



River Publishers

River Publishers Book Catalogue

Series in Energy Engineering and
Systems

River Publishers Series in Energy Engineering and Systems

Electrical Engineering for Non-Electrical Engineers, Third Edition

Author: S. Bobby Rauf

ISBN: 9788770223478

e-ISBN: 9788770223461

Available From: May 2021

Price: € 0.00



Description:

This book is designed to serve as a resource for exploring and understanding basic electrical engineering concepts, principles, analytical and mathematical strategies that will aid the reader in progressing their electrical engineering knowledge to intermediate or advanced levels. The study of electrical engineering concepts, principles and analysis techniques is made relatively easy for the reader by inclusion of most of the reference data, in form of excerpts from different parts of the book, within the discussion of each case study, exercise and self-assessment problem solution. This is done in an effort to facilitate quick study and comprehension of the material without repetitive search for reference data in other parts of the book. To this new edition the author has introduced a new chapter on batteries where the basic, yet important, facets of the battery and its sustainable and safe operation is covered. The reader will be shown the not-so-obvious charging and discharging performance characteristics of batteries that can be determining factors in the selection, application and optimal performance of batteries.

River Publishers Series in Energy Engineering and Systems

Thermodynamics Made Simple

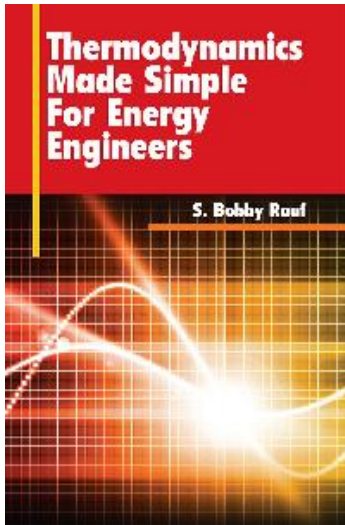
Author: S. Bobby Rauf

ISBN: 9788770223492

e-ISBN: 9788770224505

Available From: May 2021

Price: € 0.00



Description:

This text provides an overview of important theory, principles, and concepts in the field of thermodynamics, making this abstract and complex subject easy to comprehend while building practical skills in the process. It enhances understanding of heat transfer, steam tables, energy concepts, power generation, psychrometry, refrigeration cycles, and more. Practical, easily accessible case studies illustrate various thermodynamics principles. Each chapter concludes with a list of questions or problems, with answers at the back of the book.

River Publishers Series in Energy Engineering and Systems

Testing and Balancing HVAC Air and Water Systems, Sixth Edition

Author: Samuel C. Sugarman

ISBN: 9788770223539

e-ISBN: 9788770223522

Available From: May 2021

Price: € 0.00



Description:

Thoroughly revised, this book provides the reader with an understanding of the principles and practices of testing and balancing (TAB) heating, ventilating, and air conditioning (HVAC) air and water systems. For the novice and the experienced testing and balancing technician, it is a field reference book of procedures, equations, and information tables.

Divided into five parts, Part I has general and specific balancing procedures for constant air volume systems, variable air volume systems, return air systems, and fans and fan performance. Part II covers testing and balancing fume hood systems and cleanrooms, commissioning HVAC systems, centrifugal pumps and pump performance, analog and digital controls and water balancing procedures using flow meters, system components, and temperatures. Part III covers fans, pumps, air distribution, water distribution, motors, electrical, fluid flow, psychrometrics, refrigeration, and instrument usage and care. Part IV includes equations and tables. New to this edition, Part V has information and additional test and balance procedures and graphics for chapters 1-7 and 13-14. TAB Data and Test forms are in the new addendum as well.

- Provides the readers with revised information about the principles and practices of testing and balancing (TAB) heating
- Represents a field reference guide for both the novice and experienced testing and balancing technician
- Includes a new section with information and additional test and balance procedures and graphics



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Handbook of Energy Engineering, Eighth Edition

Authors:

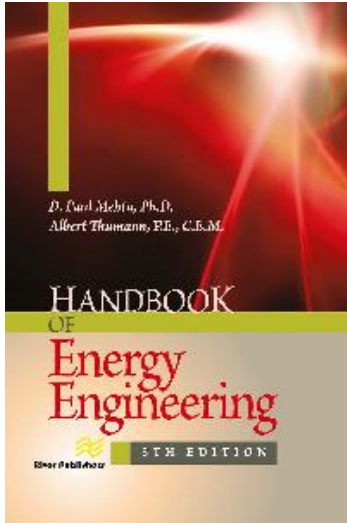
D. Paul Mehta, Albert Thumann

ISBN: 9788770223454

e-ISBN: 9788770223447

Price: £ 0.00 | \$ 160.00

[Distributed exclusively by Routledge](#)



Description:

The Handbook of Energy Engineering covers the latest updates to codes and standards in the energy industry. The Eighth Edition features two new chapters on thermal storage and Occupants' Behavior and Energy Consumption in Buildings. Also included are chapters on energy economic analysis, energy auditing, waste heat recovery, utility system optimization, HVAC, cogeneration, control systems, energy management, and compressed air system optimization. The book can act as a reference to guide you step-by-step in applying the principles of energy engineering and management to the design of electrical, HVAC, utility, process and building systems for both new design and retrofit projects. The text is thoroughly illustrated with tables, graphs, diagrams, and sample problems.

