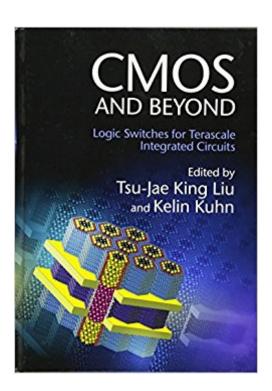


The book was found

CMOS And Beyond: Logic Switches For Terascale Integrated Circuits





Synopsis

Get up to speed with the future of logic switch design with this indispensable overview of the most promising successors to modern CMOS transistors. Learn how to overcome existing design challenges using novel device concepts, presented using an in-depth, accessible, tutorial-style approach. Drawing on the expertise of leading researchers from both industry and academia, and including insightful contributions from the developers of many of these alternative logic devices, new concepts are introduced and discussed from a range of different viewpoints, covering all the necessary theoretical background and developmental context. Covering cutting-edge developments with the potential to overcome existing limitations on transistor performance, such as tunneling field-effect transistors (TFETs), alternative charge-based devices, spin-based devices, and more exotic approaches, this is essential reading for academic researchers, professional engineers, and graduate students working with semiconductor devices and technology.

Book Information

Hardcover: 436 pages

Publisher: Cambridge University Press; 1 edition (April 6, 2015)

Language: English

ISBN-10: 1107043182

ISBN-13: 978-1107043183

Product Dimensions: 6.8 x 1 x 9.7 inches

Shipping Weight: 2.2 pounds (View shipping rates and policies)

Average Customer Review: Be the first to review this item

Best Sellers Rank: #860,338 in Books (See Top 100 in Books) #57 in Books > Engineering & Transportation > Engineering > Electrical & Electronics > Electronics > Optoelectronics #106 in Books > Engineering & Transportation > Engineering > Electrical & Electronics > Circuits > Integrated #147 in Books > Engineering & Transportation > Engineering > Electrical & Electronics > Electronics > Semiconductors

Customer Reviews

Learn how to overcome existing logic switch design challenges with this in-depth, accessible, tutorial-style overview of the most promising successors to modern CMOS technology, written by leading researchers from industry and academia. Essential reading for academic researchers, professional engineers, and graduate students within the semiconductor community.

Tsu-Jae King Liu is the Conexant Systems Distinguished Professor, Department of Electrical Engineering and Computer Sciences at the University of California, Berkeley. A co-inventor of the FinFET, she has been awarded the IEEE Kiyo Tomiyasu Award (2010), the Electrochemical Society Thomas D. Calinan Award (2011), and the Intel Outstanding Researcher Award (2012). She is a Fellow of the IEEE.Kelin Kuhn is an Intel Fellow and Director of Advanced Device Technology in the Technology and Manufacturing Group at Intel Corporation. She is responsible for research on new device architectures and has been awarded two Intel Achievement Awards, one for high-k metal-gate (2006) and one for Trigate (2008), as well as the IEEE Paul Rappaport Award (2013). She is a Fellow of the IEEE.

Download to continue reading...

CMOS and Beyond: Logic Switches for Terascale Integrated Circuits CMOS Digital Integrated Circuits: A First Course (Materials, Circuits and Devices) Design of Analog CMOS Integrated Circuits (Irwin Electronics & Computer Enginering) CMOS Digital Integrated Circuits Analysis & Design Design of Analog CMOS Integrated Circuits Black & Decker Advanced Home Wiring. Updated 4th Edition: DC Circuits * Transfer Switches * Panel Upgrades * Circuit Maps * More Introduction to Logic Circuits & Logic Design with VHDL Introduction to Logic Circuits & Logic Design with Verilog CMOS VLSI Design: A Circuits and Systems Perspective (4th Edition) Logical Effort: Designing Fast CMOS Circuits (The Morgan Kaufmann Series in Computer Architecture and Design) CMOS VLSI Design: A Circuits and Systems Perspective CMOS VLSI Design: A Circuits and Systems Perspective (3rd Edition) Nanoscale CMOS VLSI Circuits: Design for Manufacturability Integrated circuit devices and components (Integrated-circuit technology, analog and logic circuit design, memory and display devices) Design Techniques for Integrated CMOS Class-D Audio Amplifiers (Advanced Series in Electrical and Computer Engineering) CMOS Logic Circuit Design: 1st (First) Edition Selected Topics in RF, Analog and Mixed Signal Circuits and Systems (Tutorials in Circuits and Systems) Mass Persuasion Method: Activate the 8 Psychological Switches That Make People Open Their Hearts, Minds and Wallets for You (Without Knowing Why They are Doing It) Encyclopedia of Electronic Components Volume 1: Resistors, Capacitors, Inductors, Switches, Encoders, Relays, Transistors Healing is Voltage: Cancer's On/Off Switches: Polarity

Contact Us

DMCA

Privacy