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6E5 - OLSON ZAYNE

Buying a new PC usually means settling for a computer that doesn't match your budget or your needs. And it's often an exercise in frustration. So, what's the solution? Building your own, of course. Assembling your own computer isn't as scary, complicated, or expensive as it sounds. All you really need is a good guide to show you how. *Build Your Own Gaming Computer: A Step-by-Step Illustrated Guide to Assembling Your Ultimate High-Performance PC* will walk you through each of the individual stages of custom-building a PC from start to finish. A practical, hands-on guide that's written in easy-to-understand layman's terms, this illustrated manual enables even novice computer users to build the PC of their dreams. Topics covered include: What a computer needs for basic operation How to shop for components How to avoid costly compatibility issues Step-by-step assembly instructions Choosing and installing an operating system Overclocking basics *Build Your Own Gaming Computer: A Step-by-Step Illustrated Guide to Assembling Your Ultimate High-Performance PC* also offers color photos highlighting key steps in the assembly process, helpful hints and tips, and a glossary of terms that every computer user should know. Stop wasting time and money on pre-built computers that don't deliver the functionality or performance you want. Instead, use this guide to create a PC that's tailored just for you.

Compiles programming hacks intended to help computer programmers build more efficient software, in an updated edition that covers cyclic redundancy checking and new algorithms and that includes exercises with answers.

Authored by two of the leading authorities in the field, this guide offers readers the knowledge and skills needed to achieve proficiency with embedded software.

In today's technological age, computer literacy is important for everyone, and now learning the basics is easier than ever. This title engages students by combining a unique teaching approach with rich companion media.

Bits, bytes, RAM, CPUs, hard drives and dvd drives. Master the geeky acronyms and simplify computer hardware & terminology with ease. This book is great for beginners, a basic computing class, or someone looking to buy a computer.

This book thoroughly explains how computers work. It starts by fully examining a NAND gate, then goes on to build every piece and part of a small, fully operational computer. The necessity and use of codes is presented in parallel with the appropriate pieces of hardware. The book can be easily understood by anyone whether they have a technical background or not. It could be used as a textbook.

Includes Pentium III and MMX processors, fingerprint and voice recognition, notebook and palm computers, MP3 music and digital audio ..."

Computers are great-when they work. When they don't, it's an inconvenience at best and a nightmare at worst. *How Computers Work and What to Do When They Don't* explains, in simple English, how the computer you use every day operates and what you can do when it's not operating the way you want it to. Inside, you will learn about the basic components of computer hardware and software, the Seven Principles of Solving Problems that you can use to solve any computer conundrum, and what you can do today to prevent problems from happening in the first place. You will also learn how to solve many existing issues, including sluggish performance and virus infections. When it's time to buy a new computer, this book explains the different options available and helps you determine what's best for your needs and within your budget. *How Computers Work and What to Do When They Don't* includes over 30 high-resolution images to explain computer parts, software, and how-to procedures. It also contains two appendices with guides for resolving many common technical issues and trustworthy resources for resolving additional problems. This book is written for users like you! Whether you want to save money by solving your own tech issues, rejuvenate a lethargic computer, or simply learn more about how computers function, *How Computers Work and What to Do When They Don't* is an invaluable resource for all things technology!

If you want a book that's easy to follow and will show you how to build a gaming computer from start to finish, then this is the one for you. This book is written in an 'easy to understand' manner that will take you through all computer parts individually to help you choose each computer component. There's also help throughout this book on choosing quality computer components and a guide on picking out a version of Windows. Finally, there's a guide on how to build a gaming computer and how to install Windows 10. So let's not hang around any longer... let's get started.

Foundations of Wireless and Electronics, 10th Edition covers the cathode-ray and microwave tubes; modern pulse methods; f.m. detectors; basic processes of transmission; and reception, computers, and non-sinusoidal signal amplification. The book starts by giving a general overview of a complete electronic system, electricity and circuits, capacitance, and inductance. The text also discusses alternating currents (a.c.), including the frequency and phase of a.c.; the capacitance and inductance in a.c. circuits; and the capacitance and inductance in a series. Diodes, triode, transistor equivalent circuits, and a suitable working point are also considered. The book describes oscillation, transmission lines, radiation and antennas, and audio-frequency amplification. The super heterodyne principle, radio- and intermediate-frequency amplification, electronic waveform generators, and switches are also encompassed. The text will be useful to electronics engineers, electricians, and computer engineers.