In North, Central & South America 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778 9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

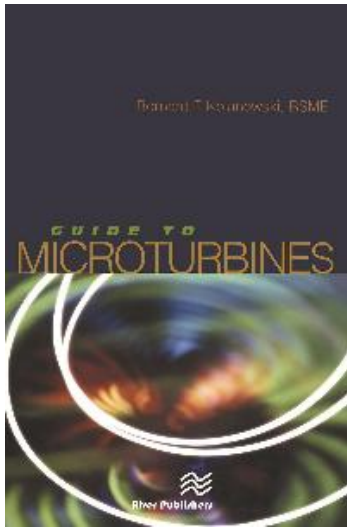
Guide to Microturbines

Author: Bernard F. Kolanowski

ISBN: 9788770223546

Price: £ 67.99 | \$ 114.95

[Distributed exclusively by Routledge](#)



Description:

Featuring the latest information on the new technology involved in on-site power generation, this book incorporates an overview and further detailed investigations into the issues inherent in the development, use and future of microturbines.

River Publishers Series in Energy Engineering and Systems

Advanced Lighting Controls

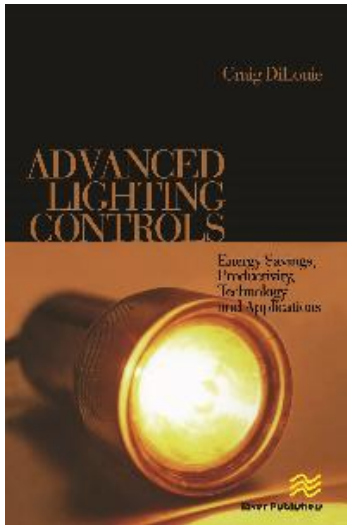
Energy Savings, Productivity, Technology and Applications

Author: Craig DiLouie

ISBN: 9788770223782

Price: £ 95.99 | \$ 130.00

[Distributed exclusively by Routledge](#)



Description:

Advanced Lighting Controls is edited by Craig DiLouie and written for engineers, architects, lighting designers, electrical contractors, distributors, and building owners and managers. Advanced lighting controls, indicated by research as the "next big thing," are now mandated by the ASHRAE/IES 91.1-1999 energy standard, the basis for all state energy codes in the U.S., and are becoming the norm rather than the exception in new construction. This book provides in-depth information about the major trends, technologies, codes, and design techniques shaping the use of today's lighting control systems, including dimming, automatic switching, and global as well as personal control.

River Publishers Series in Energy Engineering and Systems

Mechanical Estimating Manual

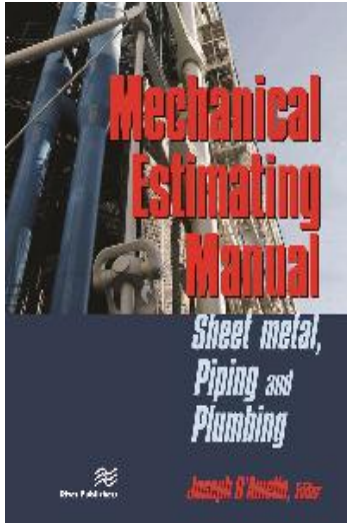
Sheet Metal, Piping and Plumbing

Editor: Joseph D'Amelio

ISBN: 9788770223737

Price: £ 82.00 | \$ 119.95

Distributed exclusively by Routledge



Description:

Clear, practical and comprehensive, this mechanical estimating manual provides an indispensable resource for contractors, estimators, owners and anyone involved with estimating mechanical costs on construction projects, including a wealth of labor and price data, formulas, charts and graphs. Covering time-proven methodologies and procedures, it offers the user a full range of ready-to-use forms, detailed estimating guidelines, and numerous completed examples. You'll learn from leading experts how to produce complete and accurate sheet metal, piping and plumbing estimates both quickly and easily. The manual will also be of value to supervisors, mechanics, builders, general contractors, engineers and architects for use in planning and scheduling work, budget estimating, cost control, cost accounting, checking change orders and various other aspects of mechanical estimating.

River Publishers Series in Energy Engineering and Systems

Industrial Process Control Systems, Second Edition

Authors:

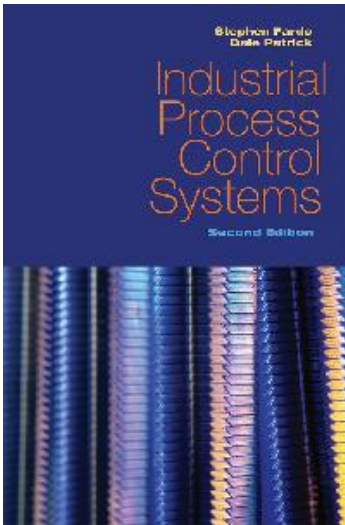
Dale R. Patrick and Stephen W. Fardo

ISBN: 9781439815762

e-ISBN: 9788770222846

Price: £ 175.00 | \$ 230.00

[Distributed exclusively by Routledge](#)



Description:

This book provides a basic approach to understanding and effectively applying industrial process control based on the systems concept. It provides an overview of an operating system, then divides it into sections for individual discussion. It covers topics including the operating system, process control, pressure systems, thermal systems, and level determining systems. It also addresses flow process systems, analytical process systems, microprocessor systems, automated processes, and robotic systems.

