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**The Importance of Being Fuzzy and Other Insight
From the Border Between Math and Computers**

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xvi + 173 pages.

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The referred book contributes to the class of works which do not appear very frequently and which aim to combine readability for laypeople with sufficient precision acceptable for experts in the relevant field. This one deals with topics related to the soft computing methods, their theoretical backgrounds, and technical tools. The extent of the subject, really, is not narrow but the author succeeded to keep unified style of the presentation.

The book is divided into three parts, each of them consisting of two chapters. The first part is oriented to the theoretical and conceptual roots of the presented ideas. The first chapter explains the general border between certainty and uncertainty and its first connections to fuzziness, the second chapter is devoted to various aspects of fuzzy set theory, fuzzy logic, fuzzy decision-making, etc.

The second part is focused on the limits of soft computing methods. Its Chapter 3 deals rather with hard computing procedures, their algorithmical complexity, P-NP problem and related topics, meanwhile Chapter 4 is oriented to mathematical foundations of reasoning, logic, formal languages, Gödel's incompleteness theorem, and some examples of problems which can and cannot be solved by mechanical computation.

Finally, the third part is interested in so called natural approaches to the problem solution and computational methods like neural networks and genetic algorithms. Specific situations in which these approaches are advantageous are discussed and their relations to natural intelligence phenomenon are shown. The book is completed by appendices devoted to mathematical formalism being behind some of the results presented in the book. Unfortunately, the list of references is distributed to particular chapters. It can be more closely related to concrete topics but, on the other hand, it complicates the orientation in general survey of works related to the topic of the book.

Due to the author's intention the book is devoted to a large public from laypersons to experts. To achieve this goal the demands for reader's mathematical education are minimized. The reader need not know anything from the higher mathematic. But, on the other hand, he is supposed to be able to read mathematical "language" – formulas and formal terminology. This demand rather determines the set of really expectable readers.

They, probably, will belong to people who have some experience with computer science or who are experts in some of its numerous branches, and want to find a sufficient overview about its global possibilities to solve the problems connected with uncertainty or enormous complexity. For such readers the book is written in a lucid and well readable way and they will find it interesting.

Milan Mareš