

Version  
03.01  
May  
2010

## R&S® ES-SCAN EMI Software

### User-friendly software for EMI measurements

- ◆ Menu-controlled configuration of test receiver/analyzer and storage of settings on controller, including limit lines and transducer factors
- ◆ Reliable acquisition, evaluation, and documentation of measurement data
- ◆ Graphical display of sweep and scan data with automatic data reduction
- ◆ Marker function, including "Marker to Peak" and "Tune Receiver to Marker Frequency"
- ◆ Automatic peak search with selectable acceptance limit and selectable subranges
- ◆ Editable frequency list for automatic or semi-automatic final measurements
- ◆ "Fine Tuning" function for fast detection of local maxima
- ◆ Flexible configuration of report generation for different report layouts
- ◆ For use with the R&S®ESCI, R&S®ESPI and R&S®ESL EMI test receivers, the R&S®FSP and R&S®FSL spectrum analyzers, and the R&S®FSV signal and spectrum analyzer (in FSP compatibility mode)



**ROHDE & SCHWARZ**

## At a glance

R&S®ES-SCAN is a cost-efficient and user-friendly 32-bit Windows software application that has been specially designed for diagnostic EMI measurements in development. The main requirements of EMI measurements in accordance with commercial standards have been combined in an easy-to-use application: measurement settings and storage, scan and sweep data acquisition and display with automatic data reduction, peak search with acceptance limit and selection of subranges, final measurement with worst-case selection, report generation, and measurement data storage.

R&S®ES-SCAN offers all the advantages of a state-of-the-art software tool, including operation via keyboard and mouse, table editor, configurable report generation, and printout of reports

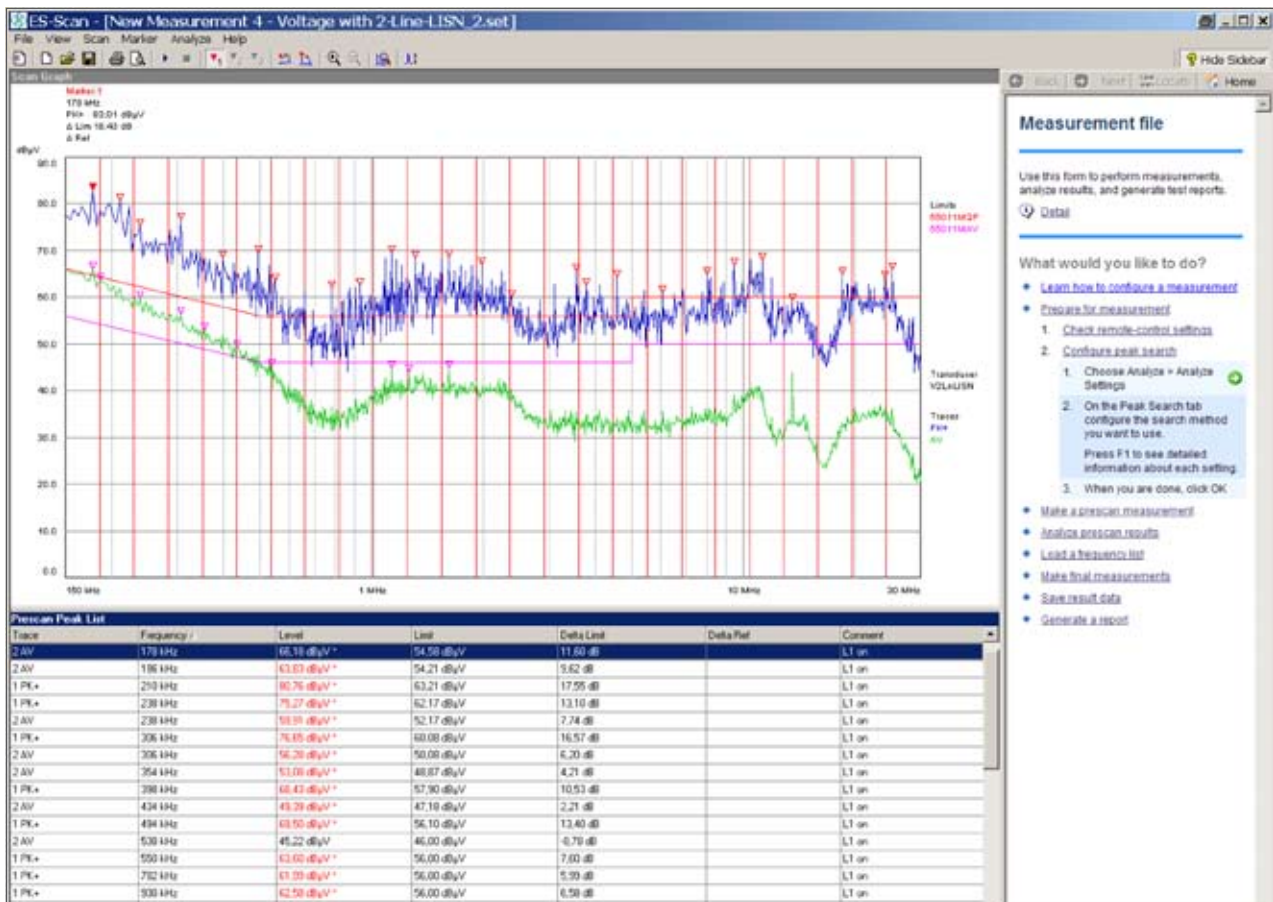
on any Windows printer. An assistant ("Help Side Bar") supports the user of the R&S®ES-SCAN EMI software at any stage of operation. Online help texts explain all software functions; an operating manual is therefore not required.

