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Autore	Peka Libor
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Nota di contenuto	Introduction -- Analytic methods -- Iterative methods -- Linear programming -- Dynamic programming -- Introduction to the decision and game theory.
Sommario/riassunto	This book covers analytic methods to solve one-dimensional and multi-dimensional problems with or without possible constraints, iterative numerical techniques based on the gradient calculation or its estimation, and numerical methods that do not require the knowledge of gradient and use only comparative iterative tests. This book provides the reader with a basic introduction to some traditional parameter optimization techniques. The presented problems and their solution methods represent a core of the parameter optimization reign since the 17th century to the 1970s. Linear and integer programming via the simplex table is also introduced. Two simple selected problems that are solved using dynamic programming principles are also given to the reader. A general approach to constraints via penalty and barrier functions is introduced. A concise introduction to the decision and game theory concludes the book. The book does not intend to provide the reader with a rigorous mathematic derivation of the presented

methods. Its aim is instead to bring to the attention essential optimization tools for practitioners and undergraduate students and introduce selected well-established techniques to them when optimizing parameters of various models. Each method is described theoretically and supported by one or more numerical examples that vary from academic ones, through business economics to funny real-world problems that attract a broad audience. A sketch of Matlab code also follows numerical-based techniques. The author believes that the book finds its place in the libraries of many undergraduate students of various technical study programs and modern, thoughtful people worldwide, regardless of their expertise.