1. Record Nr. UNINA9910410005203321

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Titolo	SU(3) Symmetry in Atomic Nuclei / / by V. K. B. Kota
Pubbl/distr/stampa	Singapore : , : Springer Singapore : , : Imprint : Springer, , 2020
ISBN	981-15-3603-1
Edizione	[1st ed. 2020.]
Descrizione fisica	1 online resource (XV, 289 p. 37 illus., 4 illus. in color.)
Disciplina	539.725
Soggetti	Nuclear physics Solid state physics Mathematical physics Group theory Particle and Nuclear Physics Solid State Physics Mathematical Physics Group Theory and Generalizations
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Introduction -- SU(3) Algebra in Nuclei: Preliminaries -- SU(3) Wigner-Racah Algebra Details -- SU(3) Wigner-Racah Algebra Details II -- SU(3) SO(3) Integrity Basis Operators -- SU(3) in Shell Model Descriptions of Nuclei -- SU(3) in Interacting Boson Model for Even-Even Nuclei -- SU(3) in Interacting Boson-Fermion Models -- Other Aspects of SU(3) Symmetry in Nuclei -- Multiple SU(3) Algebras in SM and IBM -- Statistical Results with SU(3) -- Appendixes.
Sommario/riassunto	This book provides an understandable review of SU(3) representations, SU(3) Wigner–Racah algebra and the SU(3) SO(3) integrity basis operators, which are often considered to be difficult and are avoided by most nuclear physicists. Explaining group algebras that apply to specific physical systems and discussing their physical applications, the book is a useful resource for researchers in nuclear physics. At the same time it helps experimentalists to interpret data on rotational nuclei by using SU(3) symmetry that appears in a variety of nuclear models, such as the shell model, pseudo-SU(3) model, proxy-SU(3)

model, symplectic Sp(6, R) model, various interacting boson models, various interacting boson–fermion models, and cluster models. In addition to presenting the results from all these models, the book also describes a variety of statistical results that follow from the SU(3) symmetry.