Record Nr. UNINA9910770247703321 Autore Gu Peihua Titolo Adaptable Design: Methods and Applications // by Peihua Gu, Deyi Xue, Qingjin Peng, Jian Zhang Singapore:,: Springer Nature Singapore:,: Imprint: Springer,, 2024 Pubbl/distr/stampa **ISBN** 981-9958-69-5 Edizione [1st ed. 2024.] Descrizione fisica 1 online resource (297 pages) Collana Research on Intelligent Manufacturing, , 2523-3394 Altri autori (Persone) XueDevi PengQingjin ZhangJian Disciplina 620.0042 Soggetti Engineering design Production engineering Manufactures Engineering Design **Process Engineering** Machines, Tools, Processes Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di contenuto Chapter 1 Introduction -- Chapter 2 Modeling for Adaptable Design --Chapter 3 Evaluation for Adaptable Design -- Chapter 4 Processes and Methods for Adaptable Design -- Chapter 5 Tool and Techniques for Adaptable Design -- Chapter 6 Applications of Adaptable Design --Chapter 7 Concluding Remarks and Development Trends. Sommario/riassunto This book provides a comprehensive discussion of Adaptable Design (AD). It covers the conception, method, and application of AD to the real-world product design. AD's benefits are substantial as it upgrades. reuses, remanufactures and recycles products throughout the product lifecycle. It rapidly adapts the existing design in development of new designs. Key elements of AD include rationalized function structures. adaptable product architectures, adaptable interfaces, and adaptability evaluations. The main feature of AD is adaptability in design methods

also modeling and evaluating adaptabilities.

and product applications with general and specific adaptability. AD has