RigExpert Antenna Analyzers





0.1 ... 600 MHz

0.1 ... 1000 MHz

RigExpert AA-600 and AA-1000 are powerful antenna analyzers designed for testing, checking, tuning or repairing antennas and antenna feedlines.

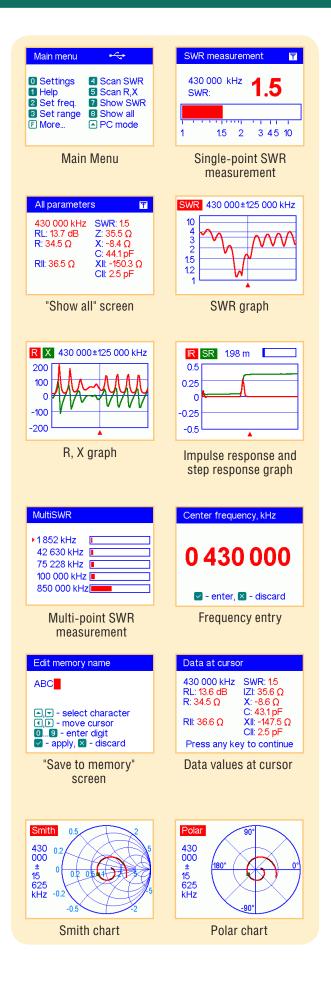
Mainly, these are SWR (Standing Wave Ratio) and impedance measurement instruments (vector impedance analyzers).

Easy-to use measurement modes, as well as additional features such as connection to a personal computer make RigExpert AA-600 and AA-1000 attractive for professionals and hobbvists.

Both AA-600 and AA-1000 are available in non-US version (with ability to display Smith chart) and US version (displaying a polar chart instead).

The following tasks are easily accomplished by using these analyzers:

- Rapid check-out of an antenna
- Tuning an antenna to resonance
- Antenna SWR and impedance measurement and comparison before and after specific event (rain, hurricane, etc.)
- Making coaxial lines or measuring their parameters
- Cable testing and fault location
- Measuring capacitance or inductance of reactive loads



Specifications

Frequency range: 0.1 to 600 MHz — AA-600

0.1 to 1000 MHz — AA-1000

Frequency entry: 1 kHz resolution

Measurement for 25, 50, 75 and 100-0hm systems **SWR measurement range:** 1 to 100 in numerical mode,

1 to 10 in graph mode

SWR display: numerical or easily-readable bar

R and X range: 0...10000, -10000...10000 in numerical mode,

0...1000, -1000...1000 in graph mode

Display modes:

- SWR at single or multiple frequencies
- SWR, return loss, R, X, Z, L, C at single frequency
- SWR graph, 80 points
- R, X graph, 80 points
- Smith (or polar) chart, 80 points
- TDR (Time Domain Reflectometer) graph

Optional open-short-load calibration in SWR, R,X or Smith/polar chart graph modes

RF output:

- Connector type: N
- Output signal shape: rectangular, 0.1 to 200 MHz. For higher frequencies, harmonics of the main signal are used.
- Output power: -10 dBm (at 50 Ohm load)

Power:

- Three 1.5 V, alcaline batteries, type AA
- Three 1.2 V, 1800...3000 mAh, Ni-MH batteries, type AA
- Max. 3 hours of continuous measurement, max. 2 days in stand-by mode when fully charged batteries are used
- When the analyzer is connected to a PC or a DC adapter with USB socket, it takes power from these sources

Interface:

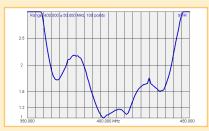
- 320x240 color TFT display
- 6x3 keys on the water-proof keypad
- Multilingual menus and help screens
- USB connection to a personal computer

Dimensions: 23x10x5.5 cm (9x4x2")

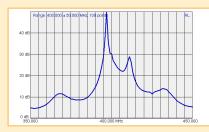
Operating temperature: 0...40 °C (32...104 °F)

Weight: 650g (23 Oz)

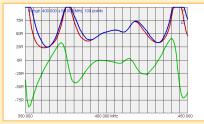
AntScope software capabilities



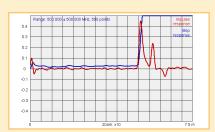
SWR graph



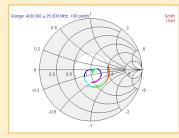
Return loss graph



R,X,Z graph, series model



Impulse response and step response graph



Smith chart