

SOUND POWER PLUS

The Sound Power Plus Release Notes explain system requirements, installation guidelines, features, compatibility with beta versions, and known issues that could affect performance.

National Instruments Sound Power Plus automates the acquisition and analysis of computer and business equipment noise emission measurement data. With Sound Power Plus, you can acquire data from multiple sources simultaneously using as many as five National Instruments Dynamic Signal Analysis (DSA) devices, dramatically increasing the speed and efficiency of your application.

For more information on using Sound Power Plus, refer to the following documents:

- *Sound Power Plus Operator Manual*
- *Sound Power Plus Help*

To display the Help, select **Help»Show Help**.

System Requirements

Your system must meet the following requirements to run Sound Power Plus:

- 133 MHz Pentium or higher microprocessor
- Microsoft Windows 2000/NT/Me/9x
- 64 MB RAM
- 50 MB available hard drive space
- National Instruments NI 4551 or NI 4552 DSA device
- LabVIEW 6.0 or later
- National Instruments Real-Time Octave Analysis Software, version 1.2 or later
- NI-DAQ 6.9.1 or later

- A National Instruments GPIB device, if you plan to use a GPIB-based multiplexer
- Microsoft Excel 97 or 2000 (required to export data, import microphone sensitivity and frequency response data, and execute source code)

If you have purchased the Sound Power Plus Developer Software package, you must have the following software components to take advantage of the editable source code feature:

- LabVIEW Full Development System for Windows or LabVIEW Professional Development System for Windows
- National Instruments LabVIEW Sound and Vibration Toolset for Windows, version 1.0 or later

Refer to Chapter 1, *Introduction to the Sound Power Plus*, of the *Sound Power Plus Operator Manual* for more information on the minimum system requirements required to run Sound Power Plus.

Installation

You must uninstall any beta versions of Sound Power Plus and close any open applications on your computer before you install this software.



Note If you are using Windows 2000 or Windows NT, you must log in to Windows as an administrator or as a user with administrator privileges before installing the software.

To begin the installation process, insert the Sound Power Plus installation CD into the CD-ROM drive. If the startup screen does not appear, use Windows Explorer to run `SETUP.EXE` from the `\Setup` folder on the installation CD.

Sound Power Plus Features

Sound Power Plus includes the following features:

- Support for any combination of NI 4551 and NI 4552 DSA devices totalling five, which dramatically increases the speed and efficiency of your application by allowing you to acquire data from multiple sources simultaneously
- Support for parallel 1/3-octave measurement and parallel 800-line FFT measurement, which reduce the total measurement time by measuring several microphones simultaneously
- Prominent tone analysis for testing multiple tones in a single critical band, according to ISO 7779

- Plug-in driver architecture for multiplexer drivers, which allows you to add your own multiplexer drivers to the system without changing any source code. Refer to Appendix C, *Supported Drivers*, in the *Sound Power Plus Operator Manual* for more information.
- A new Export to File feature that allows you to export some or all of your test data to a text file or a Microsoft Excel workbook file
- A new source measurement procedure for exporting measured intermediate data to a Microsoft Excel workbook file
- Support for configuring cylindrical surfaces
- Display measured Leq octave spectrums in the Real-Time Analyzer

Compatibility with Earlier Versions

Sound Power Plus can read your existing Sound Power System data and configuration files. To perform parallel measurements using Sound Power System files, you must reconfigure sound power position, sound pressure position, and FFT measurements.

Known Issues

Workbook files written to or read from Microsoft Excel 2002, which is included with Microsoft Office XP, do not function properly in Sound Power Plus.