Computers are the most complex machines that have ever been created. This book will tell you how they work, and no technical knowledge is required. It explains in great detail the operation of a simple but functional computer. Although transistors are mentioned, relays are used in the example circuitry for simplicity. Did you ever wonder what a bit, a pixel, a latch, a word (of memory), a data bus, an address bus, a memory, a register, a processor, a timing diagram, a clock (of a processor), an instruction, or machine code is? Unlike most explanations of how computers work which are a lot of analogies or require a background in electrical engineering, this book will tell you precisely what each of them is and how each of them works without requiring any previous knowledge of computers, programming, or electronics. This book starts out very simple and gets more complex as it goes along, but everything is explained. The processor and memory are mainly covered.

Explains the structure and functions of microchips, hard drives, CD-ROMs, magneto-optical drives, tape drives, keyboards, serial ports, mice, modems, scanners, LANs, and printers

Computer: A History of the Information Machine traces the history of the computer and shows how business and government were the first to explore its unlimited, information-processing potential. Old-fashioned entrepreneurship combined with scientific know-how inspired now famous computer

engineers to create the technology that became IBM. Wartime needs drove the giant ENIAC, the first fully electronic computer. Later, the PC enabled modes of computing that liberated people from room-sized, mainframe computers. This third edition provides updated analysis on software and computer networking, including new material on the programming profession, social networking, and mobile computing. It expands its focus on the IT industry with fresh discussion on the rise of Google and Facebook as well as how powerful applications are changing the way we work, consume, learn, and socialize. *Computer* is an insightful look at the pace of technological advancement and the seamless way computers are integrated into the modern world. Through comprehensive history and accessible writing, *Computer* is perfect for courses on computer history, technology history, and information and society, as well as a range of courses in the fields of computer science, communications, sociology, and management.

A complete and balanced reference, *Public Budgeting Systems, Eighth Edition* surveys the current state of budgeting throughout all levels of the United States government. The text emphasizes methods by which financial decisions are reached within a system as well as ways in which different types of information are used in budgetary decision-making. It also stresses the use of program information, since, for decades, budget reforms have sought to introduce greater program considerations into financial decisions. This updated text includes more cases studies and practical information, figures and charts to make the information more accessible, as well as additional student problems. Using this text, students will gain a first-rate understanding of methods by which financial decisions are reached within a system, and how different types of information are used in budgetary decision-making.

An approachable, hands-on guide to understanding how computers work, from low-level circuits to high-level code. *How Computers Really Work* is a hands-on guide to the computing ecosystem: everything from circuits to memory and clock signals, machine code, programming languages, operating systems, and the internet. But you won't just read about these concepts, you'll test your knowledge with exercises, and practice what you learn with 41 optional hands-on projects. Build digital circuits, craft a guessing game, convert decimal numbers to binary, examine virtual memory usage, run your own web server, and more. Explore concepts like how to: • Think like a software engineer as you use data to describe a real world concept • Use Ohm's and Kirchhoff's laws to analyze an electrical circuit • Think like a computer as you practice binary addition and execute a program in your mind, step-by-step The book's projects will have you translate your learning into action, as you: • Learn how to use a multimeter to measure resistance, current, and voltage • Build a half adder to see how logical operations in hardware can be combined to perform useful functions • Write a program in assembly language, then examine the resulting machine code • Learn to use a debugger, disassemble code, and hack a program to change its behavior without changing the source code • Use a port scanner to see which internet ports your computer has open • Run your own server and get a solid crash course on how the web works And since a picture is worth a thousand bytes, chapters are filled with detailed diagrams and illustrations to help clarify technical complexities. Requirements: The projects require a variety of hardware - electronics projects need a breadboard, power supply, and various circuit components; software projects are performed on a Raspberry Pi. Appendix B contains a complete list. Even if you skip the projects, the book's major concepts are clearly presented in the main text.

Completely updated, *Tomorrow's Technology and You*, provides you with an understanding of information technology so you can successfully navigate change and advance into the future. Today we're standing at the junction of three powerful and rapidly evolving technological forces: computers, communications, and digital entertainment. Computer technology is showing up in everything from automobiles to home appliances to telephones to televisions, and the lines that separate these machines are fading. This digital convergence is rapidly—and radically—altering the world in which we live. 013374731X / 9780133747317 *Digital Planet: Tomorrow's Technology and You, Complete & myitlab -- Access Code -- for Office 2010 Package* Package consists of: 0132091534 / 9780132091534 *Digital Planet: Tomorrow's Technology and You, Complete* 0133481697 / 9780133481693 myitlab -- Access Code -- for Office 2010

Explains the structure and functions of microprocessors, hard drives, disk drives, tape drives, keyboards, CD-ROM, multimedia sound and video, serial ports, mice, modems, scanners, LANs, and printers.

