



20 dB Fixed Attenuator, N Male to N Female  
 Directional Black Anodized Aluminum Heatsink  
 Body Rated to 150 Watts Up to 8 GHz

## RF Fixed Attenuators Technical Data Sheet

PE7AP150-20

### Features

- Directional
- DC to 8 GHz Frequency Range
- Attenuation 20±2 dB
- Max Power 150 Watts (CW)
- VSWR < 1.5:1

### Applications

- Instrumentation
- Precision measurements
- Prototyping and characterization
- Production systems

### Description

Pasternack carries a wide range of fixed attenuators with a broad selection of attenuation levels, frequency ranges, and power dissipation ranges. RF microwave attenuators (also known as RF pads) lower the amplitude of a signal (attenuate) a known amount and can be used in a wide variety of applications. These attenuator pads are used when a signal needs to be reduced to protect measurement equipment or other circuitry, to extend the range of power meters and amplifiers, and to impedance match circuits by reducing the VSWR seen by adjacent components. RF attenuators can prevent signal overload in amplifiers, receivers and detectors, adjusting the signal level to a range that is optimal.

Few RF components are as commonly used as fixed coaxial attenuators, and Pasternack carries one of the largest in-stock varieties and ships them same day. The 20 dB Fixed Attenuator PE7AP150-20 is rated to 150 Watts and operates from DC to 8 GHz. The versatile coaxial package uses type N male to type N female connectors and is also REACH and RoHS compliant. The Black Anodized Aluminum Heatsink body allows for efficient heat dissipation under high power usage conditions.

### Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	DC		8	GHz
Impedance		50		Ohms
Nominal Attenuation		20		dB
VSWR			1.5:1	
Input Power, CW derated linearly to 15W at +125°C			150	Watts
Input Power, Peak 5µs pulse, 0.1% duty cycle			2.5	kWatts

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [20 dB Fixed Attenuator, N Male to N Female Directional Black Anodized Aluminum Heatsink Body Rated to 150 Watts Up to 8 GHz PE7AP150-20](#)



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### Specifications by Frequency

Description	F1	F2	F3	F4	F5	Units
Range	DC to 2	2 to 4	4 to 6	6 to 8		GHz
VSWR, Max	1.2:1	1.3:1	1.4:1	1.5:1		
Attenuation Accuracy, Typ	0.75	0.75	1.25	2		dB

### Mechanical Specifications

#### Size

Length	6.39 in [162.31 mm]
Width/Diameter	5.8 in [147.32 mm]
Height	4.21 in [106.93 mm]
Weight	4.585 lbs [2.08 Kg]
Body Material and Plating	Black Anodized Aluminum Heatsink

#### Configuration

Design	Fixed, Directional
Package Style	Connectorized Module

### Connectors

Description	Connector 1	Connector 2
Type	N Male	N Female
Connector Specification	MIL-STD-348	MIL-STD-348
Contact Material and Plating	Beryllium Copper, Silver	Beryllium Copper, Silver
Body Material and Plating	Stainless Steel, Silver	Stainless Steel, Silver

Mechanical Specification Notes:

Connector interface in accordance with MIL-STD-348 and MIL-PRF-39012

### Environmental Specifications

#### Temperature

Operating Range	-55 to +125 deg C
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**Compliance Certifications** (see [product page](#) for current document)

### Plotted and Other Data

Notes:

