1. Record Nr. UNINA9910782298403321

Autore	Sweet Allen A. <1943->
Titolo	Designing bipolar transistor radio frequency integrated circuits / / Allen A. Sweet
Pubbl/distr/stampa	Boston, Massachusetts : , : Artech House, , ©2008 [Piscataqay, New Jersey] : , : IEEE Xplore, , [2007]
ISBN	1-59693-129-9
Descrizione fisica	1 online resource (330 p.)
Collana	Artech House microwave library
Disciplina	621.38412
Soggetti	Radio circuits Radio frequency integrated circuits
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 and index.
Nota di contenuto	Designing Bipolar Transistor Radio Frequency Integrated Circuits; Contents; Acknowledgments; CHAPTER 1 Introduction; CHAPTER 2 Applications; CHAPTER 3 RFIC Architectures; CHAPTER 4 InGaP/GaAs HBT Fabrication Technology; CHAPTER 5 SiGe HBT Fabrication Technology; CHAPTER 6 Passive Circuit Design; CHAPTER 7 Amplifier Design Basics; CHAPTER 8 Low-Noise Amplifier Design; CHAPTER 9 Power Amplifier Design; CHAPTER 10 Designing Multistage Amplifiers; CHAPTER 11 Mixer/Modulator Design; CHAPTER 12 Frequency Multiplier Design; CHAPTER 13 Voltage-Controlled Oscillator Design CHAPTER 14 Layout Design StrategiesCHAPTER 15 RFIC Economics; Acronyms; About the Author; Index
Sommario/riassunto	If you're looking for an in-depth and up-to-date understanding bipolar transistor RFIC design, this practical resource is a smart choice. Unlike most books on the market that focus on GaAs MESFET or silicon CMOS process technology, this unique volume is dedicated exclusively to RFIC designs based on bipolar technology. Until now, critical GaAs HBT and SiGe HBT process technologies have been largely neglected in reference books. This book fills this gap, offering you a detailed treatment of this increasingly important topic. You discover a wide range of circuit topologies that are optimized for maximum performance with bipolar devices. From discussions of key applications (Bluetooth, UWB, GPS, WiMax) and architectures ... to in-depth coverage of fabrication

	technologies and amplifier design ... to a look at performance tradeoffs and production costs, this book arms you with complete design know-how for your challenging work in the field.

2.

Record Nr.	UNINA9910966557403321
Autore	Post Eric S (Eric Stephen)
Titolo	Ecology of climate change : the importance of biotic interactions / / Eric Post
Pubbl/distr/stampa	Princeton, : Princeton University Press, 2013
ISBN	9781400847563 1400847567 9781400846139 1400846137
Edizione	[Core Textbook]
Descrizione fisica	1 online resource (404 p.)
Collana	Monographs in Population Biology ; ; 68
Classificazione	RB 10438
Disciplina	577.2/2
Soggetti	Bioclimatology Climatic changes
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 and index.
Nota di contenuto	Frontmatter -- Contents -- Preface: Purpose, Perspective, and Scope -- Acknowledgments -- Chapter 1. A Brief Overview of Recent Climate Change and Its Ecological Context -- Chapter 2. Pleistocene Warming and Extinctions -- Chapter 3. Life History Variation and Phenology -- Chapter 4. Population Dynamics and Stability -- Chapter 5. The Niche Concept -- Chapter 6. Community Dynamics and Stability -- Chapter 7. Biodiversity, Distributions, and Extinction -- Chapter 8. Ecosystem Function and Dynamics -- Chapter 9. Brief Remarks on Some Especially Important Considerations -- References -- Index -- Backmatter
Sommario/riassunto	Rising temperatures are affecting organisms in all of Earth's biomes, but the complexity of ecological responses to climate change has hampered the development of a conceptually unified treatment of them. In a remarkably comprehensive synthesis, this book presents past, ongoing, and future ecological responses to climate change in the

context of two simplifying hypotheses, facilitation and interference, arguing that biotic interactions may be the primary driver of ecological responses to climate change across all levels of biological organization. Eric Post's synthesis and analyses of ecological consequences of climate change extend from the Late Pleistocene to the present, and through the next century of projected warming. His investigation is grounded in classic themes of enduring interest in ecology, but developed around novel conceptual and mathematical models of observed and predicted dynamics. Using stability theory as a recurring theme, Post argues that the magnitude of climatic variability may be just as important as the magnitude and direction of change in determining whether populations, communities, and species persist. He urges a more refined consideration of species interactions, emphasizing important distinctions between lateral and vertical interactions and their disparate roles in shaping responses of populations, communities, and ecosystems to climate change.