## Measurement settings

- ◆ Definition of any number of limit lines that will be stored on the controller
- ◆ Library of standard limit lines for commercial standards included
- ◆ Definition of any number of receiver settings that will be stored on the controller
- ◆ Definition and storage of a peak list for final measurements
- ◆ Loading of the new settings into the measuring receiver or analyzer

## Scan mode and data acquisition

- ◆ Start, pause, and stop of the frequency scan by the controller
- ◆ "Marker to Peak" and "Tune Receiver to Marker Frequency" functions available for paused and completed frequency scan (also in sweep mode)
- ◆ Continuation of a paused frequency scan with "Continue from Frequency" or "Continue from Pause"
- ◆ Zoom function after completion of frequency scan: zooming of the frequency axis for the detailed representation of a frequency subrange, centered to the marker position (also in sweep mode)



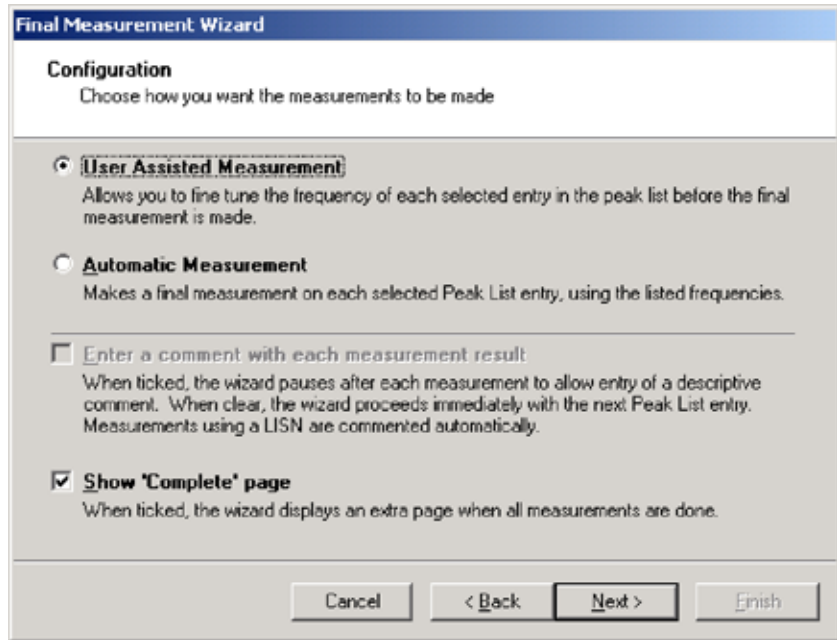
Prescan measurement (Pk and Avg) with determination of local maxima (here 25 subranges) for subsequent final measurement (QP and Avg).

