

## **Acoustics of Small Rooms**

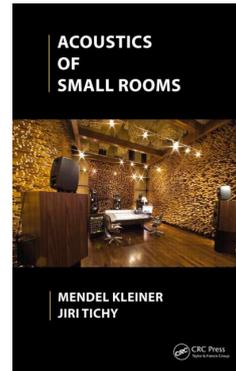
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2014 by CRC Press

491 Pages - 274 B/W Illustrations

ISBN 9780415779302

<https://www.crcpress.com/Acoustics-of-Small-Rooms/Kleiner-Tichy/9780415779302>



Two music enthusiasts, who have been teaching and investigating acoustics for several decades, have authored this book called “Acoustics of Small Rooms”. The fascinating world of sound reproduction in domestic environments is present all the time in the text. All issues are presented in a way that the application in mind is sound reproduction. This is not a shortcoming, but it means that regardless of the name of the book, it does not cover open plan offices, classrooms, kinder gardens, small workspaces, etc. Hopefully, the second edition of the book will cover also these issues. In addition, the book is more on room acoustics theory, not much practical examples are given for design of small rooms.

All in all, I really enjoyed reading this book. The approach is quite mathematical, meaning that there are lots of equations, which might be quite heavy to digest, especially in the beginning. However, the very illustrative figures help a lot and I think that the illustrations are the best part of the book. They help a lot to understand acoustical concepts and they nicely support the text and mathematics. I think the figures reflect nicely the long teaching experience of the authors.

First five chapters of the book review the basics of acoustics, starting from the wave equation and ending to discuss sound fields in enclosures, including many fundamental issues such as absorption, diffusion, diffraction, etc. Then, interestingly the book jumps to psychoacoustics and in particular to the world of spatial hearing. The main emphasis is put to spatial hearing, possibly because of the personal interest of the authors. The rest of the book is dedicated to sound reproduction in small rooms and the optimization of low frequency sound fields. Studio control rooms are covered as well as small rooms for music practice. Finally, the book ends with chapters on modeling and measurements of room acoustics, including interesting information on scale models.

This book is definitely a great textbook for engineering students who are in particular interested in music and sound reproduction in small rooms. I could easily imagine a course around this book. Obviously, such a course has been the source material for the book. Moreover, it is a great reference for all researchers in the field. I recommend that all acoustics labs around Europe should have this book available in their libraries for faculty and students.

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