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Titolo	Geometric Tolerancing Standard to Machine Design [[electronic resource]] : A Design-for-Fit Approach // by Faryar Etesami
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ISBN	3-031-47585-2
Edizione	[1st ed. 2024.]
Descrizione fisica	1 online resource (333 pages)
Disciplina	670
Soggetti	Manufactures Computer-aided engineering Machinery Engineering design Production engineering Machines, Tools, Processes Computer-Aided Engineering (CAD, CAE) and Design Machinery and Machine Elements Engineering Design Process Engineering
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di contenuto	Dimensions and Tolerances -- A Design Engineer's Overview of Tolerance Statements – Part I -- A Design Engineer's Overview of Tolerance Statements – Part II -- Default Tolerances. -- Tolerance Design for Unconstrained Fits Between Two Parts Part-I -- Tolerance Design for Unconstrained Fits Between Two Parts Part-II -- Tolerance Design for Orientation-constrained Fits Between Two Parts -- Tolerance Design for Location-constrained Fits Between Two Parts -- Assemblies with Threaded Fasteners -- Tolerance Design of Multipart Fits -- Tolerance Analysis of Multipart Fits.
Sommario/riassunto	This book is for students enrolled in undergraduate mechanical engineering, or similar, programs. The material presented is based on nearly thirty years of class-tested lecture notes for courses on the

applications of geometric tolerancing for designers. The book's emphasis is on fit requirements for machine components, as fit assurance makes up the majority of challenging applications in tolerancing. For design engineers, knowing how to apply geometric tolerances has been a challenge even for engineers who have practiced geometric tolerancing for a long time. The syntax and meaning of geometric tolerancing statements can be learned easily and quickly, but knowing how to use them correctly is much more difficult. In the Design-for-Fit approach, the presentation starts with the geometric requirements for various kinds of fit and then presents the geometric tolerance statements necessary to achieve those fits. Introduces a unique step-by-step design-based approach to the subject of fit assurance; Introduces new vocabulary and methods for design-based fit assurance applications; Focuses on real examples and tolerance statements tailored to fit applications. .
