

SuperSpeed Device Design By Example

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[The Little Book of Valuation](#) - Aswath Damodaran 2011-03-29

An accessible, and intuitive, guide to stock valuation Valuation is at the heart of any investment decision, whether that decision is to buy, sell, or hold. In *The Little Book of Valuation*, expert Aswath Damodaran explains the techniques in language that any investors can understand, so you can make better investment decisions when reviewing stock research reports and engaging in independent efforts to value and pick stocks. Page by page, Damodaran distills the fundamentals of valuation, without glossing over or ignoring key concepts, and develops models that you can easily understand and use. Along the way, he covers various valuation approaches from intrinsic or discounted cash flow valuation and multiples or relative valuation to some elements of real option valuation. Includes case studies and examples that will help build your valuation skills Written by Aswath Damodaran, one of today's most respected valuation experts Includes an accompanying iPhone application (iVal) that makes the lessons of the book immediately useable Written with the individual investor in mind, this reliable guide will not only help you value a company quickly, but will also help you make sense of valuations done by others or found in comprehensive equity research reports.

USB Complete - Jan Axelson 2009

Computing: general.

Films of Fact - Tim Boon 2008

Britain has long been recognised for its proud contribution to documentary cinema, yet its tradition of scientific and medical documentaries remains poorly documented. This is the first in-depth history of the genre.

ODROID-XU4 User Manual - Venkat Bommakanti 2016-01-01

Congratulations on purchasing the ODROID-XU4! It is one of the most powerful low-cost Single Board computers available, as well as being an extremely versatile device. Featuring an octa-core Exynos 5422 big.LITTLE processor, advanced Mali GPU, and Gigabit ethernet, it can function as a home theater set-top box, a general purpose computer for web browsing, gaming and socializing, a compact tool for college or office work, a prototyping device for hardware tinkering, a controller for home automation, a workstation for software development, and much more. Some of the modern operating systems that run on the ODROID-XU4 are Ubuntu, Android, Fedora, ARCHLinux, Debian, and OpenELEC, with thousands of free open-source software packages available. The ODROID-XU4 is an ARM device, which is the most widely used architecture for mobile devices and embedded 32-bit computing.

USB 3.0 Technology - Don Anderson 2013

Elements of Quantum Computing - Seiki Akama 2014-07-14

A quantum computer is a computer based on a computational model which uses quantum mechanics, which is a subfield of physics to study phenomena at the micro level. There has been a growing interest on quantum computing in the 1990's and some quantum computers at the experimental level were recently implemented. Quantum computers enable super-speed computation and can solve some important problems whose solutions were regarded impossible or intractable with traditional computers. This book provides a quick introduction to quantum computing for readers who have no backgrounds of both theory of computation and quantum mechanics. "Elements of Quantum Computing" presents the history, theories and engineering applications of quantum computing. The book is suitable to computer scientists, physicists and software engineers.

The Complete Guide to Chain - 1997

VLSI Electronics - Norman G. Einspruch 2014-12-01

VLSI Electronics: Microstructure Science, Volume 3 evaluates trends for the future of very large scale integration (VLSI) electronics and the scientific base that supports its development. This book discusses the

impact of VLSI on computer architectures; VLSI design and design aid requirements; and design, fabrication, and performance of CCD imagers. The approaches, potential, and progress of ultra-high-speed GaAs VLSI; computer modeling of MOSFETs; and numerical physics of micron-length and submicron-length semiconductor devices are also elaborated. This text likewise covers the optical linewidth measurements on photomasks and wafers and effects of materials technology and fabrication tolerances on guided-wave optical communication and signal processing. This volume is recommended for scientists and engineers who wish to become familiar with VLSI electronics, device designers concerned with the fundamental character of and limitations to device performance, systems architects who will be charged with tying VLSI circuits together, and engineers conducting work on the utilization of VLSI circuits in specific areas of application.

