

# 2712 Spectrum Analyzer

### BENEFITS

High confidence in frequency measurements

Easily see weak signals

Short waiting time before making measurments

High portability

Measurement convenience with full marker/delta marker capability

See modulation-related phenomena and low level beats

### **FEATURES**

9 kHz to 1800 MHz frequency range 5×10<sup>-7</sup> frequency accuracy

1 Hz frequency resolution at wide span/div using internal frequency counter

Up to -127 dBm sensitivity, or -139 dBm sensitivity using built-in preamp

10 Kb (22 lb.) weight, compact size

Fast warmup, high stability

Full display area usable with 80 dB display dynamic range

Four-trace digital storage plus true analog display

Direct-reading 50 ohm and 75 ohm operation modes

Signal identification with aural and optional video demod

### TYPICAL APPLICATIONS

- Cable Television
- VTR/VCR Maintenance
- Television and Audio Broadcasting
- Broadband Local Area Networks
- Education

### 2712 SPECTRUM ANALYZER

The Tektronix 2712 Spectrum Analyzer provides an unprecedented range of features at an extremely affordable price. You get excellent RF performance, a built-in frequency counter, full programmability, digital and true analog displays, high portability, enough non-volatile memory for 108 saved displays, and much more. The capability to choose between digital and true analog displays lets you examine signals for characteristics that might not show on digital-only displays.

A 300 Hz resolution bandwidth (RBW) filter with a shape factor ≤7:1 means you'll see many close-in sidebands and spurious or unexpected signals you might otherwise miss. At the other end of the spectrum, the 5 MHz RBW filter is useful for demodulating wideband signals such as actively-modulated video carriers.

Bandwidth, Carrier-to-Noise, Noise Power, Signal Search, and FM Deviation modes provide additional measurement power and convenience. The Occupied Bandwidth Mode is settable from 1 to 99%.

Sweep speeds as fast as 1 sec/div, TV Line and TV Field triggering, an internal audio amplifier and AM/FM detector, and the optional Video Monitor Mode all make video communications measurements easier.

Its straightforward human interface, with conveniently-grouped, dedicated front-panel keys and simple, menu-driven functions make the 2712 easy to learn and use. You can set frequency, span, and reference level directly from the front panel. A real-time clock provides an on-screen date and time display, plus date/time stamp capability for waveform printouts.

Frequency-corrected tuning and phaselock stabilization enhance the ability to resolve close-in signals and reliably demodulate narrowband signals. The built-in signal counter, with 0.5 ppm ±10 Hz accuracy, offers added power for rapidly identifying signals. Sensitivity up to -127 dBm (-80 dBmV) at 300 Hz RBW lets you see weak signals. The built-in preamp can improve sensitivity another 12 dB, up to -139 dBm (-92 dBmV). 80 dB on-screen dynamic range ensures visibility of weak signals in the presence of strong ones.

The 2712's 124 kBytes of nonvoltile memory lets you store up to 108 displays, plus 36 front panel setups, large user-defined key programs, and antenna factor tables.

### Tracking Generator — Option 04

The optional internal tracking generator lets you make high dynamic range swept measurements up to 1.8 GHz. Characterize filters, check duplexers or cables, make frequency response and SWR measurements, and much more, with at least 100 dB measurement dynamic range.

## Quasi-Peak/EMC Filter — Option 12

To help simplify your EMC measurements, the 2712 offers an optional quasi-peak detector, EMI resolution bandwidth filters, antennas, and fully-corrected E-field intensity measurements to assist in pre-qualification and troubleshooting.

### ORDERING INFORMATION

2712 Spectrum Analyzer

Includes: Power cord (U.S. 115 V/60 Hz), operator's manual, front cover, 75/50  $\Omega$  min-loss pad, and N-to-BNC adapter.

#### **OPTIONS**

**Option 04** (cannot combine with Opt. 12 or Opt. 14) — Adds: Internal tracking generator, 100 kHz-1800 MHz, 0 dBm to -48 dBm in 0.1 dB steps.

Option 07 — Adds: 2704 Inverter and 2705 Battery Pack.

Includes: power cord (U.S. 115 V/60 Hz), operator's manual, mounting plate.

**Option 08** — Replace GPIB with RS-232-C interface.

Option 10 - Video monitor mode.

Option 12 (cannot combine with Opt. 04 or Opt. 14) — Adds: Quasi-peak Detector (built-in).

Includes: 200 Hz, 9 kHz, and 120 kHz EMC filters; 1 kHz and 1 MHz RBW filters (NOTE: 200 Hz EMC filter replaces standard 300 Hz RBW filter).

Option 14 (cannot combine with Opt. 04 or Opt. 12) — Adds: 1 kHz, 10 kHz, 100 kHz, and 1 MHz RBW filters.

Option 15 — Tek 1405 TV Sideband Adapter interface.

**Option 20** — EMC antenna set plus tripod and coax suitable for tests to 1 GHz (contact Tek Sales Engineer for more information).

Option 30 — Rackmount for 19-inch rack width, 5-inch height.

Option 33 — Travel Line Package.

Includes: Accessory pouch, carrying strap, vinyl rain cover.

**Option 34** — Portable-to-Rackmount Adapter for 19-inch rack width, 7-inch height.

### **OPTIONAL ACCESSORIES**

Service Manual — Order 070-8130-00.

**Tekmate Mounting Hardware** — Order 016-1109-00.

Front Panel Cover — Order 200-2520-00.

Accessory Pouch — Mounts on top. Order 016-0677-02.

**Viewing Hoods** — (Collapsible) Order 016-0592-00; (Binocular) Order 016-0566-00; (Polarized) Order 016-0180-00.

Carrying Strap - Order 346-0199-00.

Shipping Case — Order 016-0792-02.

Smoke Gray CRT Filter — Order 337-2775-02.

### INTERNATIONAL POWER PLUG OPTIONS

Opt. A1 - A5 - Available.

### WARRANTY-PLUS SERVICE PLANS

Opt. M1 — Available.

Opt. M2 - Available.

Opt. M3 — Available.

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