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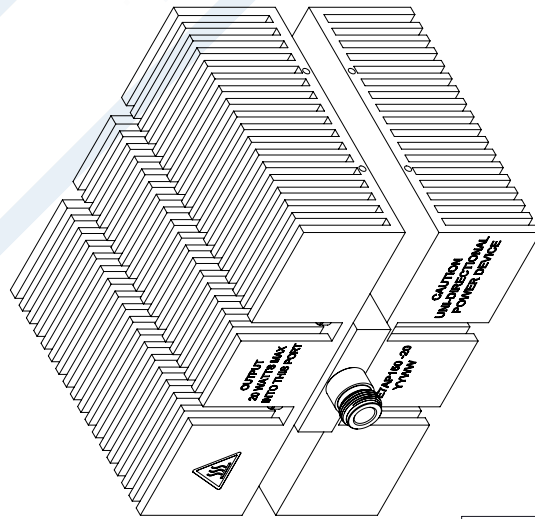
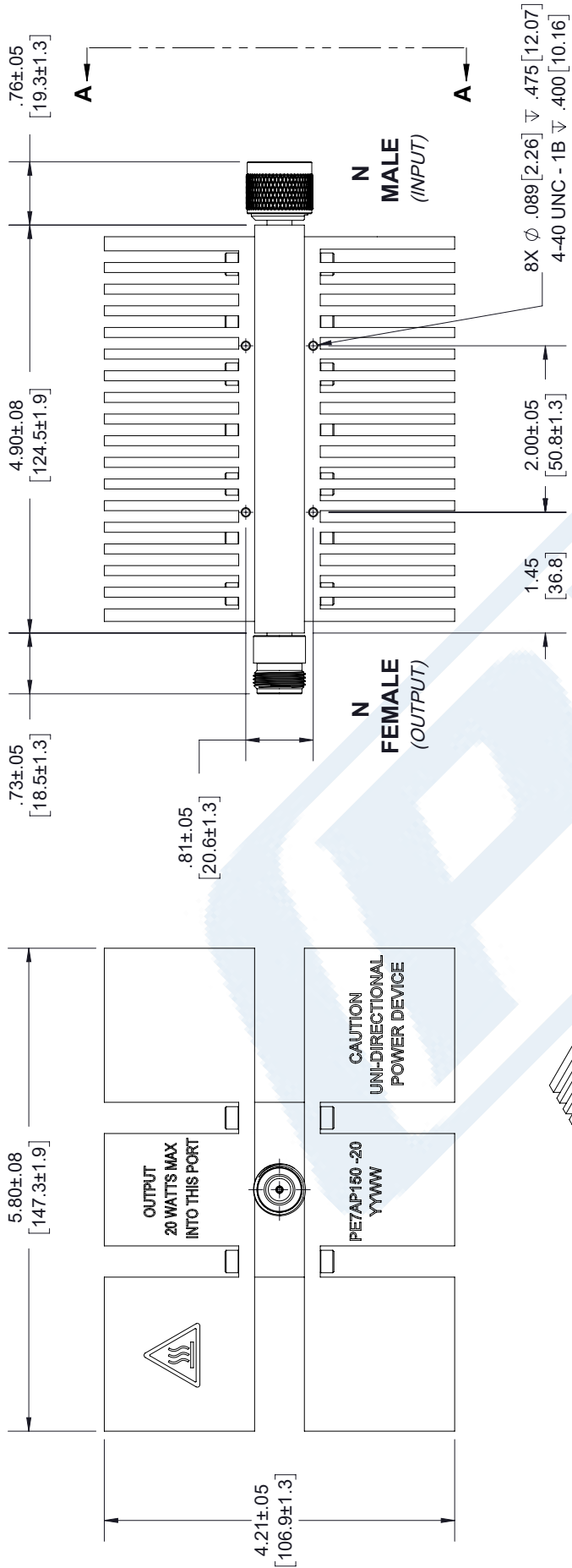
20 dB Fixed Attenuator, N Male to N Female Directional Black Anodized Aluminum Heatsink Body Rated to 150 Watts Up to 8 GHz from Pasternack Enterprises has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99.4% availability and are part 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: [20 dB Fixed Attenuator, N Male to N Female Directional Black Anodized Aluminum Heatsink Body Rated to 150 Watts Up to 8 GHz PE7AP150-20](https://www.pasternack.com/20db-fixed-n-male-n-female-150-watts-attenuator-pe7ap150-20-p.aspx)

URL: <https://www.pasternack.com/20db-fixed-n-male-n-female-150-watts-attenuator-pe7ap150-20-p.aspx>

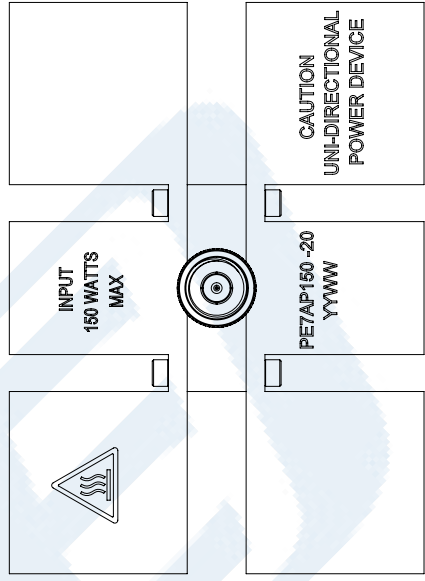
# PE7AP150-20 CAD Drawing

20 dB Fixed Attenuator, N Male to N Female Directional Black Anodized Aluminum Heatsink Body Rated to 150 Watts Up to 8 GHz



STANDARD TOLERANCES	
.X	±0.2
.XX	±0.01
.XXX	±0.005

\*STANDARD TOLERANCES APPLY ONLY TO DIMENSIONS IN INCHES



VIEW A-A

<p>NOTES:</p> <ol style="list-style-type: none"> <li>UNLESS OTHERWISE SPECIFIED ALL DIMENSIONS ARE NOMINAL.</li> <li>ALL SPECIFICATIONS ARE SUBJECT TO CHANGE WITHOUT NOTICE AT ANY TIME.</li> <li>DIMENSIONS ARE IN INCHES [mm].</li> </ol>	DWG TITLE	PE7AP150-20
	CAGE CODE	53919
CAD FILE	08/22/18	SCALE N/A
SIZE	A	7361

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