associations, mentoring, networking, and more. Issues relating to women in statistics are interspersed throughout.

Although some international perspective is provided, such as in Tomi Mori and Rongwei Fu's "Competencies Needed for Statistics Leadership from an International Perspective," international readers might like to know that the authors are all based in the U.S. and Canada. This could make it particularly useful as a sort of cultural orientation to immigrant statisticians and temporary visitors.

Overall, the book is easy reading. The chapters can be read independently, in whatever order suits you. Unlike some books on leadership and women in the workplace available in the popular press, the tone is thoughtful, introspective, and encouraging. That most all of the authors share personal stories makes it more engaging and relatable. Anyone with interest in advancing their statistical career and increasing the impact of their work would be well served by reading this book. It would also be a great addition to departmental and professional libraries and useful as a supplement to professional development courses.

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Learning Base R. Lawrence M. Leemis. 2015, x + 263 pp., $29.99 (P), ISBN: 978-0-9829174-8-0.

A common problem encountered in learning, or teaching, R programming is where to begin. *Learning Base R* by Lawrence Leemis provides a nice road map by introducing the R programming language to those without prior programming experience. Starting by simply using R as a calculator, *Learning Base R* provides an accessible introduction that empowers students and practitioners with the skills necessary to begin analyzing data and programming. Overall, the focus is on basic coding for a high-level computing language such as R. The style and level make this an excellent self-study or supplementary book for graduate students or advanced undergraduates in any discipline.

Structurally, the book contains 28 short chapters usually focused on a single topic written in a tutorial style where the reader is suggested to try (and modify) the code while going through the text. Further, code is readily available on the author's website. By design, chapters should take about 15 min to complete though the more advanced topics will take longer (especially for novices). Each chapter concludes with some well-written straightforward exercises. The book also contains what seems to be a useful and complete index.

After "Introducing R," Chapters 2–6 cover the basic ideas of "R as a Calculator," "Simple Objects," "Vectors," "Matrices," and "Arrays," respectively. Chapter 7 considers a subset of useful "Built-In Functions" focusing on syntax and arguments while Chapter 8 provides some simple examples of "User-Written Functions." Chapter 9 considers "Utilities" including managing the workspace and getting help. A minor complaint is that there is very little content related to Internet-based help.

The next three chapters consider other types of elements that can be stored in R, specifically a brief bit on "Complex Numbers" followed by more thorough treatment of "Character Strings" and "Logical Elements." Chapters 13 and 14 introduce comparing elements in "Relational Operators" and coercing elements to a particular type in "Coercion." Advanced data structures of "Lists" and "Data Frames" are introduced in the following two chapters. Chapter 17 provides a brief survey of R's "Built-In Datasets" and Chapter 18 provides an all too short overview of "Input/Output" for R. In general, Chapters 1–18 can be covered in approximately 15 min. Further, the chapters tend to stand alone and can be sequenced in any reasonable order so there is little need to quibble with the order of the text.

The remaining chapters consider more advanced topics that are often covered in a first course in statistical computing. Chapter 19 introduces functions that perform "Probability" calculations (i.e., `dnorm()`, `pnorm()`, `qnorm()`, and `rnorm()`). There is also a brief discussion on random sampling. Chapters 20 and 21 provide a nice introduction to "High-Level Graphics" and "Custom Graphics" available in R's base package. It should be noted there is no coverage of popular graphing packages such as `ggplot2` and `rgl`. The next three chapters introduce programming in R with "Conditional Execution," "Iteration," and "Recursion." The examples and exercises in these would be very useful to novice programmer. .

The "Simulation" topics of random number generation, generating Bernoulli trials, and Monte Carlo simulation are contained in the next chapter. Chapter 26 considers "Statistics" including some straightforward illustrations of calculating confidence intervals, goodness-of-fit tests, and fitting a simple linear regression. One unique aspect of this book is Chapter 27 that contains a very nice treatment of "Linear Algebra." The final chapter introduces R "Packages" with some brief examples and how to gain access to base packages and contributed packages. It should be noted this is the only chapter containing commands that are not part of the "base" distribution of R.

Overall, the book provides a nice introduction to R's base capabilities and is accessible to readers without any prior programming experience. The book would be an excellent self-study tutorial, text for a computer lab or short course, or supplementary material in a more advanced course.

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Mendelian Randomization: Methods for Using Genetic Variants in Causal Estimation. Stephen Burgess and Simon G. Thompson. Boca Raton, FL: Chapman & Hall/CRC Press, 2015, xiv+210 pp., $62.95(H), ISBN: 978-1-46-657317-8.

Mendelian randomization is an instrumental variable approach increasingly used to estimate causal effects of modifiable exposures on health outcomes. It attempts to overcome problems of confounding and reverse causation typical of observational studies and, as such, represents a possible alternative to randomized controlled trials when these are not an option. Being based on the use of genetic variants as instrumental variables, the popularity of Mendelian randomization