

《同步加速器辐射理论及其发展》

图书基本信息

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作者：Bordovitsyn, V. A.; Bordovitsyn;

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内容概要

The first part of the book is devoted to fundamental results in synchrotron and undulator radiation theory. This makes it a useful supplement to textbooks on classical and quantum electrodynamics of relativistic particles. The conventional theory is amplified with the recent investigations carried out by the contributors. A semiclassical theory of radiation is developed with regard to the influence of recoil effect and radiation of the particle magnetic moment (spin light). Of great interest is a chapter on the astrophysical aspects of SR. All these make the book of great use not only to young physicists who wish to improve their knowledge and deepen their understanding of the fascinating phenomenon of modern physics, but also to experienced theorists and users of SR. The contributors of the book belong to a well-known school of the SR-theory founded by AA Sokolov and I M Ternov. This school is an authority on the development of the theoretical principles of SR, the construction of classical and quantum theory of SR.

Preface Introduction

1 Classical Theory of Synchrotron Radiation

1.1 Electromagnetic Fields of Relativistic Charge

1.2 The Wave Zone and Covariant Definition of Radiation

1.3 Angular Distribution of Instantaneous Radiation Power

1.4 Linearly Polarized SR and Its Angular Distribution

1.5 Electron Radiation in a Uniform Magnetic Field

1.6 Spectral-Angular Distribution and Circular Polarization of SR

1.6.1 General Information

1.6.2 Fourier-Components of Radiation Fields

1.6.3 Schott's Formula

1.6.4 Spectral Composition

1.6.5 The Helical Undulator

1.7 SR of the Ultrarelativistic Electron

1.7.1 Radiation of the Ultrarelativistic Charge as SR

1.7.2 Angular Distribution and Linear Polarization of Radiation . . .

1.7.3 Spectral Composition and the Circular Polarization of Radiation

1.7.4 Schwinger's Approximation

1.7.5 Limits of Validity of the Classical Theory

1.8 Coherence Properties of SR

Bibliography

2 Spin Properties of Relativistic Particles

2.1 Spin Kinematics in the Classical and Quantum Theories

2.2 Physical Interpretation of the Spin Operators

2.3 Classical Spin Equations of Motion

2.4 Quasi-Classical Theory of Spin

2.5 Spin in the Quantum Theory with the Definite Evenness of Operators

2.6 Frenkel-Corben Classical Spin Equations

2.7 Some Exact Solutions of the Spin Equations of Motion

2.7.1 Magnetic Top

2.7.2 Electron in a Constant and Uniform Magnetic Field

2.7.3 Spin-Resonance Solutions

2.7.4 Classical Interpretation of Spin-Flip Transitions

2.8 Spin Integrals of Motion and Invariant Description of Spin States in the External Electromagnetic Field

Bibliography

3 Quantum Theory of Synchrotron Radiation

3.1 Scalar Particles in a Magnetic Field. Klein-Gordon Equation

3.2 Electron in a Magnetic Field. Dirac Equation

3.3 Solution of the Dirac Equation for an Electron with a Definite State of Spin Polarization

3.3.1 Longitudinally Polarised Electron

3.3.2 Vector Operator of Transverse Polarization

3.3.3 Tensor Operator of Transverse Polarization

3.3.4 Radial Projection of the Spin

3.4 Matrix Elements of the Dirac Matrices. Some Properties of Laguerre Functions

3.5 Qualitative Estimations for Manifestation of Quantum Effects in SR

3.6 Quantum Effects in Radiation of a Nonrelativistic Electron

3.7 Mathematical Features of the Problem of Radiation of Ultrarelativistic Particles

3.8 Calculation of Angle Integrals

3.9 Calculation of Integrals over Spectrum. Functions Lu and D4

3.10 Radiation of the Electron with the Longitudinally Polarized Spin

3.11 Radiation of the Electron with a Spin Oriented to the Magnetic Field

3.12 Radiation of a Spinless Particle in a Magnetic Field

3.13 Characteristic Features of Electron Radiation in a Magnetic Field

3.14 Radiative Self-Polarization of an Electron Spin

3.15 Radiation of Uncharged Particles with Magnetic and Electric Moments Moving in Uniform Stationary Electromagnetic Fields

Bibliography

4 Spin Light

4.1 Introduction

4.2 Classical Theory of p-Radiation

4.2.1 Equations of an Electromagnetic Field

4.2.2 Potentials and Fields of a Relativistic Magnetron

4.2.3 Wave Zone and Radiation Field

4.2.4 Total Radiation Power in a Uniform Motion of a Magnetron

4.3 Radiation of the Relativistic Magnetic Moment in Uniform Fields

4.3.1 Angular Distribution and Frequency of Radiation.

5 Undulator Radiation

6 Radiation in Special Electrodynamical Systems

7 Synchrotron Radiation in a Strong Magnetic Field

8 Synchrotron Radiation in Astrophysics

Index

《同步加速器辐射理论及其发展》

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