Management Information Systems provides comprehensive and integrative coverage of essential new technologies, information system applications, and their impact on business models and managerial decision-making in an exciting and interactive manner. The twelfth edition focuses on the major changes that have been made in information technology over the past two years, and includes new opening, closing, and Interactive Session cases.

This title gives students an integrated and rigorous picture of applied computer science, as it comes to play in the construction of a simple yet powerful computer system.

For the first time in history, eradicating world poverty is within our reach. Yet around the world, a billion people struggle to live each day on less than many of us pay for bottled water. In *The Life You Can Save*, Peter Singer uses ethical arguments, illuminating examples, and case studies of charitable giving to show that our current response to world poverty is not only insufficient but morally indefensible. *The Life You Can Save* teaches us to be a part of the solution, helping others as we help ourselves.

Two strengths distinguish this textbook from others. One is its presentation of subjects in the contexts wherein they occur. The other is its use of current events. Other improvements have shortened and simplified chapters, increased the numbers and types of pedagogical supplements, and expanded the international appeal of examples.

The updated edition of this award-winning, national bestseller contains information on the latest technologies including multimedia and the Internet. This colorfully illustrated computer anatomy book is filled with basic and insightful information on the workings of a computer and the advanced technology that is making the computer a part of everyday life.

The *Anarchist Cookbook* will shock, it will disturb, it will provoke. It places in historical perspective an era when "Turn on, Burn down, Blow up" are revolutionary slogans of the day. Says the author "This book... is not written for the members of fringe political groups, such as the Weatherman, or The Minutemen. Those radical groups don't need this book. They already know everything that's in here. If the real people of America, the silent majority, are going to survive, they must educate themselves. That is the purpose of this book." In what the author considers a survival guide, there is explicit infor-

mation on the uses and effects of drugs, ranging from pot to heroin to peanuts. There is detailed advice concerning electronics, sabotage, and surveillance, with data on everything from bugs to scramblers. There is a comprehensive chapter on natural, non-lethal, and lethal weapons, running the gamut from cattle prods to sub-machine guns to bows and arrows.

The Radio Station offers a concise and insightful guide to all aspects of radio broadcasting, streaming, and podcasting. This book's tenth edition continues its long tradition of guiding readers to a solid understanding of who does what, when, and why in a professionally managed station. This new edition explains what "radio" in America has been, where it is today, and where it is going, covering the basics of how programming is produced, financed, delivered and promoted via terrestrial and satellite broadcasting, streaming and podcasting. John Allen Hendricks and Bruce Mims examine radio and its future within a framework of existing and emerging technologies. The companion website is new revised with content for instructors, including an instructors' manual and test questions. Students will discover an expanded library of audio interviews with leading industry professionals in addition to practice quizzes and links to additional resources.

Reliability, Maintainability and Risk: Practical Methods for Engineers, Eighth Edition, discusses tools and techniques for reliable and safe engineering, and for optimizing maintenance strategies. It emphasizes the importance of using reliability techniques to identify and eliminate potential failures early in the design cycle. The focus is on techniques known as RAMS (reliability, availability, maintainability, and safety-integrity). The book is organized into five parts. Part 1 on reliability parameters and costs traces the history of reliability and safety technology and presents a cost-effective approach to quality, reliability, and safety. Part 2 deals with the interpretation of failure rates, while Part 3 focuses on the prediction of reliability and risk. Part 4 discusses design and assurance techniques; review and testing techniques; reliability growth modeling; field data collection and feedback; predicting and demonstrating repair times; quantified reliability maintenance; and systematic failures. Part 5 deals with legal, management and safety issues, such as project management, product liability, and safety legislation. 8th edition of this core reference for engineers who deal with the design or operation of any safety critical systems, processes or operations. Answers the question: how can a defect that costs less than \$1000 dollars to identify at the process design stage be prevented from escalating to a \$100,000 field defect, or a \$1m+ catastrophe Revised throughout, with new examples, and standards, including must have material on the new edition of global functional safety standard IEC 61508, which launches in 2010