[Computer Networks](#) - Piotr Gaj 2016-05-31

This book constitutes the thoroughly refereed proceedings of the 23rd International Conference on Computer Networks, CN 2016, held in Brunów, Poland, in June 2016. The 32 full papers and the 4 short papers presented were carefully reviewed and selected from 72 submissions. They are organized in topical sections on computer networks architectures and protocols, teleinformatics and telecommunications, new technologies, queueing theory, and innovative applications.

SuperSpeed Device Design by Example - John Hyde 2014-09-01

This is a "How-To" book which explains, with hands-on examples, how to design and implement a SuperSpeed USB peripheral that can interface to your hardware using a 32-bit 100MHz bus with standard or custom protocols. The book is based on the Cypress FX3 SuperSpeed Device and the firmware examples are written around a low-cost SuperSpeed Explorer board and a companion CPLD board which are available from www.cypress.com/fx3book. The software examples are written for the Windows operating system and the CPLD examples are written in Verilog. The source code for all of the examples is downloadable from the book web site. If you currently think that SuperSpeed USB design is only for the elite then look inside this book and discover that SuperSpeed technology has now been made accessible to the rest of us!

[USB Complete: The Developer's Guide, Fifth Edition](#) - Jan Axelson 2015-03-01

Developers who design and program USB devices have a new resource in the fifth edition of *USB Complete: The Developer's Guide*. This edition adds an introduction to USB 3.1 and SuperSpeedPlus bus, which offers a 2x increase in bus speed over USB 3.0's SuperSpeed. For designs that don't require USB 3.1's capabilities, the book also covers USB 2.0 technology and applications. *USB Complete Fifth Edition* bridges the gap between the technical specifications and the real world of design and programming. Author Jan Axelson distills the fundamentals of the protocols and guides developers in choosing device hardware, deciding whether to target a USB class driver or another host driver, and writing device firmware and host applications. Example code in Visual C# shows how to detect and access USB devices and how to program and communicate with vendor-defined devices that use the human-interface-device (HID) class driver and Microsoft's WinUSB driver. Also covered are how to use bus power, including new advanced power delivery capabilities, wireless communications for USB devices, and developing embedded hosts, including dual-role USB On-The-Go devices. Programmers and hardware designers can rely on *USB Complete's Fifth Edition* to help get projects up and running quickly. Students and hobbyists will learn how to use the interface built into every PC. Instructors will find inspiration and guidance for class projects.

American Dreamer: A Life of Henry A. Wallace - John C. Culver 2001-09-17

The great politician, agriculturalist, economist, author, and businessman—loved and reviled, and finally now revealed. The great

politician, agriculturalist, economist, author, and businessman—loved and reviled, and finally now revealed. The first full biography of Henry A. Wallace, a visionary intellectual and one of this century's most important and controversial figures. Henry Agard Wallace was a geneticist of international renown, a prolific author, a groundbreaking economist, and a businessman whose company paved the way for a worldwide agricultural revolution. He also held two cabinet posts, served four tumultuous years as America's wartime vice president under FDR, and waged a quixotic campaign for president in 1948. Wallace was a figure of Sphinx-like paradox: a shy man, uncomfortable in the world of politics, who only narrowly missed becoming president of the United States; the scion of prominent Midwestern Republicans and the philosophical voice of New Deal liberalism; loved by millions as the Prophet of the Common Man, and reviled by millions more as a dangerous, misguided radical. John C. Culver and John Hyde have combed through thousands of document pages and family papers, from Wallace's letters and diaries to previously unavailable files sealed within the archives of the Soviet Union. Here is the remarkable story of an authentic American dreamer. A Washington Post Best Book of the Year. 32 pages of b/w photographs. "A careful, readable, sympathetic but commendably dispassionate biography."—Arthur Schlesinger, Jr., Los Angeles Times Book Review "In this masterly work, Culver and Hyde have captured one of the more fascinating figures in American history."—Doris Kearns Goodwin, author of *No Ordinary Time* "Wonderfully researched and very well written...an indispensable document on both the man and the time."—John Kenneth Galbraith "A fascinating, thoughtful, incisive, and well-researched life of the mysterious and complicated figure who might have become president..."—Michael Beschloss, author of *Taking Charge: The Johnson White House Tapes, 1963-1964* "This is a great book about a great man. I can't recall when—if ever—I've read a better biography."—George McGovern "[A] lucid and sympathetic portrait of a fascinating character. Wallace's life reminds us of a time when ideas really mattered."—Evan Thomas, author of *The Very Best Men: The Early Years of the CIA* "Everyone interested in twentieth-century American history will want to read this book."—Robert Dallek, author of *Flawed Giant* "[T]he most balanced, complete, and readable account..."—Walter LaFeber, author of *Inevitable Revolutions* "At long last a lucid, balanced and judicious narrative of Henry Wallace...a first-rate biography."—Douglas Brinkley, author of *The Unfinished Presidency* "A fine contribution to twentieth-century American history."—James MacGregor Burns, author of *Dead Center: Clinton-Gore Leadership and the Perils of Moderation* "[E]minently readable...a captivating chronicle of American politics from the Depression through the 1960s."—Senator Edward M. Kennedy "A formidable achievement...[an] engrossing account."—Kai Bird, author of *The Color of Truth: McGeorge Bundy & William Bundy, Brothers in Arms* "Many perceptions of Henry Wallace, not always favorable, will forever be changed."—Dale Bumpers, former US Senator, Arkansas

