Record Nr. UNINA9910583091503321 Autore Keidar Michael Titolo Plasma Engineering: Applications from Aerospace to Bio and Nanotechnology Pubbl/distr/stampa San Diego:,: Elsevier Science & Technology,, 2018 ©2018 **ISBN** 0-12-813703-7 0-12-813702-9 Edizione [2nd ed.] Descrizione fisica 1 online resource (xvii, 567 pages) Altri autori (Persone) BeilisIsak Disciplina 621.044 Soggetti Plasma engineering Plasma (Ionized gases) Lingua di pubblicazione Inglese **Formato** Materiale a stampa Livello bibliografico Monografia Nota di bibliografia Includes bibliographical references and index Nota di contenuto 1. Plasma concepts; 2. Plasma diagnostics; 3. Electrical discharges; 4. Plasma Dynamics; 5. Plasma in Space Propulsion; 6. Plasma-based control; 7. Plasma nanoscience and nanotechnology; 8. Plasma Medicine Plasma Engineering, Second Edition, applies the unique properties of Sommario/riassunto plasmas (ionized gases) to improve processes and performance over many fields, such as materials processing, spacecraft propulsion and nanofabrication. The book considers this rapidly expanding discipline from a unified standpoint, addressing fundamentals of physics and modeling, as well as new and real-word applications in aerospace, nanotechnology and bioengineering. This updated edition covers the fundamentals of plasma physics at a level suitable for students using application examples and contains the widest variety of applications of any text on the market, spanning the areas of aerospace engineering, nanotechnology and nanobioengineering. This is highly useful for courses on plasma engineering or plasma physics in departments of Aerospace Engineering, Electrical Engineering and Physics. It is also useful as an introduction to plasma engineering and its applications for early career researchers and practicing engineers