



3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts

Power Dividers Technical Data Sheet

PE20DV1104

Features

- 3-Way Power Divider
- SMA Female Connectorized Design
- 6 to 18 GHz Frequency Range
- Max Power 30 Watts (CW)
- Insertion Loss < 1 dB
- Isolation > 18 dB

Applications

- Test and Measurement
- Military Communications
- Commercial Communications
- Wireless Communications
- SATCOM

Description

Pasternack carries a wide selection of power dividers to fit your needs. These components are essential in many systems, allowing the combination of multiple signals or splitting of a single signal into multiple signals with equal magnitude and phase. Pasternack's resistive and Wilkinson power dividers come with excellent performance featuring minimal loss, high isolation and low VSWR. They are available in both narrow and broad bandwidths with a variety of connector types such as 2.92mm, 2.4mm, 1.85mm BNC, N and SMA.

The PE20DV1104 is a 3-way power divider that operates from 6 to 18 GHz and can handle up to 30 Watts (CW) with 1 dB max insertion loss and 18 dB min isolation. The package interface uses SMA female connectors.

Electrical Specifications

Number of Output Ports 3

| Description | Minimum | Typical | Maximum | Units |
|--|---------|---------|---------|---------|
| Frequency Range | 6 | | 18 | GHz |
| Impedance | | 50 | | Ohms |
| Input VSWR | | 1.3:1 | 1.5:1 | |
| Output VSWR | | 1.25:1 | 1.4:1 | |
| Insertion Loss | | 0.5 | 1 | dB |
| Isolation | 18 | 22 | | dB |
| Amplitude Balance | | 0.4 | 0.6 | dB |
| Phase Balance | | 4 | 6 | Degrees |
| Nominal Power Splitting | | 4.8 | | dB |
| Input Power (CW) | | | 30 | Watts |
| Reverse Power (CW) | | | 1 | Watt |
| Input Power (Peak) 10% Duty Cycle 1us Pulse Width | | | 300 | Watts |

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts PE20DV1104](#)



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Mechanical Specifications

Size

| | |
|--------|--------------------|
| Length | 1.4 in [35.56 mm] |
| Width | 1.52 in [38.61 mm] |
| Height | 0.39 in [9.91 mm] |
| Weight | 0.11 lbs [49.9 g] |

Housing Material and Plating

Aluminum

Configuration

| | |
|-------------------|---------------|
| Package Type | Connectorized |
| Input Connector | SMA Female |
| Output Connectors | SMA Female |

Environmental Specifications

Temperature

| | |
|-----------------|-------------------|
| Operating Range | -40 to +85 deg C |
| Storage Range | -50 to +105 deg C |

Humidity

100% RH at 35°C, 95%RH at 40°C

Shock

20G for 11msec half sine wave, 3 axis both directions

Vibration

25gRMS (15 degrees 2KHz) endurance, 1 hour per axis

Altitude

30,000 ft. (Epoxy Sealed Controlled environment)

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

Plotted and Other Data

Notes:

3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts 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.