## Peak search function

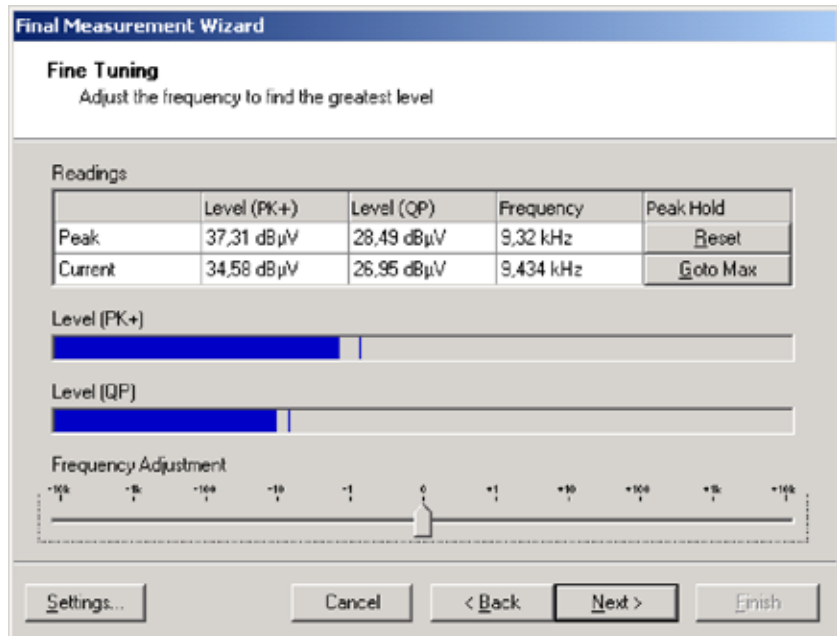
- ◆ Automatic peak search with selectable acceptance limit and selectable number of frequency subranges or peak values
- ◆ Modification of peak list using "Add to Peak List" and "Delete from Peak List" functions
- ◆ Marking of peak list values in scan graphics and simultaneous display in tabular form

## Final Measurement Wizard

- ◆ The user can choose between two modes:
  - Fully automatic measurement: processing of peak list and automatic level measurement at every frequency by means of the detectors defined in the measurement setup
  - Semi-automatic measurement (user-assisted): like automatic measurement, but with "Fine Tuning" function activated for every peak list frequency in order to find local maxima
- ◆ "Fine Tuning" function: level display on screen with current and maximum level value, continuous update during receiver fine tuning by the user, and, if required, setting of DUT position
- ◆ Transfer of measurement results to peak list by mouse click and display on screen
- ◆ Storage of all measurement results on controller



*Selection between fully automatic and semi-automatic measurement mode in the "Final Measurement Wizard".*



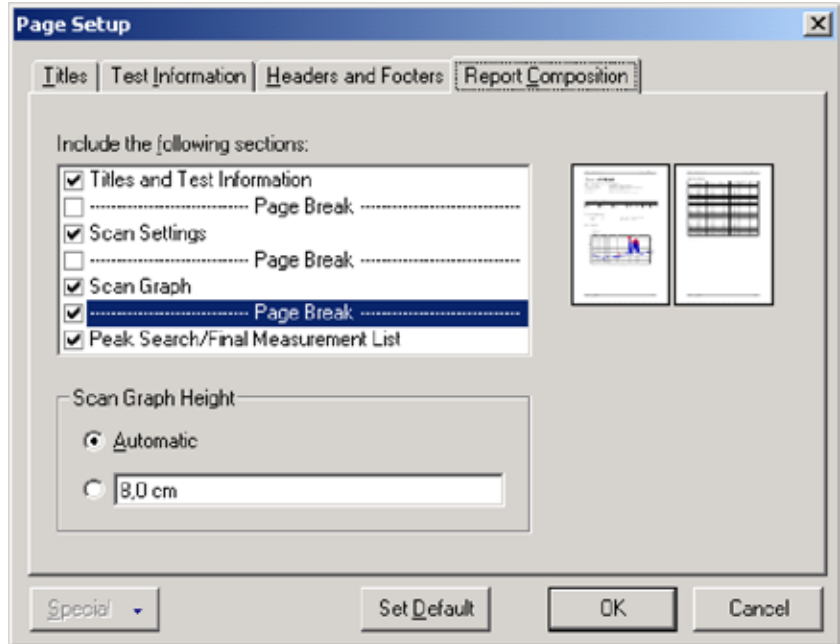
*"Fine Tuning" function with additional "Maximum Hold" display.*

