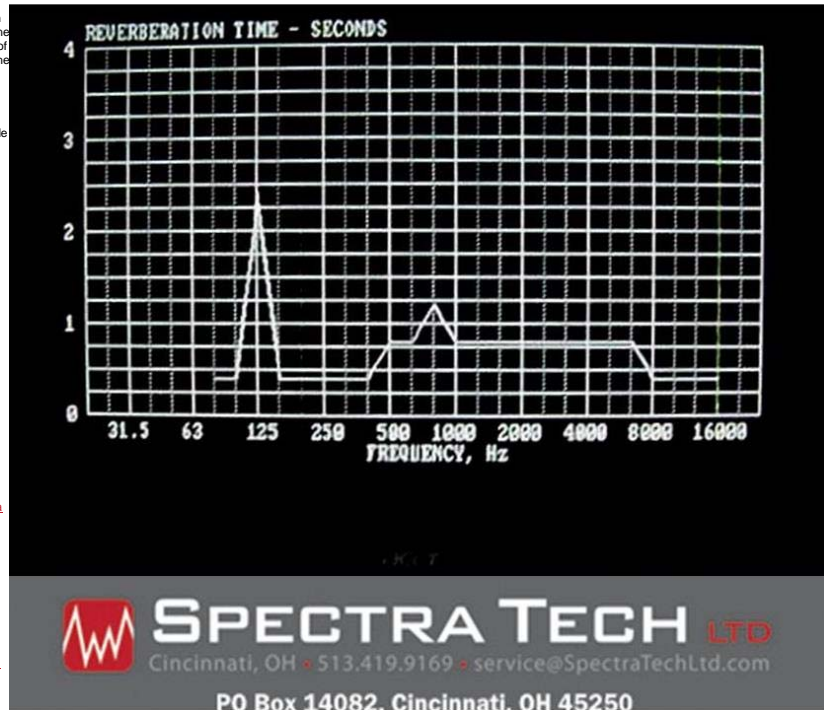


REVERBERATION TIME (RT60) TESTING PER ASTM E2235 - STANDARD TEST METHOD FOR DETERMINATION OF DECAY RATES AND ISO 3382 ACOUSTICS - MEASUREMENT OF THE REVERBERATION TIME OF ROOMS WITH REFERENCE TO OTHER ACOUSTICAL PARAMETERS

Spectra Tech employs sophisticated equipment and software to measure and document the Room Reverberation Time (RT60), considered to be a universal descriptor of sound intensity. We can also provide assistance in designing solutions to reduce excessive reverberation times.

- The RT60 reverberation test measures the time required for a sound to decrease in intensity from its original maximum level by 60 decibels. The test is normally utilizes a wide spectrum impulse (e.g., gunshot, balloon pop, etc.) or a broad spectrum amplified noise signal that is abruptly turned off, to create the test signal. Our computer-based logging system records the decay in sound level in each of the 1/3 octave bands simultaneously, and assigns a preliminary value to the slope of each frequency plot. we are able to fine-tune the results and adjust the final slope of each frequency line, and determine the RT60 value for each 1/3 octave frequency band.
- Plot / Print Test Results: We can provide documentation of test results by plotting / printing the test values on paper, and / or provide the results in PDF format.

## Onsite testing services by Spectra Tech Ltd Plot of Reverberation Time (RT60) Test



### LINKS TO RELATED REFERENCE INFORMATION

- [Optimum RT60, Reverberation Time, Various Room Types, Spectra Tech Ltd, Consultant](#)
- [Optimum RT60, Reverberation Time, Graphs, 500 Hz, Various Facilities, Spectra Tech Ltd, Consultant](#)
- [Recommended RT60, Reverberation Times, Educational Facilities, Spectra Tech Ltd, Consultant](#)
- [Prediction, Reverberation Time, RT60, Rectangular, Room, Non-Uniformly Distributed Sound Absorption, R. Neubauer, Consulting Bureau, IngoIsstadt, Germany, and B. Kostek, Sound & Vision Engineering Department, Faculty of Electronics, Telecommunications and Informatics, Technical University of Gdansk, PL - 33 pages \(describes the method currently used by Spectra Tech to optimize room acoustics - the "New Fitzroy" formula - and compares it to the Sabine, Norris Eyring, Millington-Sette, Tohyama and Suzuki, Arau, Nilsson, Annex D of the European Standard prEN 12354-6 \[10\], Kuttruff, and original Fitzroy formulae\), Spectra Tech Ltd, Consultant](#)
- [Potential, effect of reverberation on speech intelligibility, Spectra Tech Ltd, Consultant](#)
- [RT60, Reverberation, Room, Acoustics, Optimization Program, User Guide V10.3, how our program works, Spectra Tech Ltd, Consultant](#)
- [Armstrong - Room Acoustics / Reverberation Simulator \(link at Armstrong World Industries website\)](#)

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