van Emden, H.E.: **Statistics for Terrified Biologists.** – Blackwell Publishing, Carlton 2008. ISBN: 978-1-4051-4856-3, Paperback, 343 pp., € 24.00, £19.99.

As can be seen also from the papers in this journal, nearly all papers contain the statistical evaluation of the results, each figure and table contains specifications of statistical data. Some tables contain only the statistical data (*e.g.* correlation coefficients of F-statistic, *etc*.). This means that the statistical approach and experience is an indispensable everyday instrument for the researchers and students in biology and ecophysiology. On the other hand, as I know from my own teaching experience, probably most of biology students does not like mathematics, mathematical formulae and mathematical thinking.

So the question is how to make the necessary mathematics in the statistical procedures more attractive and illustrative. One possible way is demonstrated and presented in this book. Based on long-time teaching experience, H. van Emden used a very clear and illustrative approach using minimum of necessary mathematics.

From the very beginning of the book, all concepts are explained by using numerical examples. The reader (student) is advised to use a calculator and to follow the calculations to obtain the particular statistics. This is a really nice approach enabling to go into quite deep understanding of the meaning of the individual statistical quantities and also to learn how they are obtained in fact (summation, division of data *etc*.). For those more familiar with mathematics, many other excellent books are recommended to consult for better understanding of the given lecture.

The language of the book is far from the strict and boring mathematical sentences. It is a discussion with the reader and friendly explanation of the key concepts which should be understood. Sure, the book concentrates on the quite basic concepts, there is no space to explain and even name all statistical tests and theoretical possibilities. But this is a goal of more mathematically based books for advanced readers.

The book is organized in 19 chapters. Because the teaching approach is rather unique, the first chapter describes how to use the book. The reader becomes acquainted with the structure of the text. Some key statistical concepts are marked by an elephant picture. Special boxes are included to summarize the key content of the problems. Numerical exercises are attached.

In the individual chapters the most important concepts of statistics are explained and demonstrated. Among the most important we can name: variance, normal distribution, *t*-test, *F*-test, analysis of variance (*ANOVA*) and corresponding experimental design, factorial experiments, linear regression and correlation, and chi-square test. Also the principles of the nonparametric methods are explained.

At the end of the book, the Appendix is situated. The Appendix discusses a very important question on number of necessary replicates (again demonstrated by an example), presents statistical tables (*t*-, *F*- and chi square-statistics), solutions of the posted problems and references to the selected literature.

The book might be very useful for those who prefer illustrative and concrete numbers as examples of the statistical procedures, for those who are really terrified by the fact that they do not understand statistics. When the reader carefully follows the text and makes the calculations, he/she may gain a happy feeling of understanding of the statistics. I recommend the book to students of biological disciplines and to those still hesitating about their understanding of the basics of statistics applied in biological research.

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