Multimedia - Tay Vaughan 1996

Thoroughly updated for new breakthroughs in multimedia; The internationally bestselling *Multimedia: Making it Work* has been fully revised and expanded to cover the latest technological advances in multimedia. You will learn to plan and manage multimedia projects, from dynamic CD-ROMs and DVDs to professional websites. Each chapter includes step-by-step instructions, full-color illustrations and screenshots, self-quizzes, and hands-on projects.

USB Embedded Hosts - Jan Axelson 2011-11-01

Developers who want to access USB devices from their embedded systems will find a helpful resource in *USB Embedded Hosts: The Developer's Guide*. This new book from the author of *USB Complete* shows how small systems can take advantage of the same wealth of USB devices available to conventional PCs. The book begins with a review of USB host communication protocols. Readers then learn which USB host requirements are relaxed for embedded systems and what new requirements some embedded systems must meet. To help in selecting a development platform, the book explores available hardware and software for USB host communications in small systems. The heart of the book focuses on communicating with USB devices. The topics (with example code) include USB drives, keyboards, virtual serial ports, network bridges, mics, speakers, video cameras, and printers, plus devices that don't fit defined USB classes. Also discussed are systems that support both USB host and device functions. The example code is written for the BeagleBoard-xM open development board using a distribution of Linux targeted to small systems. Also covered is how to use Linux commands and utilities to learn about, monitor, and debug communications with USB devices.

The Psychosocial Implications of Disney Movies - Lauren Dundes 2019-07-11

In this volume of 15 articles, contributors from a wide range of disciplines present their analyses of Disney movies and Disney music, which are mainstays of popular culture. The power of the Disney brand has heightened the need for academics to question whether Disney's films and music function as a tool of the Western elite that shapes the views of those less empowered. Given its global reach, how the Walt Disney Company handles the role of race, gender, and sexuality in social structural inequality merits serious reflection according to a number of the articles in the volume. On the other hand, other authors argue that Disney productions can help individuals cope with difficult situations or embrace progressive thinking. The different approaches to the assessment of Disney films as cultural artifacts also vary according to the theoretical perspectives guiding the interpretation of both overt and latent symbolic meaning in the movies. The authors of the 15 articles encourage readers to engage with the material, showcasing a variety of views about the good, the bad, and the best way forward.

Night Speed - Chris Howard 2016-05-03

An addictive new drug fuels superhuman strength and speed in this action-packed sci-fi thriller that will have fans of Scott Westerfeld and Marie Lu on the edge of their seats. Only those young enough can survive tetra, a dangerous drug that creates a pulse-pounding rush of enormous strength and incredible speed. Seventeen-year-old Alana West has been trained to use tetra so she can pursue the young criminals who abuse its power—criminals like the one who nearly killed her kid brother. On tetra, Alana is unstoppable—an explosive blur as she surges through New York City. But with the clock ticking down to her eighteenth birthday, Alana will soon be too old for the rush . . . when just one more dose will prove deadly. Supported only by her steady handler, Tucker, Alana goes undercover, infiltrating an elite gang of breaknecks to stop their supply of the drug. But when Alana gets trapped on the wrong side of the law, she learns the breaknecks are not quite what they seem—especially Ethan, the boy who seems to see the truth inside her. With her dependency on tetra increasing, Alana must decide where her loyalties lie, before the rush ends. Forever.