River Publishers Series in Energy Engineering and Systems

Physical Plant Equipment Fundamentals

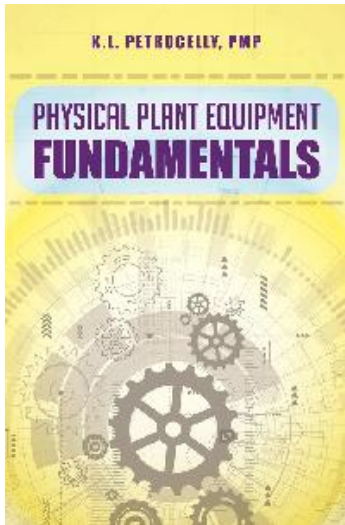
Author: Kenneth L. Petrocelly

ISBN: 9781138616097

e-ISBN: 9788770222631

Price: £ 81.99 | \$ 115.00

Distributed exclusively by Routledge



Description:

Physical Plant Equipment Fundamentals un-complicates the care and repair of common plant equipment--providing direction to mechanics and electricians, furthering their base understanding through referenced examples. It addresses many of the knowledge gaps of the untrained and/or inexperienced maintenance mechanic, but both fledgling and journeyman level repair personnel can benefit from the instruction and advice it offers. The book is organized into four sections: Essential Plant Systems and Equipment; Associated Accessories and Mechanisms; Operations and Maintenance Support, and Plant Engineering Principles and Norms.

River Publishers Series in Energy Engineering and Systems

Lowering Your Facility's Electric Rates

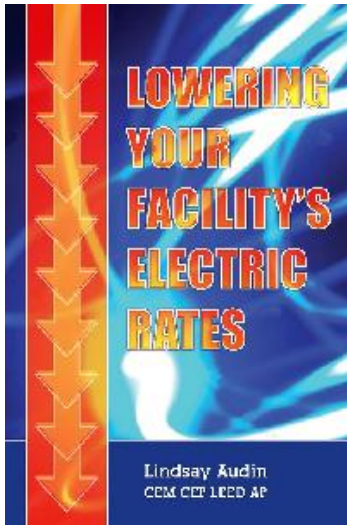
Author: Lindsay Audin

ISBN: 9781138303140

e-ISBN: 9788770223386

Price: £ 82.99 | \$ 120.00

Distributed exclusively by Routledge



Description:

Many energy practitioners are either uninformed or misinformed regarding how electricity is actually priced. Many are also unaware of how to properly calculate potential dollar savings from energy efficiency upgrades.

Designed for commercial/industrial/institutional (C&I) power customers, this book details ways to secure lower electric rates and pricing in both regulated and deregulated retail power markets. The range of options varies from simple methods (e.g., minimizing sales tax) to more complex techniques (e.g., intervening in regulatory rate proceedings). With 40+ years' experience in energy services, Mr. Audin provides an excellent understanding of power pricing and ways to reduce it.

River Publishers Series in Energy Engineering and Systems

Practical Lubrication for Industrial Facilities, Third Edition

Authors:

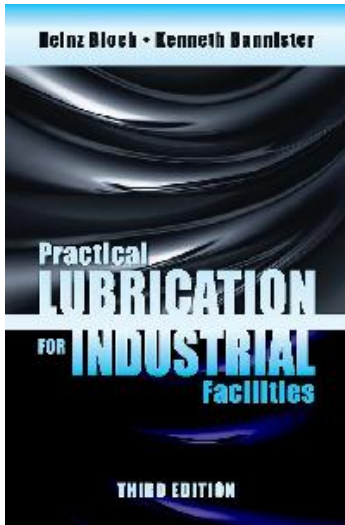
Heinz P. Bloch and Kenneth Bannister

ISBN: 9781138626799

e-ISBN: 9788770222648

Price: £ 140.00 | \$ 205.00

[Distributed exclusively by Routledge](#)



Description:

Now completely revised and updated, this definitive reference provides a comprehensive resource on the fundamental principles of lubricant application, what products are available, and which lubricants are most effective for specific applications. It also offers a detailed and highly practical discussion of lubrication delivery systems. You'll gain a clearer understanding of the "why" of relevant industrial lubrication practices, and, importantly, how these practices will facilitate optimized results. Lubricant applications covered include bearings and machine elements in earthbound electric motors, process pumps, gas compressors, gas and steam turbines, as well as many other machine types. An examination of the most advantageous ways to procure lubricants, to understand contaminant filtration, and to implement cost-justified means of lubricant storage is presented. Also provided are expert tips on lubricant handling techniques, procedural setups, how and when to perform oil analyses, critical maintenance practices, equipment reliability issues, and more.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Electrical Engineering for Non-Electrical Engineers, Second Edition

