

<<物理学和工程学中的计算方法>>

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### 内容概要

Computational methods form an increasingly important part of the undergraduate curriculum in physics and engineering these days. This book is mainly concerned with the ways that computers may be used to advance a student's understanding of physics. A large part of the material is common to engineering as well. The subject matter covered in this volume may be classified also under the title of "computational physics." There are several ways to organize the material that should be included. The choice made here is to follow the traditional approach of mathematical physics. That is, the chapters and sections are grouped around methods, with physical problems used as the motivation and examples. One attractive alternative is to group around physical phenomena. The difficulty of following this way of organization is the heavy reliance on the physics background of the readers, thus making it harder to follow for students at early stages of their education. For this reason, such an approach is rejected.

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书籍目录

Preface to the First Edition Preface to the Second Edition 1 Computational Methods 1-1 Numerical calculations and beyond 1-2 Integers and floating numbers 1-3 Programming language and program library 1-4 Examples of algebraic, integer and floating number calculations 1-5 Examples of unconventional techniques Problems 2 Integration and Differentiation 2-1 Numerical integration 2-2 Rectangular and trapezoidal rules 2-3 Simpson's rule 2-4 Gaussian quadrature 2-5 Monte Carlo integration 2-6 Multidimensional integrals and improper integrals 2-7 Numerical differentiation Problems 3 Interpolation and Extrapolation 3-1 Polynomial interpolation 3-2 Interpolation using rational functions 3-3 Continued fraction 3-4 Fourier transform 3-5 Extrapolation 3-6 Inverse interpolation 3-7 Cubic spline Problems 4 Special Functions 4-1 Hermite polynomials and harmonic oscillator 4-2 Legendre polynomials and spherical harmonics 4-3 Spherical Bessel functions 4-4 Laguerre polynomials 4-5 Error integrals and gamma functions Problems 5 Matrices 5-1 System of linear equations 5-2 Matrix inversion and LU-decomposition 5-3 Matrix approach to the eigenvalue problem 5-4 Tridiagonalization method 5-5 Eigenvalues and eigenvectors of a tridiagonal matrix 5-6 Lanczos method of constructing matrices 5-7 Nonsymmetric matrices and complex matrices Problems 6 Methods of Least Squares 6-1 Statistical description of data 6-2 Uncertainties and their propagation 6-3 The method of maximum likelihood 6-4 The method of least squares 6-5 Statistical tests of the results 6-6 Linear least-squares fit 6-7 Nonlinear least-squares fit to data Problems 7 Monte Carlo Calculations 7-1 Generation of random numbers 7-2 Molecular diffusion and Brownian motion 7-3 Data simulation and hypothesis testing 7-4 Percolation and critical phenomena 7-5 The Ising model 7-6 Path integrals in quantum mechanics 7-7 Fractals Problems 8 Finite Difference Solution of Differential Equations 8-1 Types of differential equations 8-2 Runge-Kutta methods 8-3 Solution of initial value problems by extrapolation 8-4 Boundary value problems by shooting methods 8-5 Relaxation methods 8-6 Boundary value problems in partial differential equations 8-7 Parabolic partial differential equations 8-8 Hyperbolic partial differential equations 8-9 Nonlinear differential equations 8-10 Stiffness problems Problems 9 Finite Element Solution to PDE 9-1 Background 9-2 Shape functions and finite element approximation 9-3 Assembling contributions from elements 9-4 Variational approach 9-5 Application to a two-dimensional Poisson equation Problems Appendix A A-1 Decomposition into prime numbers A-2 Bit-reversed order A-3 Gaussian elimination of a tridiagonal matrix A-4 Random bit generator A-5 Reduction of higher-order ODE to first-order Appendix B List of Fortran Program Examples Bibliography Index

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