Expected Value And Variance Dartmouth College

Our goal in this project is to gain a better empirical understanding of the international financial implications of currency movements. To this end, we construct a database of international currency exposures for a large panel of countries over 1990-2004. We show that trade-weighted exchange rate indices are insufficient to understand the financial impact of currency movements. Further, we demonstrate that many developing countries hold short foreign-currency positions, leaving them open to negative valuation effects when the domestic currency depreciates. However, we also show that many of these countries have substantially reduced their foreign currency exposure over the last decade. Last, we show that our currency measure has high explanatory power for the valuation term in net foreign asset dynamics: exchange rate valuation shocks are sizable, not quickly reversed and may entail substantial wealth shocks.

Praise for the First Edition "This book will serve to greatly complement the growing number of texts dealing with mixed models, and I highly recommend including it in one's personal library." —Journal of the American Statistical Association Mixed modeling is a crucial area of statistics, enabling the analysis of clustered and longitudinal data. Mixed Models: Theory and Applications with R, Second Edition fills a gap in existing literature between mathematical and applied statistical books by presenting a powerful examination of mixed model theory and application with special attention given to the implementation in R. The new edition provides in-depth mathematical coverage of mixed models' statistical properties and numerical algorithms, as well as nontraditional applications, such as regrowth curves, shapes, and images. The book features the latest topics in statistics including modeling of complex clustered or longitudinal data, modeling data with multiple sources of variation, modeling biological variety and heterogeneity, Healthy Akaike Information Criterion (HAIC), parameter multidimensionality, and statistics of image processing. Mixed Models: Theory and Applications with R, Second Edition features unique applications of mixed model methodology, as well as: Comprehensive theoretical discussions illustrated by examples and figures Over 300 exercises, end-of-section problems, updated data sets, and R subroutines Problems and extended projects requiring simulations in R intended to reinforce material Summaries of major results and general points of discussion at the end of each chapter Open problems in mixed modeling methodology, which can be used as the basis for research or PhD dissertations Ideal for graduate-level courses in mixed statistical modeling, the book is also an excellent reference for professionals in a range of fields, including cancer research, computer science, and engineering.

An updated edition of the text that explores the core topics in scheduling theory The second edition of Principles of Sequencing and Scheduling has been revised and updated to provide comprehensive coverage of sequencing and scheduling topics as well as emerging developments in the field. The text offers balanced coverage of

deterministic models and stochastic models and includes new developments in safe scheduling and project scheduling, including coverage of project analytics. These new topics help bridge the gap between classical scheduling and actual practice. The authors—noted experts in the field—present a coherent and detailed introduction to the basic models, problems, and methods of scheduling theory. This book offers an introduction and overview of sequencing and scheduling and covers such topics as single-machine and multi-machine models, deterministic and stochastic problem formulations, optimization and heuristic solution approaches, and generic and specialized software methods. This new edition adds coverage on topics of recent interest in shop scheduling and project scheduling. This important resource: Offers comprehensive coverage of deterministic models as well as recent approaches and developments for stochastic models Emphasizes the application of generic optimization software to basic sequencing problems and the use of spreadsheet-based optimization methods Includes updated coverage on safe scheduling, lognormal modeling, and job selection Provides basic coverage of robust scheduling as contrasted with safe scheduling Adds a new chapter on project analytics, which supports the PERT21 framework for project scheduling in a stochastic environment. Extends the coverage of PERT 21 to include hierarchical scheduling Provides end-of-chapter references and access to advanced Research Notes, to aid readers in the further exploration of advanced topics Written for upper-undergraduate and graduate level courses covering such topics as scheduling theory and applications, project scheduling, and operations scheduling, the second edition of Principles of Sequencing and Scheduling is a resource that covers scheduling techniques and contains the most current research and emerging topics.

