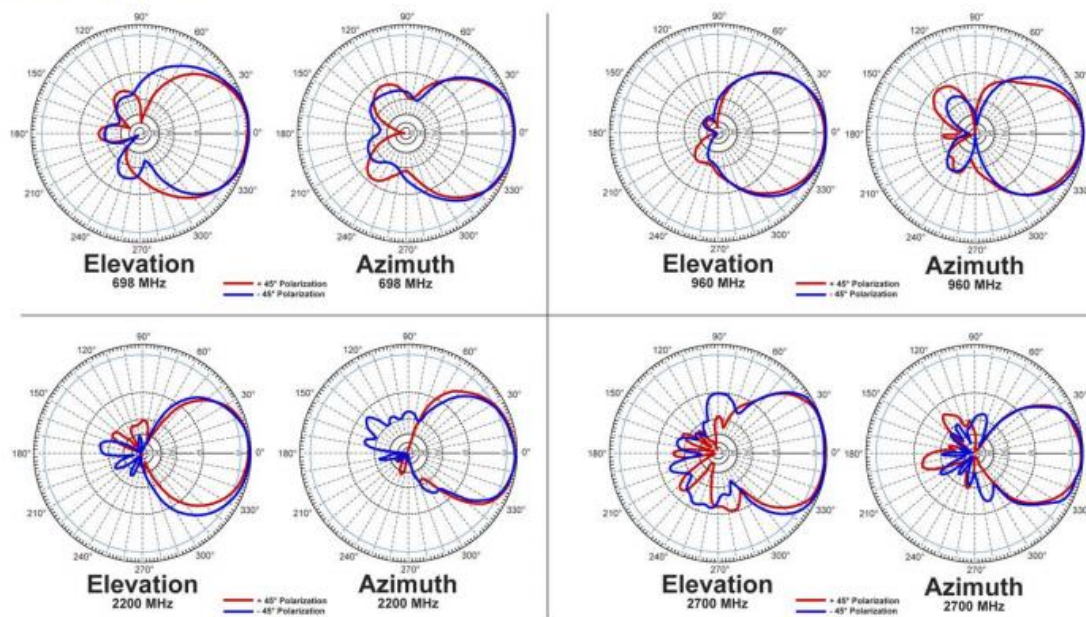
## 698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna

### Antennas Technical Data Sheet

PE51SE1004

#### Typical Radiation Pattern

##### RF Antenna Patterns



698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS 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: [698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna PE51SE1004](https://www.pasternack.com/multi-antenna-10-dbi-gain-n-pe51se1004-p.aspx)