USB Complete - Jan Axelson 2004

This guide takes the pain out of designing for this popular interface with specific, detailed examples that show how to develop USB devices and the applications that communicate with them. How the USB communicates with the PC, deciding if a project should use a USB interface, choosing a USB controller chip for peripheral design, and determining code with Windows applications are covered in detail.

Computer Architecture and Security - Shuangbao Paul Wang 2013-01-10

The first book to introduce computer architecture for security and provide the tools to implement secure computer systems This book provides the fundamentals of computer architecture for security. It covers a wide range of computer hardware, system software and data concepts from a security perspective. It is essential for computer science and security professionals to understand both hardware and software security solutions to survive in the workplace. Examination of memory, CPU architecture and system implementation Discussion of computer buses and a dual-port bus interface Examples cover a board spectrum of hardware and software systems Design and implementation of a patent-pending secure computer system Includes the latest patent-pending technologies in architecture security Placement of computers in a security fulfilled network environment Co-authored by the inventor of the modern Computed Tomography (CT) scanner Provides website for lecture notes, security tools and latest updates

Illuminae - Amie Kaufman 2015-10-20

For fans of Marie Lu comes the first book in an epic series that bends the sci-fi genre into a new dimension. "A truly beautiful novel that redefines the form." —Victoria Aveyard, bestselling author of *Red Queen* This morning, Kady thought breaking up with Ezra was the hardest thing she'd have to do. This afternoon, her planet was invaded. The year is 2575, and two rival megacorporations are at war over a planet that's little more than a speck at the edge of the universe. Now with enemy fire raining down on them, Kady and Ezra—who are barely even talking to each other—are forced to evacuate with a hostile warship in hot pursuit. But their problems are just getting started. A plague has broken out and is mutating with terrifying results; the fleet's AI may actually be their enemy; and nobody in charge will say what's really going on. As Kady hacks into a web of data to find the truth, it's clear the only person who can help her is the ex-boyfriend she swore she'd never speak to again.

Told through a fascinating dossier of hacked documents—including emails, maps, files, IMs, medical reports, interviews, and more—Illuminae is the first book in a heart-stopping trilogy about lives interrupted, the price of truth, and the courage of everyday heroes. “Prepare yourselves for Illuminae.” —EW.com “[Y]ou’re not in for an ordinary novel experience. . . .” —Bustle.com “A truly interactive experience. . . . A fantastically fun ride.” —MTV.com “[O]ut-of-this-world awesome.” —Kirkus Reviews, starred “[...]stylistically mesmerizing.” —Publishers Weekly, starred “[A]n arresting visual experience.”—Booklist, starred “[A] game-changer.” —Shelf Awareness, starred “Brace yourself. You’re about to be immersed in a mindscape that you’ll never want to leave.” —Marie Lu, bestselling author of the Legend trilogy “Genre: Undefinable. Novel: Unforgettable.” —Kami Garcia, bestselling coauthor of Beautiful Creatures & author of Unbreakable “An exuberant mix of space opera, romance, zombies, hackers, and political thrills.” —Scott Westerfeld, bestselling author of Zeroes and Ugles “Stunningly creative. Smart, funny, and romantic.” —Veronica Rossi, bestselling author of Under the Never Sky “This is one of those rare books that will truly keep your heart pounding.” —Beth Revis, bestselling author of Across the Universe “This book is xxxing awesome.” —Laini Taylor, bestselling author of Daughter of Smoke and Bone

X-Ray Equipment Maintenance and Repairs Workbook for Radiographers and Radiological Technologists - Ian R. McClelland 2004

The X-ray equipment maintenance and repairs workbook is intended to help and guide staff working with, and responsible for, radiographic equipment and installations in remote institutions where the necessary technical support is not available, to perform routine maintenance and minor repairs of equipment to avoid break downs. The book can be used for self study and as a checklist for routine maintenance procedures.

