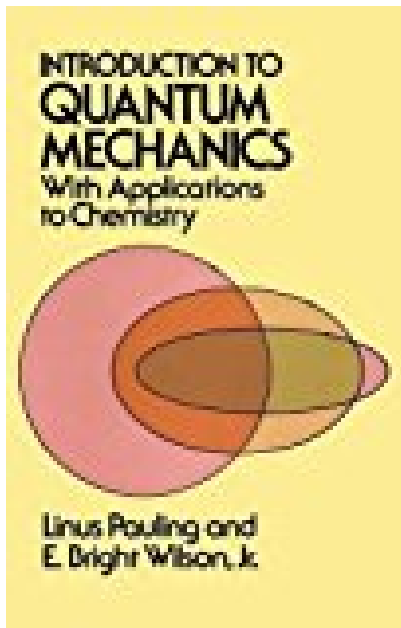


Introduction to Quantum Mechanics with Applications to Chemistry Dover Books on Physics



BOOK DETAILS

- Author : Linus Pauling
- Pages : 496 Pages
- Publisher : Dover Publications
- Language : English
- ISBN : 0486648710

[↓ DOWNLOAD](#)

BOOK SYNOPSIS

When this classic text was first published in 1935, it fulfilled the goal of its authors "to produce a textbook of practical quantum mechanics for the chemist, the experimental physicist, and the beginning student of theoretical physics." Although many who are teachers today once worked with the book as students, the text is still as valuable for the same undergraduate audience. Two-time Nobel Prize winner Linus Pauling, Research Professor at the Linus Pauling Institute of Science and Medicine, Palo Alto, California, and E. Bright Wilson, Jr., Professor Emeritus of Chemistry at Harvard University, provide a readily understandable study of "wave mechanics," discussing the Schrodinger wave equation and the problems which can be solved with it. Extensive knowledge of mathematics is not required, although the student must have a grasp of elementary mathematics through the calculus. Pauling and Wilson begin with a survey of classical mechanics, including Newton's equations of motion in the Lagrangian form, and then move on to the "old" quantum theory, developed through the work of Planck, Einstein and Bohr. This analysis leads to the heart of the book ? an explanation of quantum mechanics which, as Schrodinger formulated it, "involves the renunciation of the hope of describing in exact detail the behavior of a system." Physics had created a new realm in which classical, Newtonian certainties were replaced by probabilities ? a change which Heisenberg's uncertainty principle (described in this book) subsequently reinforced. With clarity and precision, the authors guide the student from topic to topic, covering such subjects as the wave functions for the hydrogen atom, perturbation theory, the Pauli exclusion principle, the structure of simple and complex molecules, Van der Waals forces, and systems in thermodynamic equilibrium. To insure that the student can follow the mathematical derivations, Pauling and Wilson avoid the "temptation to condense the various discussions into shorter and perhaps more elegant forms" appropriate for a more advanced audience. Introduction to Quantum Mechanics is a perfect vehicle for demonstrating the practical application of quantum mechanics to a broad spectrum of chemical and physical problems.

INTRODUCTION TO QUANTUM MECHANICS WITH APPLICATIONS TO CHEMISTRY DOVER BOOKS ON PHYSICS

- Are you looking for Ebook Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics ? You will be glad to know that right now Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics is available on our online library. With our online resources, you can find Applied Numerical Methods With Matlab Solution Manual 3rd Edition or just about any type of ebooks, for any type of product.

Best of all, they are entirely free to find, use and download, so there is no cost or stress at all. Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics may not make exciting reading, but Applied Numerical Methods With Matlab Solution Manual 3rd Edition is packed with valuable instructions, information and warnings. We also have many ebooks and user guide is also related with Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics and many other ebooks.

We have made it easy for you to find a PDF Ebooks without any digging. And by having access to our ebooks online or by storing it on your computer, you have convenient answers with Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics . To get started finding Introduction To Quantum Mechanics With Applications To Chemistry Dover Books On Physics , you are right to find our website which has a comprehensive collection of manuals listed.