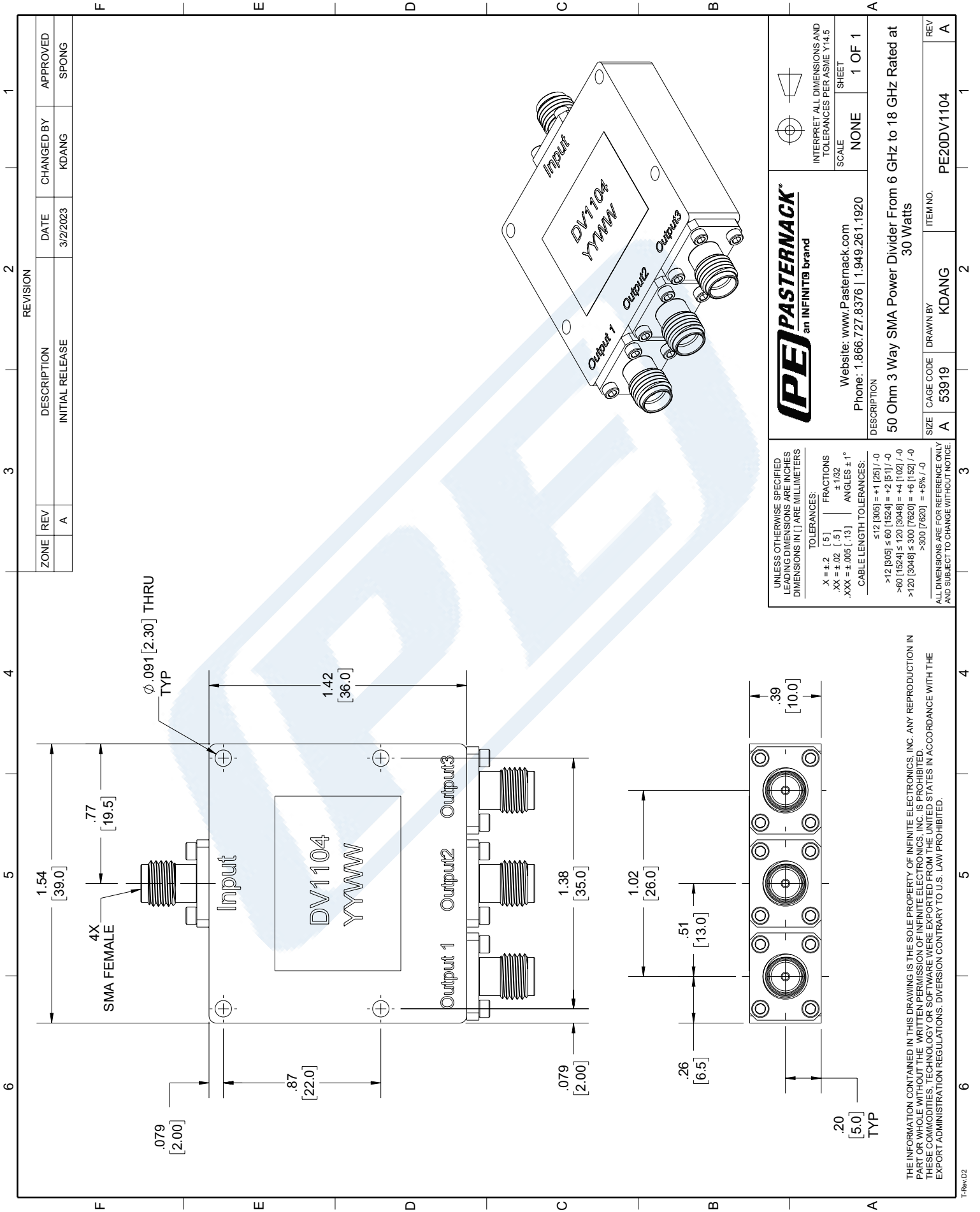
Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: [3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts PE20DV1104](#)

URL: <https://www.pasternack.com/3-way-sma-power-divider-18-ghz-pe20dv1104-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.

PE20DV1104 CAD Drawing

3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts



| ZONE | REV | DESCRIPTION | DATE | CHANGED BY | APPROVED |
|------|-----|-----------------|----------|------------|----------|
| | A | INITIAL RELEASE | 3/2/2023 | KDANG | SPONG |

PE PASTERNAK
an INFINITIB brand

Website: www.Pasternack.com
Phone: 1.866.727.8376 | 1.949.261.1920

DESCRIPTION
50 Ohm 3 Way SMA Power Divider From 6 GHz to 18 GHz Rated at 30 Watts

SCALE: NONE
SHEET: 1 OF 1

INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5

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

TOLERANCES:
X = ±.2 [5] FRACTIONS
.XX = ±.02 [.5] ±.1/32
.XXX = ±.005 [.13] ANGLES ± 1°

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

ALL DIMENSIONS ARE FOR REFERENCE ONLY AND SUBJECT TO CHANGE WITHOUT NOTICE.

| | | | |
|------|-----------|----------|------------|
| SIZE | CAGE CODE | DRAWN BY | ITEM NO. |
| A | 53919 | KDANG | PE20DV1104 |

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