Management Science

Stat Labs

Sketches of the Alumni of Dartmouth College

Probability and Statistics

Mixed Models

Financial Management

'This book is a must-read for anyone interested in how to ensure sustainability while effectively addressing social and economic issues. The contributors are all well-recognised in their areas of expertise and their chapters are highly informative. The book's focus is on policy reform in the MurrayDarling Basin. It offers a "window to the future" and important insights for other parts of the world that are also facing the dilemma of the overextraction of water and what to do about it. I highly recommend it' Quentin Grafton, The Australian National University 'Managing the water of the MurrayDarling Basin has emerged as one of the greatest challenges for Australia's scientists, social scientists and policymakers. This book brings together some of Australia's leading economists and social scientists to discuss ideas and solutions for a national problem that is both intriguing and exasperating. Readers will enjoy the candid discussion of both the distant and recent history of this issue, plus the innovative solutions. From a philosophical perspective the reader may wish to muse on the relative merits of different degrees of free market and private property approaches vs top-down control as they pertain to the past, present and future of Australia's largest river basin.' Hugh Possingham, University of Queensland, Australia Agriculture in the MurrayDarling Basin of Australia

represents a controversial 'policy experiment' comprising large capital investments, innovation and enterprise across a 100-year period. This book, which contains contributions from some of Australia's foremost economic, social science and public policy researchers and writers, examines the evolution of public policy frameworks that transformed water management from initial exploitation for irrigation as a dominant single use to a dynamic multiple-use resource system. Water Policy Reform provides both analytical insights and examples of successes and failures in developing water policy in a complex and politically-contested environment. As such, this work attempts to develop a comprehensive management plan for the Basin and provides novel and invaluable lessons for an increasingly global problem. This well-researched study will interest both economists and those with public policy interest in academia and the public sector, including development agencies concerned with sustainable water resource management.

Edited by Rajnish Mehra, this volume focuses on the equity risk premium puzzle, a term coined by Mehra and Prescott in 1985 which encompasses a number of empirical regularities in the prices of capital assets that are at odds with the predictions of standard economic theory. This text is designed for an introductory probability course at the university level for sophomores, juniors, and seniors in mathematics, physical and social sciences, engineering, and computer science. It presents a thorough treatment of ideas and techniques necessary for a firm understanding of the subject. The text is also recommended for use in discrete probability courses. The material is organized so that the discrete and continuous probability discussions are presented in a separate, but parallel, manner. This organization does not emphasize an overly rigorous or formal view of probability and therefore offers some strong pedagogical value. Hence, the discrete discussions can sometimes serve to motivate the more abstract continuous probability discussions. Features: Key ideas are developed in a somewhat leisurely style, providing a variety of interesting applications to probability and showing some nonintuitive ideas. Over 600 exercises provide the opportunity for practicing skills and developing a sound understanding of ideas. Numerous historical comments deal with the development of discrete probability. The text includes many computer programs that illustrate the algorithms or the methods of computation for important problems. The book is a beautiful introduction to probability theory at the beginning level. The book contains a lot of examples and an easy development of theory without any sacrifice of rigor, keeping the abstraction to a minimal level. It is indeed a valuable addition to the study of probability theory. --Zentralblatt MATH

Accountancy
Sexuality and the Social Sciences
There is More to a Picture than Meets the Eye
An Introduction
An Anthology
Principles of Sequencing and Scheduling

Unlike traditional introductory math/stat textbooks, Probability and Statistics: The Science of Uncertainty brings a modern flavor based on incorporating the computer to the course and an integrated approach to inference. From the start the book integrates simulations into its theoretical coverage, and emphasizes the use of computer-powered computation throughout.* Math and science majors with just one year of calculus can use this text and experience a refreshing blend of applications and theory that goes beyond merely mastering the technicalities. They'll get a thorough grounding in probability theory, and go

beyond that to the theory of statistical inference and its applications. An integrated approach to inference is presented that includes the frequency approach as well as Bayesian methodology. Bayesian inference is developed as a logical extension of likelihood methods. A separate chapter is devoted to the important topic of model checking and this is applied in the context of the standard applied statistical techniques. Examples of data analyses using real-world data are presented throughout the text. A final chapter introduces a number of the most important stochastic process models using elementary methods. *Note: An appendix in the book contains Minitab code for more involved computations. The code can be used by students as templates for their own calculations. If a software package like Minitab is used with the course then no programming is required by the students.