Reinventing the Product - Eric Schaeffer 2019-03-03

Digital technology is simultaneously friend and foe: highly disruptive, yet it cannot be ignored. Companies that fail to make use of it put themselves in the line of fire for disintermediation or even eradication. But digital technology is also the biggest opportunity to reposition incumbent product-making businesses by thinking about how they conceive, make, distribute and support the next generation of goods in the marketplace. Reinventing the Product looks at the ways traditional products are transforming into smart connected products and ecosystem platforms at a rate much faster than most organizations think. Eric Schaeffer and David Sovie show how this reinvention is made possible: by AI and digital technologies, such as IoT sensors, blockchain, advanced analytics, cloud and edge computing. They show how to deliver truly intelligent, and potentially even autonomous, products with the more personalized and compelling experiences that today’s users, consumers and enterprises expect. Reinventing the Product makes a stringent case for companies to rethink their product strategy, their innovation and engineering processes, and the entire culture to build the future generations of successful ‘living products’. Featuring case studies from global organizations such as Faurecia, Signify, Symmons and Haier and interviews with thought leaders and business executives from top companies including Amazon, ABB, Tesla, Samsung and Google, this book provides practical advice for product-making companies as they embark on, or accelerate, their digitization journey.

Amtrak Reauthorization - United States. Congress. Senate. Committee on Commerce, Science, and Transportation. Subcommittee on Surface Transportation 1981

User Guides, Manuals, and Technical Writing - Adrian Wallwork 2014-06-19

This book is intended for anyone whose job involves writing formal documentation. It is aimed at non-native speakers of English, but should also be of use for native speakers who have no training in technical writing. Technical writing is a skill that you can learn and this book outlines some simple ideas for writing clear documentation that will reflect well on your company, its image and its brand. The book has four parts: Structure and Content: Through examples, you will learn best practices in writing the various sections of a manual and what content to include. Clear Unambiguous English: You will learn how to write short clear sentences and paragraphs whose meaning will be immediately clear to the reader. Layout and Order Information: Here you will find guidelines on style issues, e.g., headings, bullets, punctuation and capitalization. Typical Grammar and Vocabulary Mistakes: This section is divided alphabetically and covers grammatical and vocabulary issues

that are typical of user manuals.

Human Enhancement Technologies and Our Merger with Machines - Woodrow Barfield 2021-06-15

A cross-disciplinary approach is offered to consider the challenge of emerging technologies designed to enhance human bodies and minds. Perspectives from philosophy, ethics, law, and policy are applied to a wide variety of enhancements, including integration of technology within human bodies, as well as genetic, biological, and pharmacological modifications. Humans may be permanently or temporarily enhanced with artificial parts by manipulating (or reprogramming) human DNA and through other enhancement techniques (and combinations thereof). We are on the cusp of significantly modifying (and perhaps improving) the human ecosystem. This evolution necessitates a continuing effort to re-evaluate current laws and, if appropriate, to modify such laws or develop new laws that address enhancement technology. A legal, ethical, and policy response to current and future human enhancements should strive to protect the rights of all involved and to recognize the responsibilities of humans to other conscious and living beings, regardless of what they look like or what abilities they have (or lack). A potential ethical approach is outlined in which rights and responsibilities should be respected even if enhanced humans are perceived by non-enhanced (or less-enhanced) humans as “no longer human” at all. Computer Organization & Architecture 7e - Stallings 2008-02

High-Speed Digital System Design - Anatoly Belous 2019-11-13

This book describes for readers the entire, interconnected complex of theoretical and practical aspects of designing and organizing the production of various electronic devices, the general and main distinguishing feature of which is the high speed of processing and transmitting of digital signals. The authors discuss all the main stages of design - from the upper system level of the hierarchy (telecommunications system, 5G mobile communications) to the lower level of basic semiconductor elements, printed circuit boards. Since the developers of these devices in practice deal with distorted digital signals that are transmitted against a background of interference, the authors not only explain the physical nature of such effects, but also offer specific solutions as to how to avoid such parasitic effects, even at the design stage of high-speed devices.

