ISI International Statistical Institute

Short Book Reviews 1996

	OBSERVATIONAL STUDIES.
Author	P.R. Rosenbaum.
Publisher	New York: Springer-Verlag, 1995, pp. xiii + 230, US\$44.95

Contents:

- 1. Observational studies
- 2. Randomized experiments
- 3. Overt bias in observational studies
- 4. Sensitivity to hidden bias
- 5. Known effects
- 6. Multiple reference groups in case-referent studies
- 7. Multiple control groups
- 8. Coherence and focused hypotheses
- 9. Constructing matched sets and strata
- 10. Some strategic issues

Readership: Statisticians, epidemiologists, researchers

This is a fascinating book which combines elegant theory with good practical advice on applications, including in-depth discussion of many interesting examples from diverse fields. Fittingly the first sentence cites William G. Cochran and the spirit of his work pervades the book. Some researchers and statisticians use elaborate models in an attempt to control for bias in observational studies: this text emphasizes the virtues of simplicity, common sense and the use of sensitivity analyses to explore the possible effect of hidden variables. The mathematical level is variable-at times requiring some sophistication in probabilistic reasoning-and the exposition can be quite conceptually demanding. At times the book claims to do more than it actually does, for example the definition of "coherence" (Chapter 8) never really materializes. Not all epidemiologists will be as enthusiastic as Dr. Rosenbaum about the use of multiple control series. Each chapter ends with bibliographic notes and an index. The book would form an excellent basis for a seminar course on observational studies.

Reviewer:	
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Name	D. Oakes