Photographic imagery has come a long way from the pinhole cameras of the nineteenth century. Digital imagery, and its applications, develops in tandem with contemporary society's sophisticated literacy of this subtle medium. This book examines the ways in which digital images have become ever more ubiquitous as legal and medical evidence, just as they have become our primary source of news and have replaced paper-based financial documentation. Crucially, the contributions also analyze the very profound problems which have arisen alongside the digital image, issues of veracity and progeny that demand systematic and detailed response: It looks real, but is it? What camera captured it? Has it been doctored or subtly altered? Attempting to provide answers to these slippery issues, the book covers how digital images are created, processed and stored before moving on to set out the latest techniques for forensically examining images, and finally addressing practical issues such as courtroom admissibility. In an environment where even novice users can alter digital media, this authoritative publication will do much so stabilize public trust in these real, yet vastly flexible, images of the world around us.

Five early papers evolve theory that won Einstein a Nobel Prize: "Movement of Small Particles Suspended in a Stationary Liquid Demanded by the Molecular-Kinetic Theory of Heat"; "On the Theory of the Brownian Movement"; "A New Determination of Molecular Dimensions"; "Theoretical Observations on the Brownian Motion"; and "Elementary Theory of the Brownian Motion."

Hands-On Data Science with Anaconda

What Really Works

Operations Management For Dummies

Digital Image Forensics

Probability Tales

Discrete Mathematics for Computer Scientists
Score your highest in Operations Management Operations management is an important skill for current and aspiring business leaders to develop and master. It deals with the design and management of products, processes, services, and supply chains. Operations management is a growing field and a required course for most undergraduate business majors and MBA candidates. Now, Operations Management For Dummies serves as an extremely resourceful aid for this difficult subject. Tracks to a typical course in operations management or operations strategy, and covers topics such as evaluating and measuring existing systems' performance and efficiency, materials management and product development, using tools like Six Sigma and Lean production, designing new, improved processes, and defining, planning, and controlling costs of projects. Clearly organizes and explains complex topics Serves as a supplement to your Operations Management textbooks Helps you score your highest in your Operations Management course Whether your aim is to earn an undergraduate degree in business or an MBA, Operations Management For Dummies is indispensable supplemental reading for your operations management course.
Investment Performance Measurement Over the past two decades, the importance of measuring, presenting, and evaluating investment performance results has dramatically increased. With the growth of capital market data services, the development of quantitative analytical techniques, and the widespread acceptance of Global Investment Performance Standards (GIPS®), this discipline has emerged as a central component of effective asset management and, thanks in part to the Certificate in Investment Performance Measurement (CIPM) program, has become a recognized area of specialization for investment professionals. That's why Investment Performance Measurement: Evaluating and Presenting Results—the second essential title in the CFA Institute Investment Perspectives series—has been created. CFA Institute has a long tradition of publishing content from industry thought leaders, and now this new collection offers unparalleled guidance to those working in the rapidly evolving field of investment management. Drawing from the Research Foundation of CFA Institute, the Financial Analysts Journal, CFA Institute Conference Proceedings Quarterly, CFA Magazine, and the CIPM curriculum, this reliable resource taps into the vast store of knowledge of some of today's most prominent thought leaders—from industry professionals to respected academics—who have focused on investment performance evaluation for a majority of their careers. Divided into five comprehensive parts, this timely volume opens with an extensive overview of performance

measurement, attribution, and appraisal. Here, you'll become familiar with everything from the algebra of time-weighted and money-weighted rates of return to the objectives and techniques of performance appraisal. After this informative introduction, Investment Performance Measurement moves on to: Provide a solid understanding of the theoretical grounds for benchmarking and the trade-offs encountered during practice in Part II: Performance Measurement Describe the different aspects of attribution analysis as well as the determinants of portfolio performance in Part III: Performance Attribution Address everything from hedge fund risks and returns to fund management changes and equity style shifts in Part IV: Performance Appraisal Recount the history and explain the provisions of the GIPS standards—with attention paid to the many practical issues that arise in the course of its implementation—in Part V: Global Investment Performance Standards Filled with invaluable insights from more than fifty experienced contributors, this practical guide will enhance your understanding of investment performance measurement and put you in a better position to present and evaluate results in the most effective way possible.

