

## Receiver

**Frequency Range:** 5 Hz to 500 MHz

**Input Range:** 0 dBm @ ATT = 20 dB  
-20 dBm @ ATT = 0 dB

**IF Bandwidth:** 2 Hz, 20 Hz, 200 Hz, 2 kHz, 4 kHz

**Noise Level:** -130 dBm @ IFBW=20 Hz, ATT=0 dB,  
frequency  $\geq$  100 kHz

**Maximum Input Level:** 0 dBm

**Impedance:** 50  $\Omega$

**Crosstalk:** < -100 dB

**Dynamic Accuracy:**  $\pm 0.02$  dB,  $\pm 0.12^{\circ}$  (input level -10 to -50 dB,  
20 Hz IFBW)

**Delay Characteristics:**

**Aperture Frequency:** 0.5 to 20%

**Display Range:** 10 ps to 500 s

**Accuracy:** (Phase accuracy)/(360  $\times$  aperture)

**Size:** 425 mm W  $\times$  235 mm H  $\times$  553 mm D (16.75 in  $\times$  9.25 in  $\times$   
21.77 in)

**Weight:** 28 kg (61.6 lb)

## HP 41802A 1-M $\Omega$ Input Adapter

The HP 41802A 1 M $\Omega$  input adapter provides the capability to perform high-impedance measurement using HP network and spectrum analyzers. The frequency range of the HP 41802A input adapter is 5 Hz to 100 MHz. Passive probe is required for measurement (probing).



HP 41802A

## HP 8751A Accessories

### HP 87511A 50 $\Omega$ S-Parameter Test Set

### HP 87511B 75 $\Omega$ S-Parameter Test Set

The HP 87511A/B S-Parameter Test Sets provide the capability to measure reflection and transmission characteristics (including S-parameters) of two port devices in either direction with a single connection. The frequency range of the HP 87511A/B test sets is 100 kHz to 500 MHz. The test sets are controlled from the HP 8751A.

### HP 87511A/B Specifications

	HP 87511A	HP 87511B
<b>Impedance</b>	50 $\Omega$	75 $\Omega$
<b>Frequency range</b>	100 kHz to 500 MHz	100 kHz to 500 MHz
<b>Directivity</b>	$\geq 35$ dB from 300 kHz to 500 MHz	33 dB from 300 kHz to 500 MHz
<b>Typical tracking</b> S21, S12 S11, S22	$\pm 1$ dB, $\pm 5^{\circ}$ $\pm 1$ dB, $\pm 5^{\circ}$	$\pm 1$ dB, $\pm 5^{\circ}$ $\pm 1$ dB, $\pm 5^{\circ}$
<b>Nominal insertion loss</b> RF input to Port 1,2 RF input to R,A,B Port 1,2 to A,B	13 dB 19 dB 6 dB	19 dB 31 dB 6 dB
<b>Max operating level</b>	-20 dBm	-20 dBm
<b>Damage level</b>	-23 dBm	-23 dBm
<b>Size</b>	426 W $\times$ 90 H $\times$ 553 mm D	426 W $\times$ 90 H $\times$ 553 mm D
<b>Weight</b>	5.7 kg	5.7 kg

### HP 87512A 50 $\Omega$ Transmission/Reflection Test Kit

### HP 87512B 75 $\Omega$ Transmission/Reflection Test Kit

The HP 87512A/B transmission/reflection test kits provide the capability to measure transmission and reflection characteristics. The frequency range of the HP 87512A/B test kits is dc to 2 GHz.

### HP 87512A/B Specifications

	HP 87512A	HP 87512B
<b>Impedance</b>	50 $\Omega$	75 $\Omega$
<b>Insertion loss</b>	10 $\pm$ 1 dB typical	
<b>Equivalent directivity</b>	$>$ 40 dB typical	
<b>Equivalent source match</b>	$>$ 30 dB typical	$>$ 25 dB typical

### HP 41802A Specifications

**Frequency Range:** 5 Hz to 100 MHz

**Adaptor Gain:** 0 dB  $\pm$  0.5 dB @ 1 MHz

**Input R, C (typical):** 1 M $\Omega$ , 12 pF

**1dB Gain Compression:** 0.32 V rms (+3 dBm, 50  $\Omega$  terminated)

**Damage Level:** 2 V rms,  $\pm$  50 Vdc

**Size:** 28 mm H  $\times$  42 mm W  $\times$  100 mm D (1.1 in  $\times$  1.65 in  $\times$  3.94 in)

**Weight:** 400 g (0.88 lb)

### Other Accessories

**HP 85031B** Precision 7 mm Calibration Kit

**HP 85032B** 50  $\Omega$  Type-N Calibration Kit

**HP 85033C** Precision 3.5 mm Calibration Kit

**HP 85036B** 75  $\Omega$  Type-N Calibration Kit

**HP 11850C** 50  $\Omega$  Power Splitter

**HP 11850D** 75  $\Omega$  Power Splitter

**HP 11853A** 50  $\Omega$  Type-N Accessory Kit

**HP 11854A** 50  $\Omega$  BNC Accessory Kit

**HP 11855A** 75  $\Omega$  Type-N Accessory Kit

**HP 11856A** 75  $\Omega$  BNC Accessory Kit

### Key Literature

HP 8751A Network Analyzer Data Sheet, p/n 5952-2370.

### Ordering Information

	Price
<b>HP 8751A</b> Network Analyzer	\$24,450
<b>Opt 001</b> High-Stability Frequency Reference	+ \$865
<b>Opt 002</b> HP Instrument BASIC and 1 MB RAM	+ \$1,020
<b>Opt 907</b> Front Handle Kit	+ \$77
<b>Opt 908</b> Rack Mount Kit	+ \$41
<b>Opt 909</b> Rack Flange and Handle Kit	+ \$107
<b>Opt 910</b> Extra Operating Manual	+ \$163
<b>Opt 915</b> Add Service Manual	+ \$143
<b>Opt W30</b> Extended Repair Service (see page 663)	+ \$425
<b>HP 87511A</b> 50 $\Omega$ S-Parameter Test Set	\$5,610
<b>Opt 001</b> N-Type Port	\$0
<b>HP 87511B</b> 75 $\Omega$ S-Parameter Test Set	\$5,710
<b>Options (common for the HP 87511A/B)</b>	
<b>Opt 907</b> Front Handle Kit	+ \$51
<b>Opt 908</b> Rack Mount Kit	+ \$32
<b>Opt 909</b> Rack Flange and Handle Kit	+ \$74
<b>Opt 910</b> Extra Operating Manual	+ \$51
<b>HP 87512A</b> 50 $\Omega$ Transmission/Reflection Test Kit	\$3,060
<b>HP 87512B</b> 75 $\Omega$ Transmission/Reflection Test Kit	\$3,265
<b>HP 41802A</b> 1 M $\Omega$ Input Adapter	\$920
<b>HP 41800A</b> Active Probe	\$1,955