

Partial Differential Equations: Modelling and Numerical Simulation

By -

Springer. Hardcover. Book Condition: New. Hardcover. 292 pages. Dimensions: 9.3in. x 6.2in. x 1.0in. This book is dedicated to Olivier Pironneau. For more than 250 years partial differential equations have been clearly the most important tool available to mankind in order to understand a large variety of phenomena, natural at first and then those originating from human activity and technological development. Mechanics, physics and their engineering applications were the first to benefit from the impact of partial differential equations on modeling and design, but a little less than a century ago the Schrdinger equation was the key opening the door to the application of partial differential equations to quantum chemistry, for small atomic and molecular systems at first, but then for systems of fast growing complexity. Mathematical modeling methods based on partial differential equations form an important part of contemporary science and are widely used in engineering and scientific applications. In this book several experts in this field present their latest results and discuss trends in the numerical analysis of partial differential equations. The first part is devoted to discontinuous Galerkin and mixed finite element methods, both methodologies of fast growing popularity. They are applied to a variety of linear and...



Reviews

Completely one of the best ebook I actually have possibly study. It can be writter in simple phrases and not confusing. You can expect to like the way the author write this book. -- Josefa Ebert

It in a single of my favorite ebook. It can be packed with knowledge and wisdom I am just happy to tell you that this is basically the finest ebook i have got study in my very own lifestyle and may be he greatest pdf for actually. -- Dr. Jaquan Goodwin Jr.