¿ CLEAR & CONCISE: Tight case editing, focused questions, and topical problems direct students' attention to the most critical issues. The book covers the full sweep of the subject, but is still short enough that the core topics can be taught in a 3-credit survey course. ¿ UP-TO-DATE COVERAGE: The seventh edition features five new principal cases, along with numerous new and revised notes and questions. New cases deal with international injunctions, free speech rights to use the Internet, compelled decryption, trademarks and search engines, and algorithmic accountability. Several sections have been tightened up and older material has been cut, resulting in a streamlined reading experience. ¿ TECHNICAL AND HISTORICAL NOTES: Mini-essays throughout the book provide the essential technical background needed to make sense of computer and Internet technologies. Where modern doctrine has important historical roots (e.g., network neutrality and telecommunications regulation), the book gives the necessary context.

Ever wonder how your office computer network works? Or how the Ethernet card inside your computer connects you to that network or to the Internet? "How Networks Work" will give you a thorough, detailed explanation of the inner-workings of network systems without getting you caught up in network jargon. Learn the basic principles of networking and how those principles work inside pieces of network equipment. Complete with illustrations to show how things work together, this latest edition also includes information on the newest technologies, including VoIP, wireless networks, broadband and more.

The Internet Book, Fifth Edition explains how computers communicate, what the Internet is, how the Internet works, and what services the Internet offers. It is designed for readers who do not have a strong technical background — early chapters clearly explain the terminology and concepts needed to understand all the services. It helps the reader to understand the technology behind the Internet, appreciate how the Internet can be used, and discover why people find it so exciting. In addition, it explains the origins of the Internet and shows the reader how rapidly it has grown. It also provides information on how to avoid scams and exaggerated marketing claims. The first section of the book introduces communication system concepts and terminology. The second section reviews the history of the Internet and its incredible growth. It documents the rate at which the digital revolution occurred, and provides background that will help readers appreciate the significance of the underlying design. The third section describes basic Internet technology and capabilities. It examines how Internet hardware is organized and how software provides communication. This section provides the foundation for later chapters, and will help readers ask good questions and make better decisions when salespeople offer Internet products and services. The final section describes application services currently available on the Internet. For each service, the book explains both what the service offers and how the service works. About the Author Dr. Douglas Comer is a Distinguished Professor at Purdue University in the departments of Computer Science and Electrical and Computer Engineering. He has created and enjoys teaching undergraduate and graduate courses on computer networks and Internets, operating systems, computer architecture, and computer software. One of the researchers who contributed to the Internet as it was being formed in the late 1970s and 1980s, he has served as a member of the Internet Architecture Board, the group responsible for guiding the Internet's development. Prof. Comer is an internationally recognized expert on computer networking, the TCP/IP protocols, and the Internet, who presents lectures to a wide range of audiences. In addition to research articles, he has written a series of textbooks that describe the technical details of the Internet. Prof. Comer's books have been translated into many languages, and are used in industry as well as computer science, engineering, and business departments around the world. Prof. Comer joined the Internet project in the late 1970s, and has had a high-speed Internet connection to his home since 1981. He wrote this book as a response to everyone who has asked him for an explanation of the Internet that is both technically correct and easily understood by anyone. An Internet enthusiast, Comer displays INTRNET on the license plate of his car.

One of the most cited books in physics of all time, Quantum Computation and Quantum Information remains the best textbook in this exciting field of science. This 10th anniversary edition includes an

introduction from the authors setting the work in context. This comprehensive textbook describes such remarkable effects as fast quantum algorithms, quantum teleportation, quantum cryptography and quantum error-correction. Quantum mechanics and computer science are introduced before moving on to describe what a quantum computer is, how it can be used to solve problems faster than 'classical' computers and its real-world implementation. It concludes with an in-depth treatment of quantum information. Containing a wealth of figures and exercises, this well-known textbook is ideal for courses on the subject, and will interest beginning graduate students and researchers in physics, computer science, mathematics, and electrical engineering.

