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Edizione	[1st ed. 2016.]
Descrizione fisica	1 online resource (XIV, 528 p. 242 illus., 37 illus. in color.)
Disciplina	531
Soggetti	Mechanics Physics Mechanics, Applied Classical Mechanics Mathematical Methods in Physics Solid Mechanics
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Mathematical Preparations -- Mechanics of the Free Mass Point -- Mechanics of Many-Particle Systems -- The Rigid Body -- Solutions of the Exercises.
Sommario/riassunto	This textbook offers a clear and comprehensive introduction to classical mechanics, one of the core components of undergraduate physics courses. The book starts with a thorough introduction to the mathematical tools needed, to make this textbook self-contained for learning. The second part of the book introduces the mechanics of the free mass point and details conservation principles. The third part expands the previous to mechanics of many particle systems. Finally the mechanics of the rigid body is illustrated with rotational forces, inertia and gyroscope movement. Ideally suited to undergraduate students in their first year, the book is enhanced throughout with learning features such as boxed inserts and chapter summaries, with key mathematical derivations highlighted to aid understanding. The text is supported by numerous worked examples and end of chapter problem sets. About the Theoretical Physics series Translated from the renowned and highly successful German editions, the eight volumes of

this series cover the complete core curriculum of theoretical physics at undergraduate level. Each volume is self-contained and provides all the material necessary for the individual course topic. Numerous problems with detailed solutions support a deeper understanding. Nolting is famous for his refined didactical style and has been referred to as the "German Feynman" in reviews.

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