

DOWNLOAD PDF

Polarization Bremsstrahlung

By Solov'yov, Andrey V. / Korol, Andrey V.

Book Condition: New. Publisher/Verlag: Springer, Berlin | This comprehensive introduction to the theory and applications of polarizational bremsstrahlung has been prepared by leading experts to provide graduate students with a functional understanding of a high-profile sector with enormous practical potential. | This book introduces and reviews both theory and applications of polarizational bremsstrahlung, i.e. the electromagnetic radiation emitted during collisions of charged particles with structured, thus polarizable targets, such as atoms, molecules and clusters. The subject, following the first experimental evidence a few decades ago, has gained importance through a number of modern applications. Thus, the study of several radiative mechanisms is expected to lead to the design of novel light sources, operating in various parts of the electromagnetic spectrum. Conversely, the analysis of the spectral and angular distribution of the photon emission constitutes a new tool for extracting information on the interaction of the colliding particles, and on their internal structure and dynamical properties. Last but not least, accurate quantitative descriptions of the photon emission processes determine the radiative energy losses of particles in various media, thereby providing essential information required for e.g. plasma diagnostics as well as astrophysical and medical applications (such as radiation therapy). This book primarily addresses graduate...



Reviews

This book may be really worth a read through, and far better than other. it was actually writtern extremely completely and valuable. I am just very easily will get a satisfaction of looking at a published ebook. -- Lillie Toy

It is easy in read through easier to fully grasp. it had been writtern very completely and useful. I am pleased to let you know that here is the greatest book we have read during my personal life and could be he very best book for possibly. -- Miss Marge Jerde