



Optical Properties of Si, Ge, GaAs, GaSb, InAs, and InP at Elevated Temperatures

By Thomas R. Harris

Biblioscholar Nov 2012, 2012. Taschenbuch. Book Condition: Neu. 246x189x5 mm. This item is printed on demand - Print on Demand Neuware - Investigation of the optical and electrical behavior of some semiconductors at very high temperatures has not been an area of much study, at least not experimentally. The importance of such research becomes obvious due to the effects of high temperatures on semiconductor devices such as infrared detectors and light emitters. Besides the destructive effects of thermal stress and melting, changes in the optical properties of the material can greatly affect device performance. In this research, the infrared absorption of Si, Ge, GaAs, GaSb, InAs, and InP was measured from 0.6 to 25 1/4m at temperatures ranging from 295 up to 900 K, using a Fourier Transform InfraRed (FTIR) spectrometer in combination with a customdesigned heater assembly. The band gap shift was estimated from the experimental results and compared to existing data. There was good agreement between the two results. For GaSb and InAs, data was taken at higher temperatures than what was found in the literature. That data provides an extension of existing theory to a higher temperature range. Free-carrier absorption was also observed and was compared to...



Reviews

The ebook is straightforward in go through preferable to recognize. It typically does not charge too much. Its been designed in an exceptionally straightforward way and it is just following i finished reading this book where basically altered me, affect the way i really believe.

-- Dr. Reta Murphy

It becomes an amazing pdf which i actually have at any time read through. This can be for all those who statte there had not been a worthy of reading through. You wont sense monotony at anytime of your own time (that's what catalogues are for relating to should you check with me).

-- Claud Kris

You May Also Like



Psychologisches Testverfahren

Reference Series Books LLC Nov 2011, 2011. Taschenbuch. Book Condition: Neu. 249x191x7 mm. This item is printed on demand - Print on Demand Neuware - Quelle: Wikipedia. Seiten: 100. Kapitel: Myers-Briggs-Typindikator, Keirsey Temperament Sorter, DISG, Eignungstest für das Medizinstudium, Adult Attachment Interview,...



Programming in D

Ali Cehreli Dez 2015, 2015. Buch. Book Condition: Neu. 264x182x53 mm. This item is printed on demand - Print on Demand Neuware - The main aim of this book is to teach D to readers who are new to computer programming. Although...



Yearbook Volume 15

RareBooksClub. Paperback. Book Condition: New. This item is printed on demand. Paperback. 58 pages. Dimensions: 9.7in. x 7.4in. x 0.1in.This historic book may have numerous typos and missing text. Purchasers can usually download a free scanned copy of the original book (without...



Adobe Indesign CS/Cs2 Breakthroughs

Peachpit Press, 2005. Softcover. Book Condition: Neu. Gebraucht - Sehr gut Unbenutzt. Schnelle Lieferung, Kartonverpackung. Abzugsfähige Rechnung. Bei Mehrfachbestellung werden die Versandkosten anteilig erstattet. - Adobe InDesign is taking the publishing world by storm and users are hungry for breakthrough solutions to...



Studyguide for Introduction to Early Childhood Education: Preschool Through Primary Grades by Jo Ann Brewer ISBN: 9780205491452

2011. Softcover. Book Condition: New. 6th. 8.25 x 11 in. Never HIGHLIGHT a Book Again! Includes all testable terms, concepts, persons, places, and events. Cram101 Just the FACTS101 studyguides gives all of the outlines, highlights, and quizzes for your textbook with optional...



Sport is Fun (Red B) NF

Pearson Education Limited. Paperback. Book Condition: new. BRAND NEW, Sport is Fun (Red B) NF, Dianne Irving, This title is part of Pearson's Bug Club - the first whole-school reading programme that joins books and an online reading world to teach today's...