

0 to 91 dB Push Button Step Attenuator,
75 Ohm BNC Female To 75 Ohm BNC Female With
1 dB Step Rated To 2 Watts Up To 2.5 GHz

RF Step Attenuators Technical Data Sheet

PE70A1046

Features

- 1, 2, 4, 8, 16, 20, 20, and 20 dB step buttons
- 0 to 91 dB Attenuation
- 7.5 Attenuation Accuracy Maximum
- BNC Female Connectors
- Maximum Power 2 Watts (CW)

Applications

- Instrumentation
- Precision Measurements
- Prototyping and Characterization
- Production Systems

Description

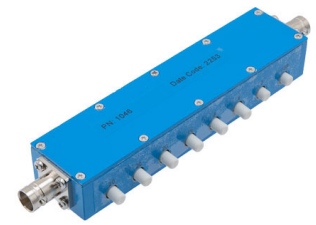
The PE70A1046 is a Step Attenuator that has 91 dB of total attenuation with 1, 2, 4, 8, 16, 20, 20, and 20 dB push button steps, designed across the frequency range of DC to 2.5 GHz. Select button for desired attenuation level, total attenuation is the sum of all buttons selected. The design is tried and true technology that offers exceptional performance characteristics that include 3 dB maximum insertion loss, and a maximum VSWR of 1.4:1. The design also features excellent attenuation accuracy with 7.5 dB maximum. The Nickel plated Brass package has BNC Female connectors, and operates within the temperature range of -20°C to 85°C.

Electrical Specifications

| Description | Minimum | Typical | Maximum | Units |
|---|---------|---|---------|-------|
| Frequency Range | DC | | 2.5 | GHz |
| Impedance | | 75 | | Ohms |
| Insertion Loss | | | 3 | dB |
| Attenuation Value | | 0 to 91 | | dB |
| Step Size | | 1 | | dB |
| Step Type | | Push Button | | |
| Accuracy Statement | | ±0.5dB (1,2,4,8 dB), ±1dB (16dB), ±1.5dB (20dB) | | |
| Input Power (CW) | | | 2 | Watts |
| Input Power, Peak 5 μs pulse width 2% duty cycle | | | 100 | Watts |
| VSWR | | | 1.4:1 | |

Electrical Specification Notes:
Attenuation accuracy is by button

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [0 to 91 dB Push Button Step Attenuator, 75 Ohm BNC Female To 75 Ohm BNC Female With 1 dB Step Rated To 2 Watts Up To 2.5 GHz PE70A1046](#)



0 to 91 dB Push Button Step Attenuator,
75 Ohm BNC Female To 75 Ohm BNC Female With
1 dB Step Rated To 2 Watts Up To 2.5 GHz

RF Step Attenuators Technical Data Sheet

PE70A1046

Mechanical Specifications

Size

| | |
|--------|----------------------|
| Length | 6.142 in [156.01 mm] |
| Width | 0.787 in [19.99 mm] |
| Height | 1.398 in [35.51 mm] |
| Weight | 0.32 lbs [145.15 g] |

| | |
|---------------------------|-----------------|
| Body Material and Plating | Aluminum, Paint |
|---------------------------|-----------------|

Connectors

| Description | Connector 1 | Connector 2 |
|------------------------------|------------------------|------------------------|
| Type | BNC Female | BNC Female |
| Contact Material and Plating | Beryllium Copper, Gold | Beryllium Copper, Gold |
| Body Material and Plating | Brass, Nickel | Brass, Nickel |

Environmental Specifications

Temperature

| | |
|-----------------|-----------------|
| Operating Range | -20 to 85 deg C |
|-----------------|-----------------|

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

Plotted and Other Data

Notes:

0 to 91 dB Push Button Step Attenuator, 75 Ohm BNC Female To 75 Ohm BNC Female With 1 dB Step Rated To 2 Watts Up To 2.5 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: [0 to 91 dB Push Button Step Attenuator, 75 Ohm BNC Female To 75 Ohm BNC Female With 1 dB Step Rated To 2 Watts Up To 2.5 GHz PE70A1046](#)

