

1. Record Nr.	UNINA9910451159203321
Autore	Gonzalez Guillermo <1944->
Titolo	Foundations of oscillator circuit design // Guillermo Gonzalez
Pubbl/distr/stampa	Boston : , : Artech House, , ©2007 [Piscataqay, New Jersey] : , : IEEE Xplore, , [2006]
ISBN	1-59693-163-9
Descrizione fisica	1 online resource (437 p.)
Collana	Artech House microwave library
Disciplina	621.3815/33
Soggetti	Oscillators, Electric Electronic circuits Electronic books.
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references (p. 413) and index.
Nota di contenuto	Foundations of Oscillator Circuit Design; Contents; Preface; Chapter 1 Theory of Oscillators 1; Chapter 2 Oscillator Characteristics 53; Chapter 3 Tuned-Circuit Oscillators 103; Chapter 4 Crystal Oscillators 181; Chapter 5 Negative-Resistance Oscillators 251; Chapter 6 Nonsinusoidal Oscillators 351; Appendix A Conditions for a Stable Oscillation 401; Appendix B Analysis of the Series Feedback Circuit 407; Selected Bibliography 413; About the Author 415
Sommario/riassunto	Oscillators are an important component in today's RF and microwave systems, and practitioners in the field need to know how to design oscillators for stability and top performance. Offering engineers broader coverage than other oscillator design books on the market, this comprehensive resource considers the complete frequency range, from low-frequency audio oscillators to more complex oscillators found at the RF and microwave frequencies. Packed with over 1,200 equations, the book gives professionals a thorough understanding of the principles and practice of oscillator circuit design and emphasizes the use of time-saving CAD (computer aided design) simulation techniques. From the theory and characteristics of oscillators, to the design of a wide variety of oscillators (including tuned-circuit, crystal, negative-resistance, and relaxation oscillators), this unique book is a one-stop reference practitioners can turn to again and again when

working on their challenging projects in this field.
