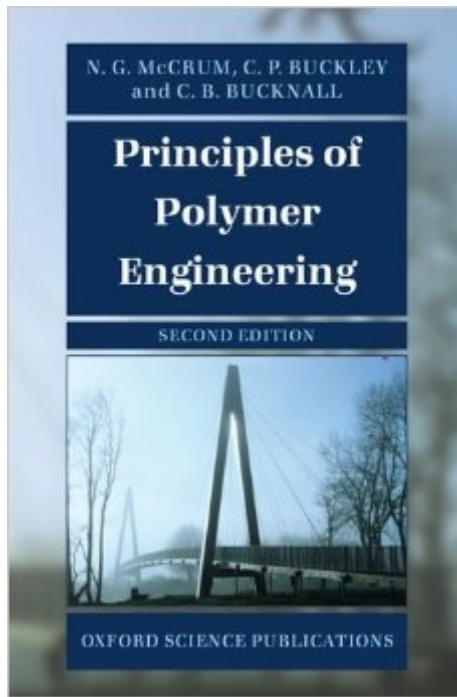


The book was found

Principles Of Polymer Engineering



Synopsis

The second edition of Principles of Polymer Engineering brings up-to-date coverage for undergraduates studying materials and polymer science. The opening chapters show why plastics and rubbers have such distinctive properties and how they are affected by temperature, strain rate, and other factors. The rest of the book concentrates on how these properties can be exploited to produce functional components within the constraints placed on them. The main changes for the second edition are a new chapter on environmental issues and substantially rewritten sections on yield and fracture and forming. To request a copy of the Solutions Manual, visit:

<http://global.oup.com/uk/academic/physics/admin/solutions>

Book Information

Paperback: 464 pages

Publisher: Oxford University Press; 2 edition (November 27, 1997)

Language: English

ISBN-10: 0198565267

ISBN-13: 978-0198565260

Product Dimensions: 9.1 x 1.1 x 6.1 inches

Shipping Weight: 1.4 pounds (View shipping rates and policies)

Average Customer Review: 4.0 out of 5 stars See all reviews (2 customer reviews)

Best Sellers Rank: #700,920 in Books (See Top 100 in Books) #46 in Books > Engineering & Transportation > Engineering > Chemical > Plastics #151 in Books > Engineering & Transportation > Engineering > Materials & Material Science > Polymers & Textiles #391 in Books > Textbooks > Engineering > Chemical Engineering

Customer Reviews

Provides a thorough introduction to the field in a matter that is readily accessible for undergraduate mechanical engineers. The most complex chapter on viscoelastic theory is well-explained, and makes only a modest use of calculus. Discusses all the basics (creep, relaxation, temperature, load history, etc.) The Chapters are as follows: 1) Structure of the molecule 2) Structure of polymeric solids 3) The elastic properties of rubber 4) Viscoelasticity 5) Yield and fracture 6) Reinforced polymers 7) Forming 8) Design For those interested in the computer modeling of the dynamic behavior of viscoelastic solids, there is another excellent book that delves more deeply (and requires a bit more math). "Mechanical Response of Polymers" by Wineman & Rajagopal will get you where you want to go when it comes to predicting the effects of time, temperature, and loading

history. Also very accessible, although probably more suited to the graduate level.

A very complete review of all the polymer engineering. Sometimes it is too fast, but it is very helpful to have a complete view on polymeric materials

[Download to continue reading...](#)

Functional Polymer Coatings: Principles, Methods, and Applications (Wiley Series on Polymer Engineering and Technology) The Encyclopedia of Polymer Clay Techniques: A Comprehensive Directory of Polymer Clay Techniques Covering a Panoramic Range of Exciting Applications The Big Book of Polymer Blends: Polymer Clay Blends. Made Simple. In One Place. Polymer clay: All the basic and advanced techniques you need to create with polymer clay. (Volume 1) Crackle Techniques: The Ultimate Guide for Polymer Clay Art and Craft (The Ultimate Guides for Polymer Clay Book 1) SCULPTING THE EASY WAY IN POLYMER CLAY FOR BEGINNERS 2: How to sculpt a fairy head in Polymer clay (Sculpting the easy way for beginners) Polymer Synthesis, Second Edition: Volume 1 (Polymer Syntheses) Methods of X-ray and Neutron Scattering in Polymer Science (Topics in Polymer Science) Principles of Polymer Engineering Principles of Polymer Chemistry (The George Fisher Baker Non-Resident Lectureship in Chemistry at Cornell University) Principles of Polymer Chemistry Polymer Foams Handbook: Engineering and Biomechanics Applications and Design Guide The Elements of Polymer Science and Engineering, Third Edition Polymer Melt Processing: Foundations in Fluid Mechanics and Heat Transfer (Cambridge Series in Chemical Engineering) The Elements of Polymer Science and Engineering Elements of Polymer Science & Engineering, Second Edition: An Introductory Text and Reference for Engineers and Chemists The Complete Works of Herbert Spencer: The Principles of Psychology, The Principles of Philosophy, First Principles and More (6 Books With Active Table of Contents) Occupational Ergonomics: Engineering and Administrative Controls (Principles and Applications in Engineering) Tissue Engineering: Engineering Principles for the Design of Replacement Organs and Tissues Earthquake Engineering: From Engineering Seismology to Performance-Based Engineering

[Dmca](#)