1. Record Nr. UNINA9910464940803321

Autore	Lieten Ruben
Titolo	Epitaxial Growth of Nitrides on Germanium / / Ruben Lieten ; field director Stefan Degroote ; thesis advisor Gustaaf Borghs, Maarten Kuijk
Pubbl/distr/stampa	Brussels, Belgium : , : VUBPress, , 2008 ©2008
Descrizione fisica	1 online resource (174 p.)
Collana	Vrije Universiteit Brussel
Altri autori (Persone)	DegrooteStefan BorghsGustaaf KuijkMaarten
Disciplina	546.684
Soggetti	Germanium Nitrides Electronic books.
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references at the end of each chapters.
Nota di contenuto	""Front ""; ""Table of contents""; ""Acronyms""; ""Chapter 1 Introduction""; ""Chapter 2 Growth of GaN on Ge(111)""; ""Chapter 3 Growth of InN on Ge(111) using a GaN buffer""; ""Chapter 4 Formation of crystalline Ge3N4 on Ge(111)""; ""Chapter 5 Ohmic contact formation on ntype Ge""; ""Chapter 6 Crystallization of amorphous Ge on Si""; ""Chapter 7 Conclusions and outlook""; ""Appendix A Report on direct photo electrolysis""; ""Appendix B Characterization techniques""; ""List of publications""

2.

Record Nr.	UNINA9910298641503321
Autore	Münstedt Helmut
Titolo	Deformation and Flow of Polymeric Materials / / by Helmut Münstedt, Friedrich Rudolf Schwarzl
Pubbl/distr/stampa	Berlin, Heidelberg : , : Springer Berlin Heidelberg : , : Imprint : Springer, , 2014
ISBN	3-642-55409-1
Edizione	[1st ed. 2014.]
Descrizione fisica	1 online resource (564 p.)
Disciplina	54 541.2254 620.1 620.11
Soggetti	Polymers Materials science Mechanics Mechanics, Applied Polymer Sciences Characterization and Evaluation of Materials Solid Mechanics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references at the end of each chapters and index.
Nota di contenuto	From the Contents: Introduction -- Physical Structure of Macromolecules -- Experimental Methods to Determine Molecular Quantities -- Structure and States of Polymers -- Linear Viscoelastic Deformation Behavior in Simple Shear -- Time-Temperature Shift of Mechanical Properties -- Linear Viscoelastic Deformation under Three-Dimensional Stresses -- Fundamentals of the Rheology of Large Deformations -- Large Deformations of Polymers -- Rheological Equations of State.-Shear Rheology -- Extensional Rheology -- Rheological Properties and Molecular Structure -- Thermorheological Behavior of Various Polymer Melts -- Rheometry -- Measurements of Flow Fields of Polymer Melts by Laser-Doppler Velocimetry -- Rheological Properties and Processing.

Sommario/riassunto

This book describes the properties of single polymer molecules and polymeric materials and the methods how to characterize them. Molar masses, molar mass distributions and branching structure are discussed in detail. These properties are decisive for a deeper understanding of structure/properties relationships of polymeric materials. This book therefore describes and discusses them in detail. The mechanical behavior as a function of time and temperature is a key subject of the book. The authors present it on the basis of many original results they have obtained in their long research careers. They present the temperature dependence of mechanical properties of various polymeric materials in a wide temperature range: from cryogenic temperatures to the melt. Besides an extensive data collection on the transitions of various different polymeric materials, they also carefully present the physical explanations of the observed phenomena. Glass transition and melting temperatures are discussed, particularly, with their relevance for applications. A comprehensive part of the book deals with properties of polymers in the molten state and their decisive influence on the processing of the materials. The book presents and discusses viscous and elastic properties in detail as a function of molar mass, polydispersity, and branching. This book addresses students of polymer and materials science, as well as other natural sciences. Besides this educational value, it will also serve as a valuable monograph for everyone dealing with polymers and polymeric materials, from research, over development, to applications.