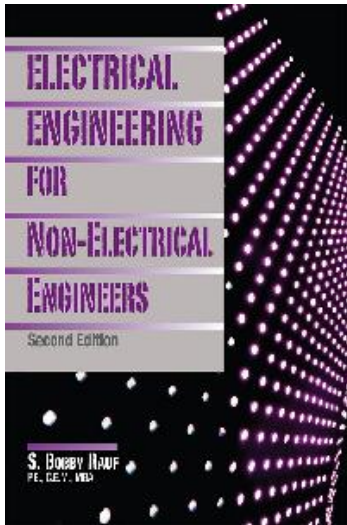
Author: S. Bobby Rauf, P.E., C.E.M., MBA

ISBN: 9781498799607

e-ISBN: 9788770223362

Price: £ 98.99 | \$ 155.00

Distributed exclusively by Routledge



Description:

This book is designed to serve as a resource for exploring and understanding basic electrical engineering concepts, principles, analytical and mathematical strategies that will aid the reader in progressing their electrical engineering knowledge to intermediate or advanced levels. The study of electrical engineering concepts, principles and analysis techniques is made relatively easy for the reader by inclusion of most of the reference data, in form of excerpts from different parts of the book, within the discussion of each case study, exercise and self-assessment problem solution. This is done in an effort to facilitate quick study and comprehension of the material without repetitive search for reference data in other parts of the book. To this new edition the author has introduced a new chapter on batteries where the basic, yet important, facets of the battery and its sustainable and safe operation is covered. The reader will be shown the not-so-obvious charging and discharging performance characteristics of batteries that can be determining factors in the selection, application and optimal performance of batteries.

**In North, Central & South
America** 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

HVAC Fundamentals, Third Edition

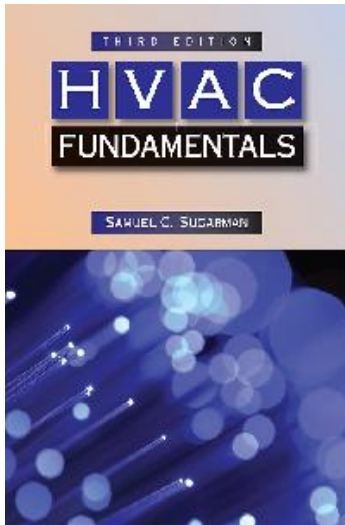
Author: Samuel C. Sugarman

ISBN: 9781498757041

e-ISBN: 9788770223287

Price: £ 95.99 | \$ 130.00

Distributed exclusively by Routledge



Description:

Updated with chapters on ventilating and exhausting systems and HVAC systems, this third edition of a bestseller covers the range of HVAC systems. The coverages is into components and controls for air, water, heating, ventilating, and air conditioning and readers will learn why one component or system may be chosen over another. New information is included on occupancy comfort, process function, thermodynamics, heat transfer, building envelope conditioned space, heating and cooling load calculations, air duct fundamentals, water pipe fundamentals, variable flow water systems, refrigeration components, piping fundamentals, central plant water chiller optimization, and the latest heat recovery technologies.

River Publishers Series in Energy Engineering and Systems

Exploring the Value of Electricity

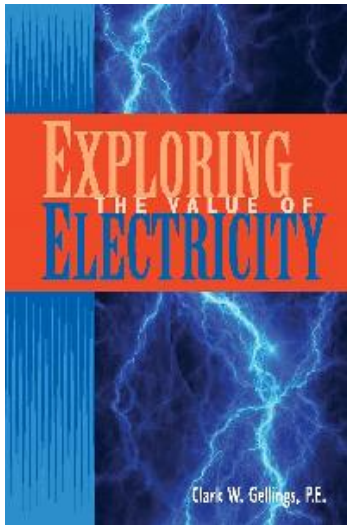
Author: Clark W. Gellings, P.E.

ISBN: 9781498744317

e-ISBN: 9788770223263

Price: £ 86.99 | \$ 120.00

Distributed exclusively by Routledge



Description:

This book discusses the role electricity plays in sustaining and improving the quality of life. The author elucidates the numerous approaches to estimating value, including electricity's contribution toward the U.S. Gross Domestic Product, its role in medicine, and its ability to power communications. Traditional measures such as the cost of outages, the impact of storms, the cost of restoring power systems after storms, the Value of Lost Load (VOLL), consumer Willingness to Pay (WTP) to avoid outages, and consumer surveys are covered extensively. In addition, the book speculates on life without electricity and how society may have evolved without it.

River Publishers Series in Energy Engineering and Systems

Boiler Plant and Distribution System Optimization Manual, Third Edition

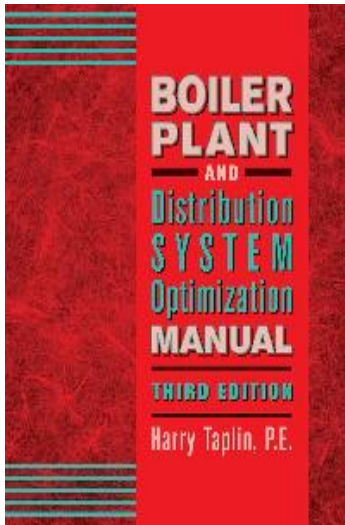
Author: Harry R. Taplin, Jr., P.E.