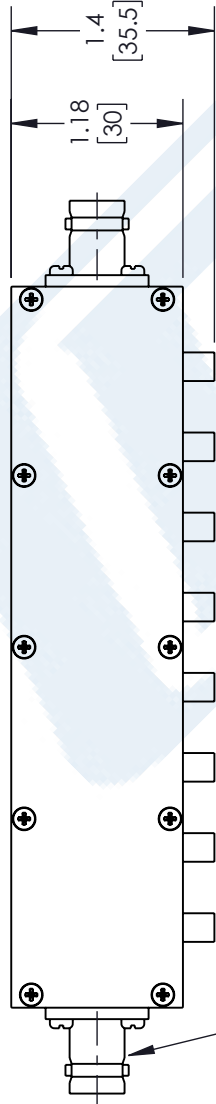
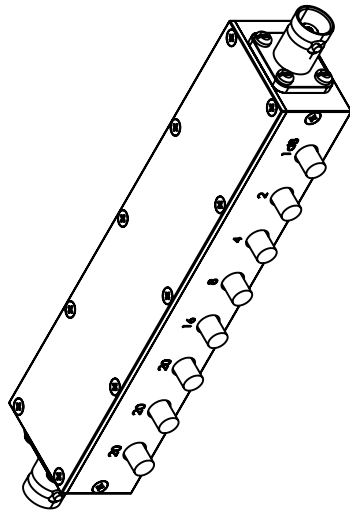
URL: <https://www.pasternack.com/91db-step-bnc-female-bnc-female-2-watts-attenuator-pe70a1046-p.aspx>

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.

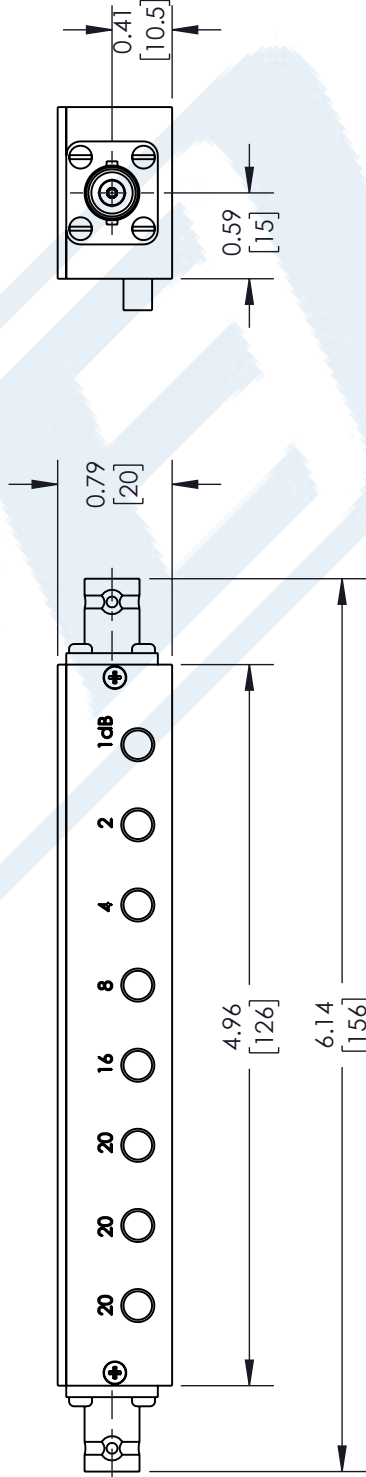
PE70A1046 CAD Drawing

0 to 91 dB Push Button Step Attenuator, 75 Ohm BNC Female To 75 Ohm BNC Female With 1 dB Step Rated To 2 Watts Up To 2.5 GHz

| REVISIONS | | | |
|-----------|-----------------|----------|----------|
| REV. | DESCRIPTION | DATE | APPROVED |
| A | INITIAL RELEASE | 12/21/22 | SPONG |



2X BNC FEMALE CONNECTOR



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.

PE 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

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

REV A

ITEM NO. PE70A1046

DRAWN BY VTHANGARAJ

CAGE CODE 53919

SIZE A

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.