This book explores four real-world topics through the lens of probability theory. It can be used to supplement a standard text in probability or statistics. Most elementary textbooks present the basic theory and then illustrate the ideas with some neatly packaged examples. Here the authors assume that the reader has seen, or is learning, the basic theory from another book and concentrate in some depth on the following topics: streaks, the stock market, lotteries, and fingerprints. This extended format allows the authors to present multiple approaches to problems and to pursue promising side discussions in ways that would not be possible in a book constrained to cover a fixed set of topics. To keep the main narrative accessible, the authors have placed the more technical mathematical details in appendices. The appendices can be understood by someone who has taken one or two semesters of calculus.

The Science of Uncertainty

Theory and Applications with R

Grinstead and Snell's Introduction to Probability

Town Development

Investigations on the Theory of the Brownian Movement
Develop, deploy, and streamline your data science projects with the most popular end-to-end platform, Anaconda Key Features -Use Anaconda to find solutions for clustering, classification, and linear regression -Analyze your data efficiently with the most powerful data science stack -Use the Anaconda cloud to store, share, and discover projects and libraries Book Description Anaconda is an open source

platform that brings together the best tools for data science professionals with more than 100 popular packages supporting Python, Scala, and R languages. Hands-On Data Science with Anaconda gets you started with Anaconda and demonstrates how you can use it to perform data science operations in the real world. The book begins with setting up the environment for Anaconda platform in order to make it accessible for tools and frameworks such as Jupyter, pandas, matplotlib, Python, R, Julia, and more. You'll walk through package manager Conda, through which you can automatically manage all packages including cross-language dependencies, and work across Linux, macOS, and Windows. You'll explore all the essentials of data science and linear algebra to perform data science tasks using packages such as SciPy, contrastive, scikit-learn, Rattle, and Rmixmod. Once you're accustomed to all this, you'll start with operations in data science such as cleaning, sorting, and data classification. You'll move on to learning how to perform tasks such as clustering, regression, prediction, and building machine learning models and optimizing them. In addition to this, you'll learn how to visualize data using the packages available for Julia, Python, and R. What you will learn Perform cleaning, sorting, classification, clustering, regression, and dataset modeling using Anaconda Use the package manager conda and discover, install, and use functionally efficient and scalable packages Get comfortable with heterogeneous data exploration using multiple languages within a project Perform distributed computing and use Anaconda Accelerate to optimize computational powers Discover and share packages, notebooks, and environments, and use shared project drives on Anaconda Cloud Tackle advanced data prediction problems Who this book is for Hands-On Data Science with Anaconda is for you if you are a developer who is looking for the best tools in the market to perform data science. It's also ideal for data analysts and data science professionals who want to improve the efficiency of their data science applications by using the best libraries in multiple languages. Basic programming knowledge with R or Python and introductory knowledge of linear algebra is expected.
Based on a groundbreaking study, analysing data on 200 management practices gathered over a 10 year period. Reveals the effectiveness of the 4+2 practices (4 primary and 2 of 4 possible secondary) practices that really matter –– the ones that, if followed rigorously, ensure sustained business success. With a new introduction by the authors. With hundreds of well–known management practices and prescriptions promoted by consultants and available to business, which are really effective and contribute to the growth and continued success of a company? Which do little or nothing? Based on the "Evergreen Project," a massive, 5 year study involving the business school faculties of ten universities, the authors set out to find the management practices that truly promote long–term growth and success. Their findings will revolutionize the art and practice of business management.The book shows that there are essentially six management practices that all successful companies must master simultaneously. They range from focusing on a strategy of growth to maintaining the depth and quality

of human talent in the organization.

In this volume, sociologists, demographers, epidemiologists, social psychologists, statisticians and economists analyse the data of a large-scale multidisciplinary survey conducted in France in 1992 under the responsibility of the French national centre for research on health and medicine (INSERM), with the technical support of INED and the financial support of the governmental agency for research on AIDS (ANRS). 20,000 men and women have been interviewed, representing the population aged 18 to 69.What are the significant factors of sexual behaviour? What part does rationality play in the decisions of individual? What are the main reactions of men and women to the onset of the new and major risk in sexual activity represented by AIDS? This volume suggests some answers to these fundamental questions and reports the considerable methodological investment that was made for both collection and treatment of data.