Computer Architecture and Organization - Shuangbao Paul Wang 2021-11-29

In today’s workplace, computer and cybersecurity professionals must understand both hardware and software to deploy effective security solutions. This book introduces readers to the fundamentals of computer architecture and organization for security, and provides them with both theoretical and practical solutions to design and implement secure computer systems. Offering an in-depth and innovative introduction to modern computer systems and patent-pending technologies in computer security, the text integrates design considerations with hands-on lessons learned to help practitioners design computer systems that are immune from attacks. Studying computer architecture and organization from a security perspective is a new area. There are many books on computer architectures and many others on computer security. However, books introducing computer architecture and organization with security as the main focus are still rare. This book addresses not only how to secure computer components (CPU, Memory, I/O, and network) but also how to secure data and the computer system as a whole. It also incorporates experiences from the author’s recent award-winning teaching and research. The book also introduces the latest technologies, such as trusted computing, RISC-V, QEMU, cache security, virtualization, cloud computing, IoT, and quantum computing, as well as other advanced computing topics into the classroom in order to close the gap in workforce development. The book is chiefly intended for undergraduate and graduate students in computer architecture and computer organization, as well as engineers, researchers, cybersecurity professionals, and middleware designers.

The Telecommunications Handbook - Jyrki T. J. Penttinen 2015-03-16

THE TELECOMMUNICATIONS HANDBOOK THE TELECOMMUNICATIONS HANDBOOK ENGINEERING GUIDELINES FOR FIXED, MOBILE AND SATELLITE SYSTEMS Taking a practical approach, The Telecommunications Handbook examines the principles and details of all the major and modern telecommunications systems currently available to industry and to end-users. It gives essential information about usage, architectures, functioning, planning, construction, measurements and optimization. The structure of the book is modular, giving both overall descriptions of the architectures and

functionality of typical use cases, as well as deeper and practical guidelines for telecom professionals. The focus of the book is on current and future networks, and the most up-to-date functionalities of each network are described in sufficient detail for deployment purposes. The contents include an introduction to each technology, its evolution path, feasibility and utilization, solution and network architecture, and technical functioning of the systems (signaling, coding, different modes for channel delivery and security of core and radio system). The planning of the core and radio networks (system-specific field test measurement guidelines, hands-on network planning advices and suggestions for parameter adjustments) and future systems are also described. With contributions from specialists in both industry and academia, the book bridges the gap between communications in the academic context and the practical knowledge and skills needed to work in the telecommunications industry.

Computer Organization - V. Carl Hamacher 1990

Sensor Technologies - Michael J. McGrath 2014-01-23

Sensor Technologies: Healthcare, Wellness and Environmental Applications explores the key aspects of sensor technologies, covering wired, wireless, and discrete sensors for the specific application domains of healthcare, wellness and environmental sensing. It discusses the social, regulatory, and design considerations specific to these domains. The book provides an application-based approach using real-world examples to illustrate the application of sensor technologies in a practical and experiential manner. The book guides the reader from the formulation of the research question, through the design and validation process, to the deployment and management phase of sensor applications. The processes and examples used in the book are primarily based on research carried out by Intel or joint academic research programs. "Sensor Technologies: Healthcare, Wellness and Environmental Applications provides an extensive overview of sensing technologies and their applications in healthcare, wellness, and environmental monitoring. From sensor hardware to system applications and case studies, this book gives readers an in-depth understanding of the technologies and how they can be applied. I would highly recommend it to students or researchers who are interested in wireless sensing technologies and the associated applications." Dr. Benny Lo Lecturer, The Hamlyn Centre, Imperial College of London "This timely addition to the literature on sensors covers the broad complexity of sensing, sensor types, and the vast range of existing and emerging applications in a very clearly written and accessible manner. It is particularly good at capturing the exciting possibilities that will occur as sensor networks merge with cloud-based 'big data' analytics to provide a host of new applications that will impact directly on the individual in ways we cannot fully predict at present. It really brings this home through the use of carefully chosen case studies that bring the overwhelming concept of 'big data' down to the personal level of individual life and health." Dermot Diamond Director, National Centre for Sensor Research, Principal Investigator, CLARITY Centre for Sensor Web Technologies, Dublin City University "Sensor Technologies: Healthcare, Wellness and Environmental Applications takes the reader on an end-to-end journey of sensor technologies, covering the fundamentals from an engineering perspective, introducing how the data gleaned can be both processed and visualized, in addition to offering exemplar case studies in a number of application domains. It is a must-read for those studying any undergraduate course that involves sensor technologies. It also provides a thorough foundation for those involved in the research and development of applied sensor systems. I highly recommend it to any engineer who wishes to broaden their knowledge in this area!" Chris Nugent Professor of Biomedical Engineering, University of Ulster