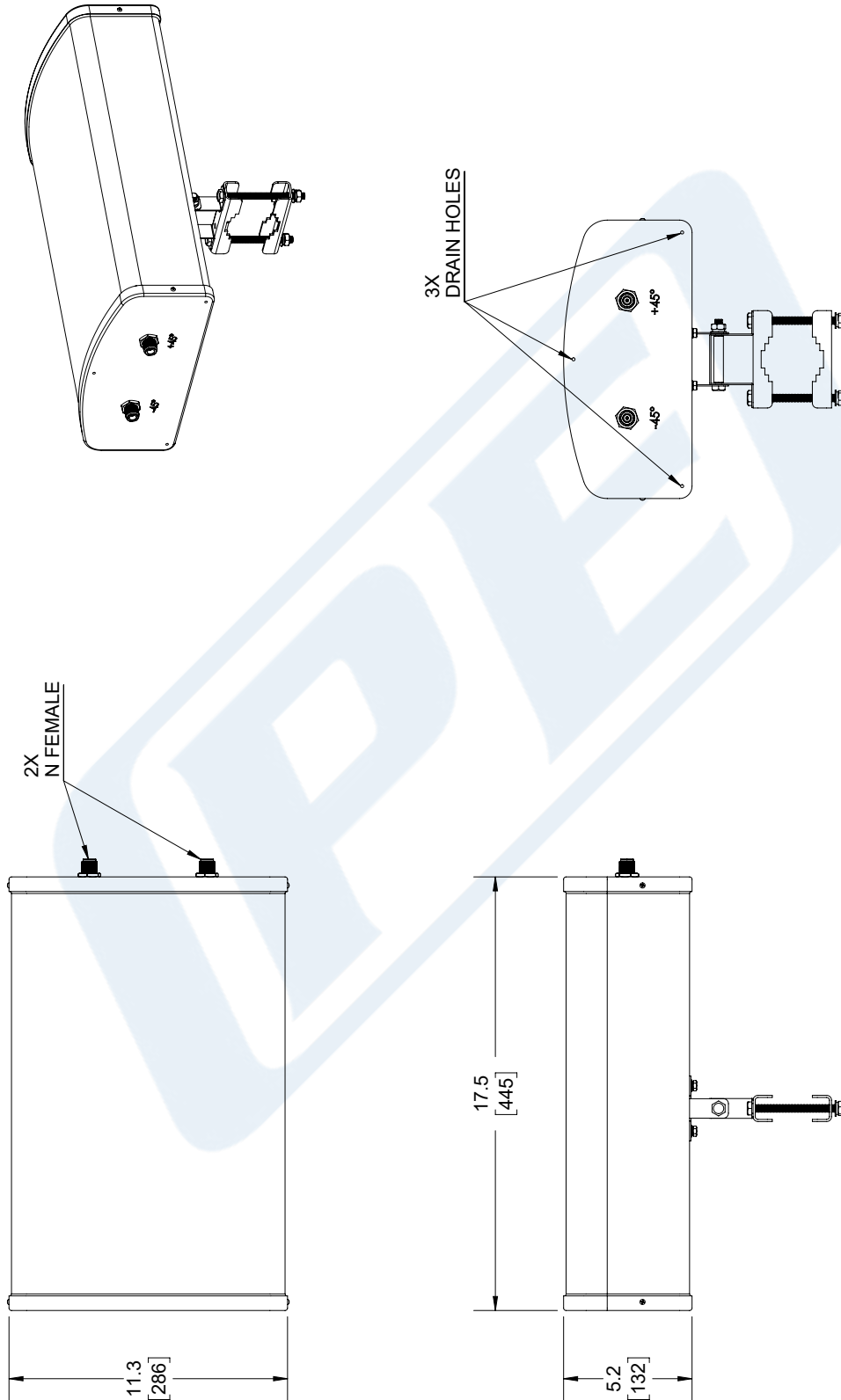
URL: <https://www.pasternack.com/multi-antenna-10-dbi-gain-n-pe51se1004-p.aspx>

The information contained in this document is accurate to the best of our knowledge and representative of the part described herein. It may be necessary to make modifications to the part and/or the documentation of the part, in order to implement improvements. Pasternack reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Pasternack does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Pasternack does not assume any liability arising out of the use of any part or documentation.

# PE51SE1004 CAD Drawing

698-960/1710-2700 MHz 65 Degree Cross-Polarized Sector DAS Antenna

REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
A	INITIAL RELEASE	2/19/2020	M.MILLER



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

TOLERANCES:

SIZE	FRACTIONS	ANGLES	CABLE LENGTH (L)
.X = ± .2	[.08]	± 1/32	L ≤ 12 [305] = ± 1 [25] / -0
.XX = ± .02	[.51]	± 1°	12 [305] < L ≤ 60 [1524] = ± 2 [51] / -0
.XXX = ± .005	[.13]	± 1°	60 [1524] < L ≤ 120 [3048] = ± 4 [102] / -0
			120 [3048] < L ≤ 300 [7620] = ± 6 [152] / -0
			300 [7620] < L = ± 5% L / -0

ALL DIMENSIONS SHOWN  
ARE FOR REFERENCE ONLY.

**THIRD-ANGLE PROJECTION**

THE INFORMATION AND  
DESIGN IN THIS DOCUMENT  
IS THE PROPERTY OF  
PASTERNAK CORPORATION  
ALL RIGHTS RESERVED.

SHEET 1 OF 1

SCALE N/A

**PASTERNAK**  
an INFINITI brand

Pasternack Enterprises, Inc.  
P.O. Box 16759, Irvine, CA 92623.  
Phone: 1.949.261.1920 | 1.866.727.8376  
Fax: 1.949.261.7451  
Website: www.pasternack.com  
E-mail: sales@pasternack.com

ITEM NO. PE51SE1004

SIZE A CAGE CODE 53919 DRAWN BY K.DANG

REV A

## REGULATORY COMPLIANCE:

EU RoHS Directive (Most Recent Released Version)

THESE COMMODITIES, TECHNOLOGY OR SOFTWARE WERE EXPORTED FROM THE UNITED STATES IN ACCORDANCE WITH THE EXPORT ADMINISTRATION REGULATIONS. DIVERSION CONTRARY TO U.S. LAW PROHIBITED.