Make ideas real



R&S®ZNL VECTOR NETWORK ANALYZER

The 3-in-1 allrounder



Three instruments in one

Measuring equipment for RF applications must fulfill high quality standards. Instruments should be easy to use and offer high versatility. Fast measurements and reliable performance are crucial.

The R&S®ZNL from Rohde & Schwarz exceeds these expectations and offers even more: vector network analysis, spectrum analysis and power meter measurements are combined into a single compact instrument, making the R&S®ZNL a universal allrounder.

The perfect choice for

General RF lab	Low-cost volume
measurements	manufacturing
Education and training	Service and maintenance

Key specifications	
Frequency range	5 kHz to 3/4.5/6/14/20 GHz
Number of ports	2
Dynamic range	\leq 6 GHz model 130 dB (typ.)
	> 6 GHz model 120 dB (typ.)
Output power	up to +3 dBm
IF bandwidths	1 Hz to 500 kHz
Measurement speed	4.6 µs per point (bandwidth: 500 kHz)

Your benefit	Features
Three instruments in one	 ► Full two-port VNA ► True spectrum analyzer (hardware option) ► Use of power sensors (option), turning it into a power meter
Fully portable	 Very light (6 kg to 7.3 kg) and compact (footprint: 408 mm × 235 mm) Top handle for easy carrying Battery pack for use on the go
Clearly structured user interface with multitouch	 ▶ Wide capacitive touchscreen for convenient configuration with multitouch gesturing ▶ Undo/redo softkeys ▶ Fully integrated context-sensitive help menu for user-friendly operation



More than 3-in-1



- ► Full two-port VNA
 - Supports power sweep
 - Extended power range (R&S®ZNL-B22)
 - Receiver step attenuator (-B31/-B32 option)
- ► Time domain analysis (-K2 option)
- ► Distance-to-fault measurements (-K3 option)



- ► Spectrum analysis up to 26.5 GHz (-B1 option)
 - Power and emission measurements
 - 2D and 3D spectrogram
- ► Analog demod. (AM/FM/PM) (R&S®FPL1-K7)
- ► Independent CW source (-K14 option)
- Noise figure measurement (R&S®FPL1-K30)
- ► YIG preselector bypass (R&S®FPL1-B11)
- ► 40 MHz analysis bandwidth (R&S®FPL1-B40)



- Power meter
 - Supports 4 power sensors simultaneously
 - Highly accurate

Hall

Hot-swappable batteries allow the R&S°ZNL to be used outside the lab.

A padded soft carrying bag for safe transportation of the R&S°ZNL.

Portable for use on the go



Increase efficiency with calibration units



R&S®ZN-ZExxx economical automatic calibration unit.

Vector network analyzer, 5 kHz to 3 GHz R&S®ZNL3 Vector network analyzer, 5 kHz to 4.5 GHz R&S®ZNL4 Vector network analyzer, 5 kHz to 6 GHz R&S®ZNL6 R&S®ZNL14 Vector network analyzer, 5 kHz to 14 GHz Vector network analyzer, 5 kHz to 20 GHz R&S®ZNL20 Time domain analysis R&S®ZNL-K2 Distance-to-fault measurements R&S®ZNL-K3 Spectrum analysis R&S®ZNLx-B1 R&S®FPL1-K9 Power sensor measurements

Item

Feature highlights

Ordering information

Description

- ► Two-port vector network analyzer for bidirectional measurements
- ► Three instruments in one: vector network analyzer, spectrum analyzer and power meter
- ► Wide dynamic range of up to 130 dB (typ.)
- ► Output power: from -40 dBm to +3 dBm (typ.)
- ► Fast measurements, e.g. 16.7 ms at 100 kHz IFBW (401 points, 200 MHz span, two-port calibration)
- ► Compact and light (6 kg to 7.3 kg)
- ► Optional battery pack



Rohde & Schwarz customer support (www.rohde-schwarz.com/support) Rohde & Schwarz training (www.training.rohde-schwarz.com)