

Operating Note
Agilent Technologies
11636A Power Divider



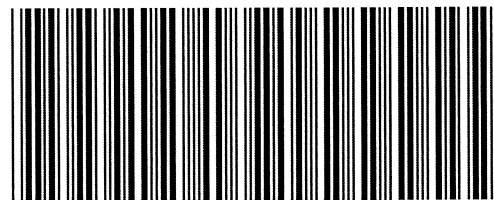
Agilent Technologies

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Hewlett-Packard to Agilent Technologies Transition

This documentation supports a product that previously shipped under the Hewlett-Packard company brand name. The brand name has now been changed to Agilent Technologies. The two products are functionally identical, only our name has changed. The document still includes references to Hewlett-Packard products, some of which have been transitioned to Agilent Technologies.

From DC to 18.0 GHz, the HP 11636A provides excellent output power symmetry between the two output ports. Low temperature and power coefficients ensure attenuation stability. Each power divider is calibrated at four frequencies, and this data is provided on a sticker that is permanently attached to the unit.

Stable interface dimensions, which ensure long life and a high repeatability of insertion loss, are provided by injection molded interface connector insulators that maintain concentricity.

Any port may be used as an input, as the HP 11636A provides a symmetrical 6 dB division. The HP 11636A can be used as a power combiner. When signals are input at two of the ports, the sum of the two appears at the third.

Specifications

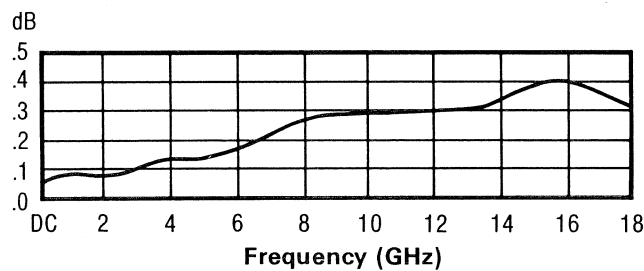
MAXIMUM INPUT POWER: 1W CW, 1 kW peak (5 msec pulse width).

FREQUENCY RANGE: DC to 18.0 GHz.

INPUT/OUTPUT SWR: DC to 10.0 GHz: 1.25
10.0 to 18.0 GHz: 1.35

TRACKING BETWEEN OUTPUT ARMS:

Frequency Range (GHz)	Tracking (dB)
DC to 4.0	0.2
4.0 to 10.0	0.4
10.0 to 18.0	0.5



Typical Tracking Between Output Arms

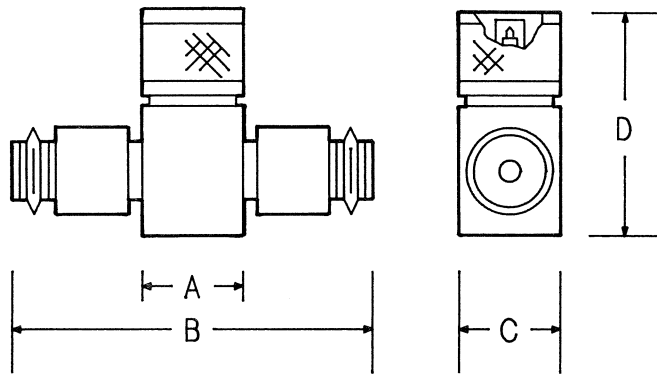
CALIBRATION DATA: Insertion loss at DC, 6.0, 12.0 and 18.0 GHz (data is supplied on a permanently attached sticker).

NUMBER OF PORTS: Three.

CONNECTORS: One Type-N male, two Type-N female.

Specifications (Cont'd)

DIMENSIONS:



NOTE:
Dimensions are given in (cm) inches and are maximum unless otherwise specified.

Dim. A	Dim. B	Dim. C	Dim. D
(1.96) .77	(4.45) 1.75	(1.75) .69	(4.17) 1.64

Supplemental Characteristics

INSERTION LOSS: (Input to One Output Port): 6 dB (−0.2 dB, +1.2 dB maximum to 10.0 GHz; +1.5 dB maximum to 18.0 GHz).

TYPICAL PHASE TRACKING: ±2° between output ports.

POWER COEFFICIENT: <0.0005 dB/dB/W

TEMPERATURE COEFFICIENT: <0.0001 dB/dB/°C

By internet, phone, or fax, get assistance with all your test and measurement needs.

Table 1-1 Contacting Agilent

Online assistance: www.agilent.com/find/assist

United States
(tel) 1 800 452 4844

Latin America
(tel) (305) 269 7500
(fax) (305) 269 7599

Canada
(tel) 1 877 894 4414
(fax) (905) 282-6495

Europe
(tel) (+31) 20 547 2323
(fax) (+31) 20 547 2390

New Zealand
(tel) 0 800 738 378
(fax) (+64) 4 495 8950

Japan
(tel) (+81) 426 56 7832
(fax) (+81) 426 56 7840

Australia
(tel) 1 800 629 485
(fax) (+61) 3 9210 5947

Asia Call Center Numbers

Country	Phone Number	Fax Number
Singapore	1-800-375-8100	(65) 836-0252
Malaysia	1-800-828-848	1-800-801664
Philippines	(632) 8426802 1-800-16510170 (PLDT Subscriber Only)	(632) 8426809 1-800-16510288 (PLDT Subscriber Only)
Thailand	(088) 226-008 (outside Bangkok) (662) 661-3999 (within Bangkok)	(66) 1-661-3714
Hong Kong	800-930-871	(852) 2506 9233
Taiwan	0800-047-866	(886) 2 25456723
People's Republic of China	800-810-0189 (preferred) 10800-650-0021	10800-650-0121
India	1-600-11-2929	000-800-650-1101