Pounder's Marine Diesel Engines and Gas Turbines, Tenth Edition, gives engineering cadets, marine engineers, ship operators and managers insights into currently available engines and auxiliary equipment and trends for the future. This new edition introduces new engine models that will be most commonly installed in ships over the next decade, as well as the latest legislation and pollutant emissions procedures. Since publication of the last edition in 2009, a number of emission control areas (E-CAs) have been established by the International Maritime Organization (IMO) in which exhaust emissions are subject to even more stringent controls. In addition, there are now rules that affect new ships and their emission of CO2 measured as a product of cargo carried. Provides the latest emission control technologies, such as SCR and water scrubbers Contains complete updates of legislation and pollutant emission procedures Includes the latest emission control technologies and expands upon remote monitoring and control of engines

We use software every day to perform all kinds of magical, powerful tasks. It's the force behind stunning CGI graphics, safe online shopping, and speedy Google searches. Software drives the modern world, but its inner workings remain a mystery to many. How Software Works explains how computers perform common-yet-amazing tasks that we take for granted every day. Inside you'll learn: -How data is encrypted -How passwords are used and protected -How computer graphics are created -How video is compressed for streaming and storage -How data is searched (and found) in huge databases -How programs can work together on the same problem without conflict -How data travels over the Internet How Software Works breaks down these processes with patient explanations and intuitive diagrams so that anyone can understand—no technical background is required, and you won't be reading through any code. In plain English, you'll examine the intricate logic behind the technologies you constantly use but never understood. If you've ever wondered what really goes on behind your computer screen, How Software Works will give you fascinating look into the software all around you.

Find out what goes on behind the screen, beneath the keyboard and inside the electronic "brain" of a computer.

Materials Science for Dentistry has established itself as a standard reference for undergraduate and postgraduate courses in dentistry. It provides a fundamental understanding of the materials on which dentistry depends, covering those aspects of structure and chemistry which govern the behaviour and performance of materials in use. Particular materials discussed include gypsum, polymers, acrylic, cements, waxes, porcelain and metals. Other chapters review topics such as surfaces, corrosion, mixing, casting, cutting and bonding as well as mechanical testing. This edition, which adds a chapter on further aspects of mechanical testing, has been extensively revised with, for example, new material on condensation silicone and phosphate-bonded investment chemistries, mixing, MTATM and alternative radiographic imaging techniques. Now in its ninth edition, Materials Science for Dentistry continues its reputation as the most authoritative available reference for students of dentistry. It is also a valuable resource for academics and practitioners in the field. Offers a fundamental understanding of the materials on which dentistry depends, covering their structure and chemistry Extensively revised to keep it up-to-date with the latest developments This new edition continues its reputation as the most authoritative reference on dentistry

Have you ever asked yourself how the inventions, gadgets, and devices that surround us actually work? Discover the hidden workings of everyday technology with this graphic guide. How Technology Works demystifies the machinery that keeps the modern world going, from simple objects such as zip fasteners and can openers to the latest, most sophisticated devices of the information age, including smartwatches, personal digital assistants, and driverless cars. It includes inventions that have changed the course of history, like the internal combustion engine, as well as technologies that might hold the key to our future survival, including solar cells and new kinds of farming to feed a growing population. Throughout the book, step-by-step explanations are supported by simple and original graphics that take devices apart and show you how they work. The opening chapter explains principles that underpin lots of devices, from basic mechanics to electricity to digital technology. From there, devices are grouped by application--such as the home, transportation, and computing---making them easy to find and placing similar devices side by side. How Technology Works is perfect for anyone who didn't have training in STEM subjects at school or is simply curious about how the modern world works.

How Hansel and Gretel, Sherlock Holmes, the movie Groundhog Day, Harry Potter, and other familiar stories illustrate the concepts of computing. Picture a computer scientist, staring at a screen and clicking away frantically on a keyboard, hacking into a system, or perhaps developing an app. Now delete that picture. In Once Upon an Algorithm, Martin Erwig explains computation as something that takes place beyond electronic computers, and computer science as the study of systematic problem solving. Erwig points out that many daily activities involve problem solving. Getting up in the morning, for example: You get up, take a shower, get dressed, eat breakfast. This simple daily routine solves a recurring problem through a series of well-defined steps. In computer science, such a routine is called an algorithm. Erwig illustrates a series of concepts in computing with examples from daily life and familiar stories. Hansel and Gretel, for example, execute an algorithm to get home from the forest. The movie Groundhog Day illustrates the problem of unsolvability; Sherlock Holmes manipulates data structures when solving a crime; the magic in Harry Potter's world is understood through types and abstraction; and Indiana Jones demonstrates the complexity of searching. Along the way, Erwig also discusses representations and different ways to organize data; "intractable" problems; language, syntax, and ambiguity; control structures, loops, and the halting problem; different forms of recursion; and rules for finding errors in algorithms. This engaging book explains computation accessibly and shows its relevance to daily life. Something to think about next time we execute the algorithm of getting up in the morning.

Takes students and researchers on a tour through some of the deepest ideas of maths, computer science and physics.