Embedded Software - Colin Walls 2012-05-01

As the embedded world expands, developers must have a strong grasp of many complex topics in order to make faster, more efficient and more powerful microprocessors to meet the public's growing demand. *Embedded Software: The Works* covers all the key subjects embedded engineers need to understand in order to succeed, including Design and Development, Programming, Languages including C/C++, and UML, Real Time Operating Systems Considerations, Networking, and much more. New material on Linux, Android, and multi-core gives engineers the up-to-date practical know-how they need in order to succeed. Colin Walls draws upon his experience and insights from working in the industry, and covers the complete cycle of embedded software development: its design, development, management, debugging procedures, licensing, and reuse. For those new to the field, or for

experienced engineers looking to expand their skills, Walls provides the reader with detailed tips and techniques, and rigorous explanations of technologies. Key features include: New chapters on Linux, Android, and multi-core - the cutting edge of embedded software development! Introductory roadmap guides readers through the book, providing a route through the separate chapters and showing how they are linked About the Author Colin Walls has over twenty-five years experience in the electronics industry, largely dedicated to embedded software. A frequent presenter at conferences and seminars and author of numerous technical articles and two books on embedded software, he is a member of the marketing team of the Mentor Graphics Embedded Software Division. He writes a regular blog on the Mentor website (blogs.mentor.com/colinwalls). New chapters on Linux, Android, and multi-core - the cutting edge of embedded software development! Introductory roadmap guides readers through the book, providing a route through the separate chapters and showing how they are linked

Practical C++ Programming - Steve Oualline 2003

Practical C++ Programming thoroughly covers: C++ syntax · Coding standards and style · Creation and use of object classes · Templates · Debugging and optimization · Use of the C++ preprocessor · File input/output.

High-speed Circuit Board Signal Integrity - Stephen C. Thierauf 2004

This leading-edge circuit design resource offers the knowledge needed to quickly pinpoint transmission problems that can compromise circuit design. Discusses both design and debug issues at gigabit per second data rates.

[China's High-Speed Rail Development](#) - Martha Lawrence 2019-06-24

Over the past decade, China has built 25,000 km of dedicated high-speed railway—more than the rest of the world combined. What can we learn from this remarkable experience? *China's High-Speed Rail Development* examines the Chinese experience to draw lessons for countries considering investing in high-speed rail. The report scrutinizes the planning and delivery mechanisms that enabled the rapid construction of the high-speed rail system. It highlights the role of long-term planning, consistent plan execution, and a joint venture structure that ensures active participation of provincial and local governments in project planning and financing. Traffic on China's high-speed trains has grown to 1.7 billion passengers a year. The study examines the characteristics of the markets for which high-speed rail is competitive in China. It discusses the pricing and service design considerations that go into making high-speed rail services competitive with other modes and factors such as good urban connectivity that make the service attractive to customers. One of the most remarkable aspects of the Chinese experience is the rapid pace of high-quality construction. The report looks at the role of strong capacity development within and cooperation among China Railway Corporation, rail manufacturers, universities, research institutions, laboratories, and engineering centers that allowed for rapid technological advancement and localization of technology. It describes the project delivery structures and incentives for delivering quality and timely results. Finally, the report analyzes the financial and economic sustainability of the investment in high-speed rail. It finds that a developing country can price high-speed rail services affordably and still achieve financial viability, but this requires very high passenger density. Economic viability similarly depends on high passenger density.