Proceedings - National Shellfish Sanitation Workshop

Proceedings Tenth National Shellfish Sanitation Workshop

Water Resource Economics and Policy

The History of Britain, that Part Especially Now Call'd England

Laughing Matters on the 2008 Presidential Primary Campaign

Introduction to Probability

From 1976 to the beginning of the millennium—covering the quarter-century life span of this book and its predecessor—something remarkable has happened to market response research: it has become practice. Academics who teach in professional fields, like we do, dream of such things. Imagine the satisfaction of knowing that your work has been incorporated into the decision-making routine of brand managers, that category management relies on techniques you developed, that marketing management believes in something you struggled to establish in their minds. It's not just us that we are talking about. This pride must be shared by all of the researchers who pioneered the simple concept that the determinants of sales could be found if someone just looked for them. Of course, economists had always studied demand. But the project of extending demand analysis would fall to marketing researchers, now called marketing scientists for good reason, who saw that in reality the marketing mix was more than price; it was advertising, sales force effort, distribution, promotion, and every other decision variable that potentially affected sales. The bibliography of this book supports the notion that the academic research in marketing led the way. The journey was difficult, sometimes halting, but ultimately market response research advanced and then insinuated itself into the fabric of modern management.

This second edition includes updated information and an exploration of water issues outside the United States, as well as a new application of behaviorial and experimental economics

to the topic. A concise introduction to issues of water quality and quantity in both urban and agricultural settings, Water Resource Economics and Policy will be a valuable resource or text for students and researchers in the fields of agricultural economics, geography, law and hydrology. Those involved in water resource agencies and private utilities will also find the book a useful reference.

Debatable Humor focuses on understanding the behavior of individual candidates within the context of political debates, and uses an evolutionary psychology perspective to understand the roots of this behavior. Specifically, it considers the role humor and laughter plays in selecting leaders and, in turn, how this reflects the values of the political system.

Analytical Techniques

Digital Signal Processing Using MATLAB for Students and Researchers

Utilize the right mix of tools to create high-performance data science applications

Python for Finance

Foundations of Cellular Neurophysiology

The Allocator's Edge

Learn and implement various Quantitative Finance concepts using the popular Python libraries About This Book Understand the fundamentals of Python data structures and work with time-series data Implement key concepts in quantitative finance using popular Python libraries such as NumPy, SciPy, and matplotlib A step-by-step tutorial packed with many Python programs that will help you learn how to apply Python to finance Who This Book Is For This book assumes that the readers have some basic knowledge related to Python. However, he/she has no knowledge of quantitative finance. In addition, he/she has no knowledge about financial data. What You Will Learn Become acquainted with Python in the first two chapters Run CAPM, Fama-French 3-factor, and Fama-French-Carhart 4-factor models Learn how to price a call, put, and several exotic options Understand Monte Carlo simulation, how to write a Python program to replicate the Black-Scholes-Merton options model, and how to price a few exotic options Understand the concept of volatility and how to test the hypothesis that volatility changes over the years Understand the ARCH and GARCH processes and how to write related Python programs In Detail This book uses Python as its computational tool. Since Python is free, any school or organization can download and use it. This book is organized according to various finance subjects. In other words, the first edition focuses more on Python, while the second edition is truly trying to apply Python to finance. The book starts by explaining topics exclusively related to Python. Then we deal with critical parts of Python, explaining concepts such as time value of money stock and bond evaluations, capital asset pricing model, multi-factor models, time series analysis, portfolio theory, options and futures. This book

will help us to learn or review the basics of quantitative finance and apply Python to solve various problems, such as estimating IBM's market risk, running a Fama-French 3-factor, 5-factor, or Fama-French-Carhart 4 factor model, estimating the VaR of a 5-stock portfolio, estimating the optimal portfolio, and constructing the efficient frontier for a 20-stock portfolio with real-world stock, and with Monte Carlo Simulation. Later, we will also learn how to replicate the famous Black-Scholes-Merton option model and how to price exotic options such as the average price call option. Style and approach This book takes a step-by-step approach in explaining the libraries and modules in Python, and how they can be used to implement various aspects of quantitative finance. Each concept is explained in depth and supplemented with code examples for better understanding. Microeconomics is a classroom-tested resource for learning the key concepts, essential tools, and applications of microeconomics. This leading textbook enables students to recognize and analyze significant data, patterns, and trends in real markets through its integrated, student-friendly approach to the subject — providing practice problems, hands-on exercises, illustrative examples, and engaging applications that ground theory firmly in the real world. Each chapter, opening with a set of clearly defined learning goals based on the Bloom Taxonomy, features numerous Learning-by-Doing (LBD) problems, mathematical and graphical data, and varied problem sets focused on current events. Now in its sixth edition, the text offers extensive new and revised content throughout. All applications reflect current data and important new developments in the field of economics, including behavioral economics, randomized controlled trials (RCTs) in policy evaluation and design, and computational-based microeconomics. Updated chapter openers, designed to increase student interest, cover topics including the economic impacts of climate change, U.S. household income and spending, surge pricing by Uber and Lyft, the effect of immigration on wages, and advances in robotics, automation, artificial intelligence, and more.

