Record Nr. UNINA9910829832803321 **Titolo** Rolling Contacts Pubbl/distr/stampa John Wiley & Sons [Place of publication not identified], : John Wiley & Sons Incorporated, 2001 **ISBN** 1-61344-622-5 0-470-03117-4 0-585-49008-2 Descrizione fisica 1 online resource (xviii, 445 pages) Disciplina 620,106 Soggetti Fluid Mechanics Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Note generali Bibliographic Level Mode of Issuance: Monograph

Sommario/riassunto

An important volume in the & Idquo; Tribology in Practice Series & rdquo; (TIPS). Rolling Contacts presents a general introduction to the fundamentals of rolling friction with the emphasis on important engineering applications of rolling contacts. Rolling Friction is an age & ndash; old engineering problem & ndash; with friction and wear related problems resulting in enormous costs to industry world & ndash; wide. Rolling Contacts presents the fundamentals of rolling contacts of all types, emphasizing important engineering applications & ndash; including rolling bearings, gears, road & ndash; tyre and rail & ndash; wheel interactions, cam & ndash; tappet systems, and roll & ndash; forming of materials. Procedures and techniques of analysis developed throughout the book enhance understanding of this complex subject and help to improve the engineer & rsquo; ability to design and select rolling contacts for mechanical devices and systems. CONTENTS INCLUDE: Elements of surface contact of solids Fundamentals of rolling motion Dynamic characteristics of rolling motion Rolling contact bearing Rolling contacts in land locomotion Machine elements in rolling contact Non & ndash; metallic rolling contacts. Rolling Contacts will be invaluable to practising designers, researchers, and postgraduate

students. Engineering degree course students will also benefit from this book & rsquo;s thorough introduction to rolling contacts commonly used in practice.