[The Future of Computing Performance](#) - National Research Council 2011-04-21

The end of dramatic exponential growth in single-processor performance marks the end of the dominance of the single microprocessor in computing. The era of sequential computing must give way to a new era in which parallelism is at the forefront. Although important scientific and engineering challenges lie ahead, this is an opportune time for innovation in programming systems and computing architectures. We have already begun to see diversity in computer designs to optimize for such considerations as power and throughput. The next generation of discoveries is likely to require advances at both the hardware and software levels of computing systems. There is no guarantee that we can make parallel computing as common and easy to use as yesterday's sequential single-processor computer systems, but unless we aggressively pursue efforts suggested by the recommendations in this book, it will be "game over" for growth in computing performance. If parallel programming and related software efforts fail to become widespread, the development of exciting new applications that drive the computer industry will stall; if such innovation stalls, many other parts of the economy will follow suit. *The Future of Computing Performance*

describes the factors that have led to the future limitations on growth for single processors that are based on complementary metal oxide semiconductor (CMOS) technology. It explores challenges inherent in parallel computing and architecture, including ever-increasing power consumption and the escalated requirements for heat dissipation. The book delineates a research, practice, and education agenda to help overcome these challenges. The Future of Computing Performance will guide researchers, manufacturers, and information technology professionals in the right direction for sustainable growth in computer performance, so that we may all enjoy the next level of benefits to society.

Drawing Flowers - Jill Winch 2018-01-16

Graceful, beautiful and subtle, flowers are among the most delightful of subjects for artists to draw. This fresh, accessible book is aimed at those who want to translate their love of the natural world into vivid, accurate illustrations. Drawing Flowers is packed with examples and exercises across the full floral range, from simple structures, such as tulips, to more complex configurations, such as sunflowers, and compositions involving groups of flowers. Illustrated throughout by award-winning botanical artist Jill Winch, the book offers clear, concise instruction in the techniques of flower drawing. It also gives advice on practical considerations such as how best to position flowers for drawing, how to prevent them wilting and how to use a microscope to understand their structure.

USB Design by Example - John Hyde 2001

This unique guide goes beyond all the USB specification overviews to provide designers with the expert knowledge and skills they need to design and implement USB I/O devices.

System on Chip Interfaces for Low Power Design - Sanjeeb Mishra 2015-11-17

System on Chip Interfaces for Low Power Design provides a top-down understanding of interfaces available to SoC developers, not only the underlying protocols and architecture of each, but also how they interact and the tradeoffs involved. The book offers a common context to help understand the variety of available interfaces and make sense of technology from different vendors aligned with multiple standards. With particular emphasis on power as a factor, the authors explain how each interface performs in various usage scenarios and discuss their advantages and disadvantages. Readers learn to make educated decisions on what interfaces to use when designing systems and gain insight for innovating new/custom interfaces for a subsystem and their potential impact. Provides a top-down guide to SoC interfaces for memory, multimedia, sensors, display, and communication. Explores the underlying protocols and architecture of each interface with multiple examples. Guides through competing standards and explains how different interfaces might interact or interfere with each other. Explains challenges in system design, validation, debugging and their impact on development.

Evaluation: an Introduction to Research Design - Janet Moursund 1973

The Future of Business - Rohit Talwar 2015-03-15

The Future of Business explores how the commercial world is being transformed by the complex interplay between social, economic and political shifts, disruptive ideas, bold strategies and breakthroughs in science and technology. Over 60 contributors from 21 countries explore how the business landscape will be reshaped by factors as diverse as the modification of the human brain and body, 3D printing, alternative energy sources, the reinvention of government, new business models, artificial intelligence, blockchain technology, and the potential emergence of the Star Trek economy.