ISBN: 9781482260786

e-ISBN: 9788770223201

Price: £ 78.99 | \$ 110.00

[Distributed exclusively by Routledge](#)



Description:

The Third Edition of the Boiler Plant and Distribution System Optimization Manual has been upgraded with ten new checklists with over 100 ways to improve performance with 50 additional illustrations to communicate specific information about applying these technologies. The new checklists serve as a handy reference for designing an energy plan for your plants. Understanding that funds for energy come directly from your bottom line, this book has been designed for those tasked with increasing profits by reducing fuel costs while also reducing pollution and carbon footprints with attention to plant safety. The author presents many complex boiler-related topics in a simple and understandable way to simplify the decision-making process.

River Publishers Series in Energy Engineering and Systems

Dictionary of 21st Century Energy Technologies, Financing and Sustainability

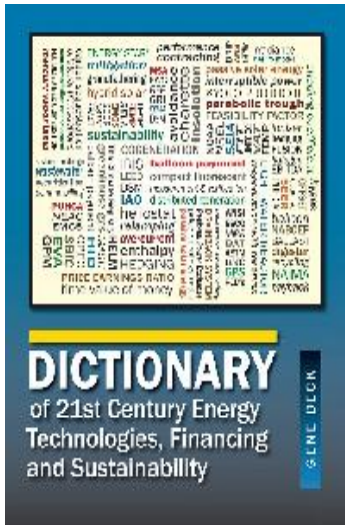
Author: Gene Beck CEM, CLP

ISBN: 9781482253047

e-ISBN: 9788770223171

Price: £ 120.00 | \$ 165.00

[Distributed exclusively by Routledge](#)



Description:

This comprehensive desktop reference addresses the diverse terms and acronyms that form the backbone of 21st century energy technologies, applications of those technologies, and the sustainability sector of the U.S. economy. The convergence of these disciplines has resulted in an explosion of specialized terms, acronyms, and jargon. The references encompass a wide range of legacy as well as emerging renewable energy technologies including the finance and sustainable segments of business that form an integral part of those technologies.

This dictionary gives professionals and laymen alike, across the multi-disciplinary fields of energy, a tool to better understand and communicate energy matters and understand the energy issues and opportunities faced. There are over 8,000 entries, making it the largest dictionary ever compiled on these specific subjects. Although the book includes some highly technical terms, the writing and explanations are sufficiently clear for both academia and practitioners including students, professors, architects, accountants, attorneys, engineers, public policy makers, regulators, developers, real estate professionals, debtors, borrowers, standards setting organizations, journalists, and boards of directors.

The author has created this dictionary to help both novices and experts cut through the confusion and understand the vocabulary of this fast-growing field. This comprehensive body of knowledge explains these technologies and thousands of other new technical terms and acronyms. Three sectors—energy, efficiency, and sustainability—are at the heart of the economic low-carbon future growth of our economy. The result is a practical tool that should find a central place on the desk of anyone involved in energy, management, and development of sustainability issues anywhere in the world.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Testing and Balancing HVAC Air and Water Systems, Fifth Edition

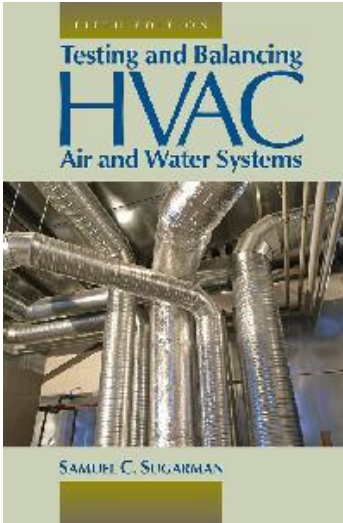
Author: Samuel C. Sugarman

ISBN: 9781482255676

e-ISBN: 9788770223393

Price: £ 95.99 | \$ 130.00

Distributed exclusively by Routledge



Description:

Thoroughly revised, this book provides the reader with an understanding of the principles and practices of testing and balancing (TAB) heating, ventilating, and air conditioning (HVAC) air and water systems. For the novice and the experienced testing and balancing technician, it is a field reference book of procedures, equations, and information tables.

Divided into five parts, Part I has general and specific balancing procedures for constant air volume systems, variable air volume systems, return air systems, and fans and fan performance. Part II covers testing and balancing fume hood systems and cleanrooms, commissioning HVAC systems, centrifugal pumps and pump performance, analog and digital controls and water balancing procedures using flow meters, system components, and temperatures. Part III covers fans, pumps, air distribution, water distribution, motors, electrical, fluid flow, psychrometrics, refrigeration, and instrument usage and care. Part IV includes equations and tables. New to this edition, Part V has information and additional test and balance procedures and graphics for chapters 1-7 and 13-14. TAB Data and Test forms are in the new addendum as well.