## Report

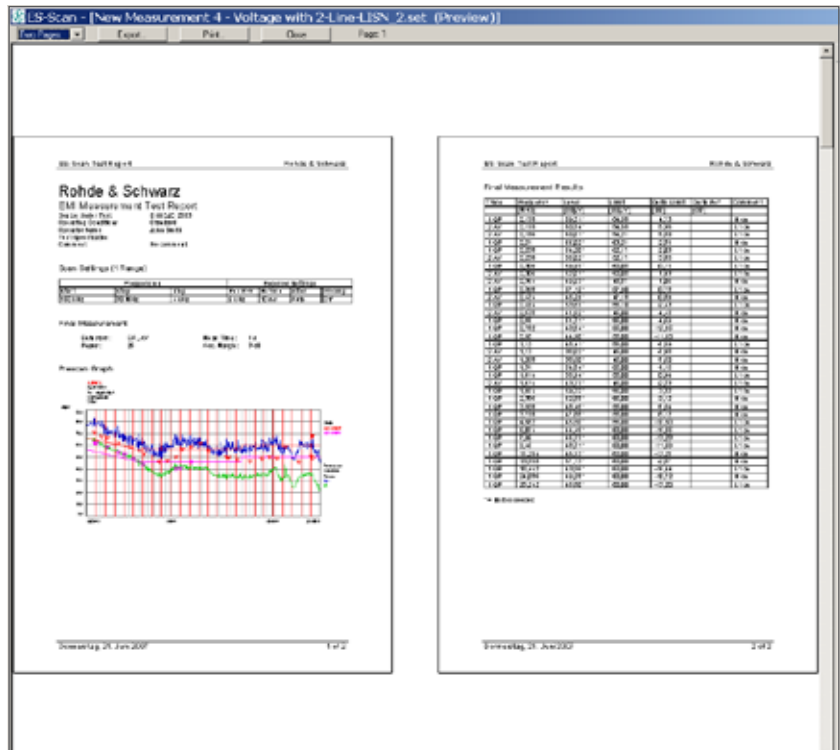
- ◆ Flexible report editor for different report layouts
- ◆ Report preview on screen
- ◆ Printout on a Windows-compatible printer

## System requirements

- ◆ Windows 7, Vista or XP SP2 operating system (32-bit versions only)
- ◆ Administrator rights (for installation)
- ◆ PC with Pentium processor (at least 600 MHz)
- ◆ 512 Mbyte RAM
- ◆ 30 Mbyte of available hard disk space
- ◆ Minimum screen resolution 640 × 480 pixels, 256 colors
- ◆ Remote control via GPIB (IEC/IEEE bus): GPIB interface card (NI-488.2) from National Instruments; R&S®ESL/R&S®FSL additionally require the R&S®FSL-B10 option (1300.6208.02)
- ◆ Remote control via LAN (Ethernet): R&S®ESPI/R&S®ESCI/R&S®FSP require R&S®FSP-B16 option (1129.8042.03)
- ◆ USB interface for hardlock copy protection (USB 1.1 or USB 2.0)



Definition of report layout.



Preview function for test reports.

## Ordering information

Designation	Type	Order No.
EMI Software (with hardlock copy protection)	R&S®ES-SCAN	1308.9270.02



More information at  
[www.rohde-schwarz.com](http://www.rohde-schwarz.com)  
(search term: ES-SCAN)



[www.rohde-schwarz.com](http://www.rohde-schwarz.com)

Europe: +49 89 4129 13774, [customersupport@rohde-schwarz.com](mailto:customersupport@rohde-schwarz.com)  
Americas: +1-888-837-8772, [customer.support@rsa.rohde-schwarz.com](mailto:customer.support@rsa.rohde-schwarz.com)  
Asia: +65 65 130 488, [customersupport.asia@rohde-schwarz.com](mailto:customersupport.asia@rohde-schwarz.com)