Integrating the theory and practice of statistics through a series of case studies, each lab introduces a problem, provides some scientific background, suggests investigations for the data, and provides a summary of the theory used in each case. Aimed at upper-division students.

A French Survey on Sexual Behaviour

Market Response Models

Samson Agonistes

Mathematical Statistics Through Applications

Statistics and Random Processes

From the First Graduation in 1771 to the Present Time, with a Brief History of the Institution

We are entering a golden age of alternative investments. Alternative asset classes including private equity, hedge funds, catastrophe reinsurance, real assets, non-traditional credit, alternative risk premia, digital assets, collectibles, and other novel assets are now available to investors and their advisors in a way that they never have been before. The pursuit of

diversification is not as straightforward as it once was ⏷ and the classic 60/40 portfolio may no longer be sufficient in helping investors achieve their most important financial goals. With the ever-present need for sustainable income and risk management, alternative assets are poised to play a more prominent role in investor portfolios. Phil Huber is the Chief Investment Officer for a multi-billion dollar wealth management firm and acts as your guide on a journey through the past, present, and future of alternative investments. In this groundbreaking tour de force, he provides detailed coverage across the spectrum of alternative assets: their risk and return characteristics, methods to gain exposure, and how to fit everything into a balanced portfolio. The three parts of The Allocator⏷s Edge address: 1. Why the future may present challenges for traditional portfolios; why the adoption of alternatives has remained elusive for many allocators; and why the case for alternatives is more compelling than ever thanks to financial evolution and innovation. 2. A comprehensive survey of the asset classes and strategies that comprise the vast universe of alternative investments. 3. How to build durable and resilient portfolios that harness alternative assets; and how to sharpen the client communication skills needed to establish proper expectations and make the unfamiliar familiar. The Allocator⏷s Edge is written with the practitioner in mind, providing financial advisors, institutional allocators, and other professional investors the confidence and courage needed to effectively understand, implement, and translate alternatives for their clients. Alternative investments are the allocator⏷s edge for the portfolios of tomorrow ⏷ and this is the essential guide for advisors and investors looking to seize the opportunity.

Quickly Engages in Applying Algorithmic Techniques to Solve Practical Signal Processing Problems With its active, hands-on learning approach, this text enables readers to master the underlying principles of digital signal processing and its many applications in industries such as digital television, mobile and broadband communications, and medical/scientific devices. Carefully developed MATLAB® examples throughout the text illustrate the mathematical concepts and use of digital signal processing algorithms. Readers will develop a deeper understanding of how to apply the algorithms by manipulating the codes in the examples to see their effect. Moreover, plenty of exercises help to put knowledge into practice solving real-world signal processing challenges. Following an introductory chapter, the text explores: Sampled signals and digital processing Random signals Representing signals and systems Temporal and spatial signal processing Frequency analysis of signals Discrete-time filters and recursive filters Each chapter begins with chapter objectives and an introduction. A summary at the end of each chapter ensures that one has mastered all the key concepts and techniques before progressing in the text. Lastly, appendices listing selected web resources, research papers, and related textbooks enable the investigation of individual topics in greater depth. Upon completion of this text, readers will understand how to apply key algorithmic techniques to address practical signal processing problems as well as develop their own signal processing algorithms. Moreover, the text provides a solid foundation for evaluating and applying new digital processing signal techniques as they are developed.

with simulations and illustrations by Richard Gray Problem solving is an indispensable part of learning a quantitative science such as neurophysiology. This text for graduate and advanced undergraduate students in neuroscience, physiology, biophysics, and computational neuroscience provides comprehensive, mathematically sophisticated descriptions of modern principles of cellular neurophysiology. It is the only neurophysiology text that gives detailed derivations of equations, worked examples, and homework problem sets (with complete answers). Developed from notes for the course that the authors have taught since 1983,

Foundations of Cellular Neurophysiology covers cellular neurophysiology (also some material at the molecular and systems levels) from its physical and mathematical foundations in a way that is far more rigorous than other commonly used texts in this area.