- Provides the readers with revised information about the principles and practices of testing and balancing (TAB) heating
- Represents a field reference guide for both the novice and experienced testing and balancing technician
- Includes a new section with information and additional test and balance procedures and graphics

In North, Central & South
America 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

Boiler Operator's Handbook, Second Edition

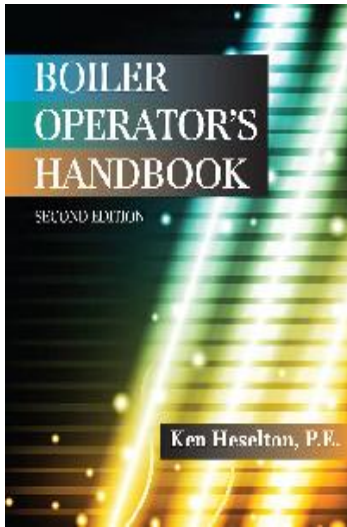
Editor: Kenneth E. Heselton, PE

ISBN: 9781482253894

e-ISBN: 9788770223188

Price: £ 145.00 | \$ 200.00

[Distributed exclusively by Routledge](#)



Description:

This book was written specifically for boiler plant operators and supervisors who want to learn how to lower plant operating costs, as well as how to operate plants of all types and sizes more wisely. It is newly revised with guidelines for HRSGs, combined cycle systems, and environmental effects of boiler operation. Also included is a new chapter on refrigeration systems that addresses the environmental effects of inadvertent and intentional discharges of refrigerants.

Going beyond the basics of "keeping the pressure up," the author explains in clear terms how to set effective priorities to ensure optimal plant operation, including ensuring safety and continuity of operations, preventing damage, managing environmental impact, training replacement plant operators, logging and preserving historical data, and operating the plant economically.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Lighting & Controls

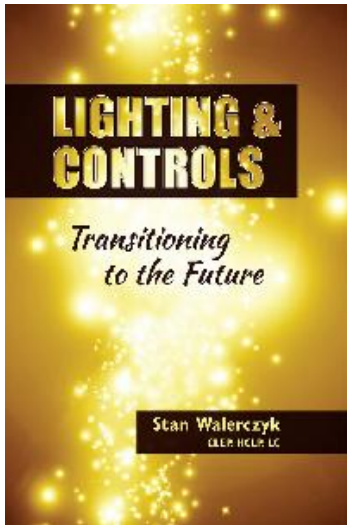
Author: Stan Walerczyk, CLEP, HCLP, LC

ISBN: 9781482236835

e-ISBN: 9788770223140

Price: £ 95.99 | \$ 130.00

[Distributed exclusively by Routledge](#)



Description:

This book helps you make good lighting decisions and will be a very useful hands-on tool for anyone involved with engineering, maintenance, purchasing, specification, retrofits, remodels, and new construction for interior or exterior lighting applications. It gives very practical ways to maintain and update existing lighting systems and how to plan for the future. Key points include LED lighting, maintenance costs, achieving low power density, disadvantages of LED T8s, and human centric lighting.

**In North, Central & South
America** 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

Pump User's Handbook

Authors:

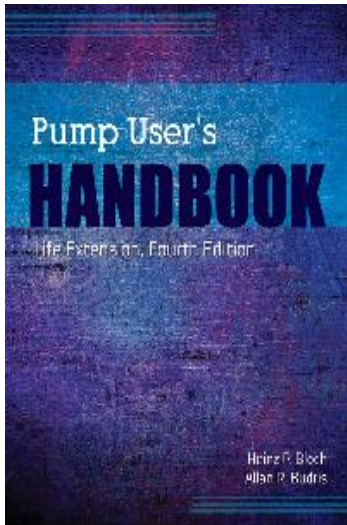
Heinz P. Bloch and Allan R. Budris

ISBN: 9781482228649

e-ISBN: 9788770223119

Price: £ 145.00 | \$ 200.00

[Distributed exclusively by Routledge](#)



Description:

This text explains just how and why the best-of-class pump users are consistently achieving superior run lengths, low maintenance expenditures and unexcelled safety and reliability. Written by practicing engineers whose working career was marked by involvement in pump specification, installation, reliability assessment, component upgrading, maintenance cost reduction, operation, troubleshooting and all conceivable facets of pumping technology, this text describes in detail how to accomplish best-of-class performance and low life cycle cost.

River Publishers Series in Energy Engineering and Systems

Gas Turbine Handbook

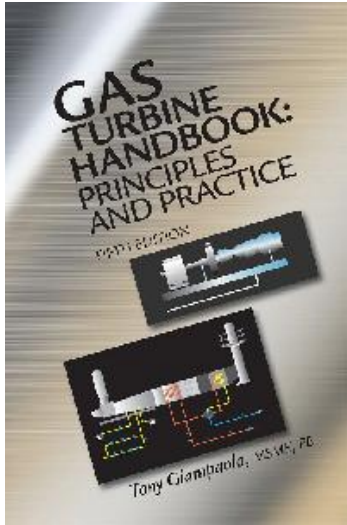
Author: Tony Giampaolo

ISBN: 9781482228885

e-ISBN: 9788770223133

Price: £ 115.00 | \$ 155.00

Distributed exclusively by Routledge



Description:

Newly revised, this new fifth edition includes a chapter on waste heat recovery and discusses this technology in detail including the advantages and barriers to waste heat recovery, environmental restraints, thermodynamics of heat recovery, fluid properties, boiler, condensers, steam turbines, off design behavior and exhaust catalyst. This book shows how microturbine designs rely heavily on the centrifugal compressor and are, in many aspects, similar to the early flight engines and will illustrate how the approach of the microturbine designer is to minimize cost.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Handbook of Energy Engineering, Seventh Edition

Authors:

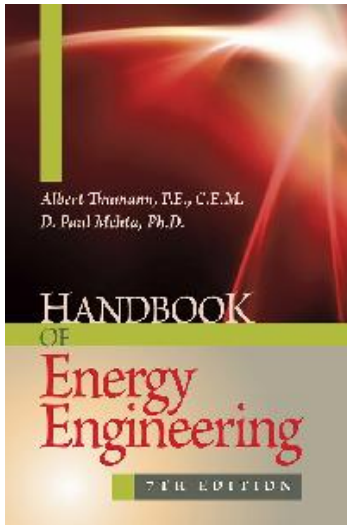
Albert Thumann and D. Paul Mehta

ISBN: 9781466561618

e-ISBN: 9788770223027

Price: £ 105.00 | \$ 145.00

Distributed exclusively by Routledge



Description:

With new chapters on electrical system optimization and ISO 50001, this edition covers the latest updates to codes and standards in the energy industry. It includes chapters on energy economic analysis, energy auditing, waste heat recovery, utility system optimization, HVAC, cogeneration, control systems, energy management, compressed air system optimization and financing energy projects. This reference will guide you step by step in applying the principles of energy engineering and management to the design of electrical, HVAC, utility, process and building systems for both new design and retrofit projects. The text is thoroughly illustrated with tables, graphs, diagrams and sample problems.

**In North, Central & South
America** 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

Combined Heating, Cooling & Power Handbook

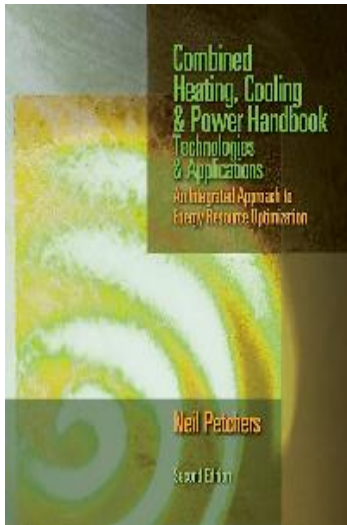
Author: Neil Petchers

ISBN: 9781466553347

e-ISBN: 9788770223003

Price: £ 200.00 | \$ 270.00

[Distributed exclusively by Routledge](#)



Description:

Completely revised, this second edition of a bestseller explores the latest technology advancements and the many changes and developments in the utility and environmental regulation areas. It includes new information on the state of deregulation and market pricing as well as discussion of smart grid and other emerging programs. The environmental sections reflect the current emphasis on greenhouse gas emissions and carbon management, updates to CAAA regulations and timelines and the latest developments in the use and control of refrigerants.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Thermodynamics Made Simple for Energy Engineers

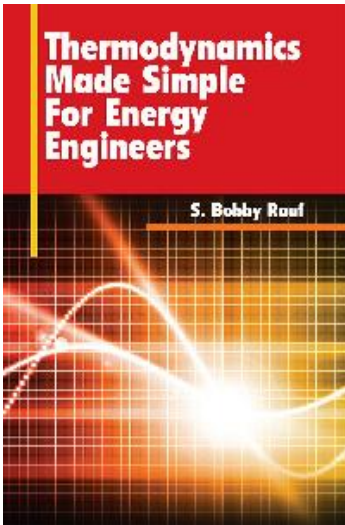
Author: S. Bobby Rauf

ISBN: 9781439852019

e-ISBN: 9788770222914

Price: £ 105.00 | \$ 145.00

Distributed exclusively by Routledge



Description:

This text provides an overview of important theory, principles, and concepts in the field of thermodynamics, making this abstract and complex subject easy to comprehend while building practical skills in the process. It enhances understanding of heat transfer, steam tables, energy concepts, power generation, psychrometry, refrigeration cycles, and more. Practical, easily accessible case studies illustrate various thermodynamics principles. Each chapter concludes with a list of questions or problems, with answers at the back of the book.

In North, Central & South
America 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

Handbook of Web Based Energy Information and Control Systems

Editors:

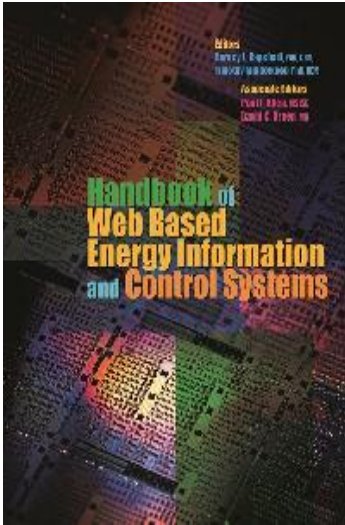
Barney L. Capehart and Timothy Middelkoop

ISBN: 9781439876848

e-ISBN: 9788770222983

Price: £ 145.00 | \$ 200.00

[Distributed exclusively by Routledge](#)



Description:

This book promotes the benefits of the development and application of energy information and control systems. This wave of information technology (IT) and web-based energy information and control systems (web based EIS/ECS) continues to roll on with increasing speed and intensity.

