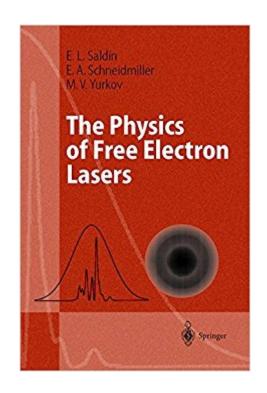


The book was found

The Physics Of Free Electron Lasers (Advanced Texts In Physics)





Synopsis

The Free Electron Laser (FEL) will be a crucial tool for research and industrial applications. This book describes the physical fundamentals of FELs on the basis of classical mechanics, electrodynamics, and the kinetic theory of charged particle beams, and will be suitable for graduate students and scientists alike. After a short introduction, the book discusses the theory of the FEL amplifier and oscillator, diffraction effects in the amplifier, and waveguide FEL.

Book Information

Series: Advanced Texts in Physics Hardcover: 470 pages Publisher: Springer; 2000 edition (January 7, 2000) Language: English ISBN-10: 3540662669 ISBN-13: 978-3540662662 Product Dimensions: 9.2 x 1.1 x 6.1 inches Shipping Weight: 1.8 pounds (View shipping rates and policies) Average Customer Review: 5.0 out of 5 stars 1 customer review Best Sellers Rank: #1,214,534 in Books (See Top 100 in Books) #106 in Books > Engineering & Transportation > Engineering > Materials & Material Science > Testing #182 in Books > Engineering & Transportation > Engineering > Mechanical > Welding #196 in Books > Science & Math > Physics > Nuclear Physics > Particle Physics

Customer Reviews

The free electron laser (FEL) will be an outstanding tool for research and industrial application. This book describes the physical fundamentals on the basis of classical mechanics, electrodynamics, and the kinetic theory of charged particle beams, and will be suitable for graduate students and scientists alike. After a short introduction, the book discusses the theory of the FEL amplifier and oscillator and diffraction effects in the amplifier. Waveguide FEL and shot noise are also treated.

It is a good start for anyone who don't have any background in the field of free electron lasers. The content is self consistent in the way that all results start from first principles. When approximations have to be made to proceed, they are stated explicitly in an understandable way. The variables are defined somewhat different from other references but the choices naturally follow the physics behind.

Download to continue reading...

The Physics of Free Electron Lasers (Advanced Texts in Physics) Electron microscopy for beginners: Easy course for understanding and doing electron microscopy (Electron microscopy in Science) Optics and Lasers: Including Fibers and Optical Waveguides (Advanced Texts in Physics) Debt Free for Life: The Ultimate Guide to Get Out of Debt (FREE Bonuses Included) (Debt, Debt Free, Debt Free Forever, Debt Free for Life, Debt Free for Good, Debt Management, Get Out of Debt) Allergy-free Desserts: Gluten-free, Dairy-free, Egg-free, Soy-free, and Nut-free Delights Electron Microprobe Analysis and Scanning Electron Microscopy in Geology Scanning Electron Microscopy, X-Ray Microanalysis, and Analytical Electron Microscopy: A Laboratory Workbook Electron Diffraction in the Transmission Electron Microscope (Microscopy Handbooks) Transmission Electron Microscopy and Diffractometry of Materials (Graduate Texts in Physics) The Healthy Gluten-Free Life: 200 Delicious Gluten-Free, Dairy-Free, Soy-Free and Egg-Free Recipes! Gluten Free: Gluten Free Diet for Beginners: Create Your Gluten Free Lifestyle for Vibrant Health, Wellness & Weight Loss (Gluten-Free Diet, Celiac Disease, Wheat Free, Cookbook Book 1) Books of Breathing and Related Texts -Late Egyptian Religious Texts in the British Museum Vol.1 (Catalogue of the Books of the Dead and Other Religious Texts in the British Museum) Noise Theory and Application to Physics: From Fluctuations to Information (Advanced Texts in Physics) Solid-State Physics: An Introduction to Principles of Materials Science (Advanced Texts in Physics (Paperback)) Image Formation in Low-Voltage Scanning Electron Microscopy (SPIE Tutorial Text Vol. TT12) (Tutorial Texts in Optical Engineering) The Whole Life Nutrition Cookbook: Over 300 Delicious Whole Foods Recipes, Including Gluten-Free, Dairy-Free, Soy-Free, and Egg-Free Dishes Allergy Proof Recipes for Kids: More Than 150 Recipes That are All Wheat-Free, Gluten-Free, Nut-Free, Egg-Free and Low in Sugar My Grain & Brain Gluten-free Slow Cooker Cookbook: 101 Gluten-free Slow Cooker Recipes to Boost Brain Power & Lose Belly Fat - A Grain-free, Low Sugar, Low Carb and Wheat-Free Slow Cooker Cookbook Free Cookbooks: Box Set: The Complete Healthy And Delicious Recipes Cookbook Box Set(30+ Free Books Included!) (Free Cookbooks, Free, Cookbooks, Recipes, Easy, Quick, Cooking,) Vegan: High Protein Vegan Cookbook-Vegan Diet-Gluten Free & Dairy Free Recipes (Slow cooker, crockpot, Cast Iron) (vegan, vegan diet, vegan slowcooker, high ... free, dairy free, low carb)

Contact Us

DMCA

Privacy

FAQ & Help