Lessons in Sustainability from the Murray Darling Basin

Introduction to Probability, Statistics, and Random Processes

The 4+2 Formula For Sustained Business Success

A Magazine for the Man who Believes in Himself and in His Town

Handbook of the Equity Risk Premium

Financial Exchange Rates and International Currency Exposures

The theory of random graphs began in the late 1950s in several papers by Erdos and Renyi. In the late twentieth century, the notion of six degrees of separation, meaning that any two people on the planet can be connected by a short chain of people who know each other, inspired Strogatz and Watts to define the small world random graph in which each site is connected to k close neighbors, but also has long-range connections. At a similar time, it was observed in human social and sexual networks and on the Internet that the number of neighbors of an individual or computer has a power law distribution. This inspired Barabasi and Albert to define the preferential attachment model, which has these properties. These two papers have led to an explosion of research. The purpose of this book is to use a wide variety of mathematical argument to obtain insights into the properties of these graphs. A unique feature is the interest in the dynamics of process taking place on the graph in addition to their geometric properties, such as connectedness and diameter.

Advanced Statistics with Applications in R fills the gap between several excellent theoretical statistics textbooks and many applied statistics books where teaching reduces to using existing packages. This book looks at what is under the hood. Many statistics issues including the recent crisis with p-value are caused by misunderstanding of statistical concepts due to poor theoretical background of practitioners and applied statisticians. This book is the product of a forty-year experience in teaching of probability and statistics and their applications for solving real-life problems. There are more than 442 examples in the book: basically every probability or statistics concept is illustrated with an example accompanied with an R code. Many examples, such as Who said π? What team is better? The fall of the Roman empire, James Bond chase problem, Black Friday shopping, Free fall equation: Aristotle or Galilei, and many others are intriguing. These examples cover biostatistics, finance, physics and engineering, text and image analysis, epidemiology, spatial statistics, sociology, etc. Advanced Statistics with Applications in R teaches students to use theory for solving real-life problems through computations: there are about 500 R codes and 100 datasets. These data can be freely downloaded from the author's website dartmouth.edu/~eugened. This book is suitable as a text for senior undergraduate students with major in statistics or data science or graduate students. Many researchers who apply statistics on the regular basis find explanation of many fundamental concepts from the theoretical perspective

illustrated by concrete real-world applications.
Introduction to ProbabilityAmerican Mathematical Soc.
The Annals of Mathematical Statistics
Water Policy Reform
From the First Traditional Beginning, Continu'd to the Norman Conquest
Investment Performance Measurement
Debatable Humor
Random Graph Dynamics

The book covers basic concepts such as random experiments, probability axioms, conditional probability, and counting methods, single and multiple random variables (discrete, continuous, and mixed), as well as moment-generating functions, characteristic functions, random vectors, and inequalities; limit theorems and convergence; introduction to Bayesian and classical statistics; random processes including processing of random signals, Poisson processes, discrete-time and continuous-time Markov chains, and Brownian motion; simulation using MATLAB and R.
This is the eBook of the printed book and may not include any media, website access codes, or print supplements that may come packaged with the bound book.
Stein/Drysdale/Bogart's Discrete Mathematics for Computer Scientists is ideal for computer science students taking the discrete math course. Written specifically for computer science students, this unique textbook directly addresses their needs by providing a foundation in discrete math while using motivating, relevant CS applications. This text takes an active-learning approach where activities are presented as exercises and the material is then fleshed out through explanations and extensions of the exercises.
Evaluating and Presenting Results
Advanced Statistics with Applications in R
Microeconomics
Econometric and Time Series Analysis