This handbook presents recent technological advancements in the field, as well as a compilation of the best information from three previous books in this area. The combined thrust of this information is that the highest level functions of the building and facility automation system are delivered by a web based EIS/ECS system that provides energy management, facility management, overall facility operational management and ties in with the enterprise resource management system for the entire facility or the group of facilities being managed.

River Publishers Series in Energy Engineering and Systems

Compressor Handbook

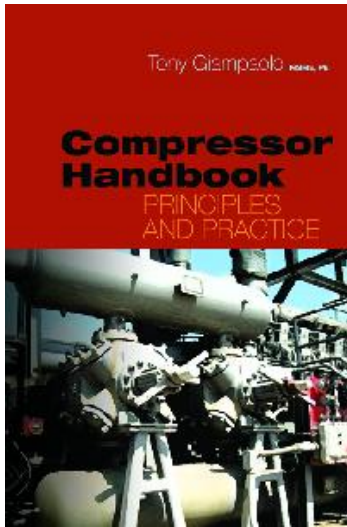
Author: Anthony Giampaolo

ISBN: 9781439815717

e-ISBN: 9788770222822

Price: £ 105.00 | \$ 145.00

Distributed exclusively by Routledge



Description:

This book provides a practical introduction to dynamic and positive displacement compressors, including compressor performance, operation, and problem awareness. In reading this book readers will learn what is needed to select, operate, and troubleshoot compressors. Complete with real-life case histories, the book demonstrates investigative techniques for identifying and isolating various contributing causes, including design deficiencies, manufacturing defects, adverse environmental conditions, operating errors, and intentional or unintentional changes of the machinery process that usually precede failure.

River Publishers Series in Energy Engineering and Systems

Electricity and Electronics Fundamentals, Second Edition

Authors:

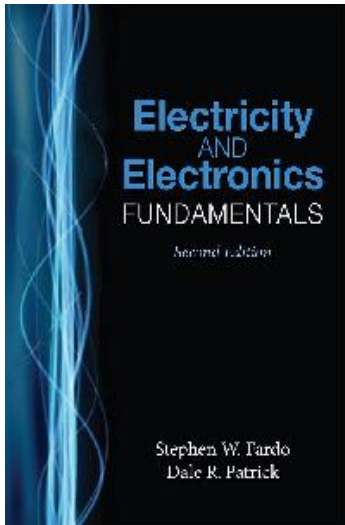
Dale R. Patrick and Stephen W. Fardo

ISBN: 9781420083873

e-ISBN: 9788770222747

Price: £ 94.99 | \$ 135.00

[Distributed exclusively by Routledge](#)



Description:

An introductory text, *Electricity and Electronics Fundamentals*, delineates key concepts in electricity using a simplified approach that enhances learning. Mathematical calculations are kept to the very minimum and concepts are demonstrated through application examples and illustrations. The books span of topics includes vital information on direct current electronics, alternating current electricity and semiconductor devices as well as electronic circuits, digital electronics, computers and microprocessors, electronic communications, and electronic power control. Supplementary appendices provide a glossary and section on electrical safety along with an explanation of soldering techniques.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Electronic Digital System Fundamentals

Authors:

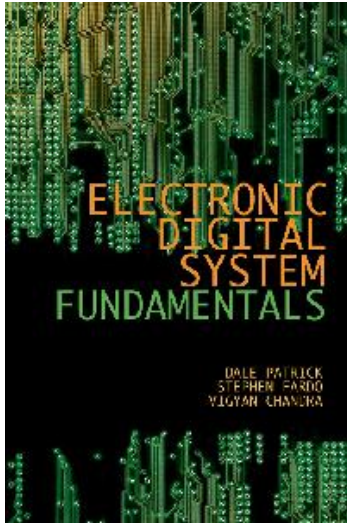
Dale R. Patrick, Stephen W. Fardo and Vigyan Chandra

ISBN: 9781420067743

e-ISBN: 9788770222686

Price: £ 86.99 | \$ 120.00

[Distributed exclusively by Routledge](#)



Description:

This self-study text explains the basics of digital electronics using a combination of fundamental theory, examples and practical applications. Digital devices form an integral part of numerous modern-day systems and include those used for operating electronic alarm systems, for performing arithmetic, timing and computing operations, and for logging, processing and data transfer. Well-illustrated, step-by-step procedures are provided for explaining the working of these and other digital devices. All the chapters in the text include a summary of the key points covered for the purpose of review. The recommended safety precautions, datasheets of selected digital devices, and implementation guidelines while working with digital circuits in the appendices, should be of interest to the electronics hobbyist.

In North, Central & South
America 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Lighting Controls Handbook

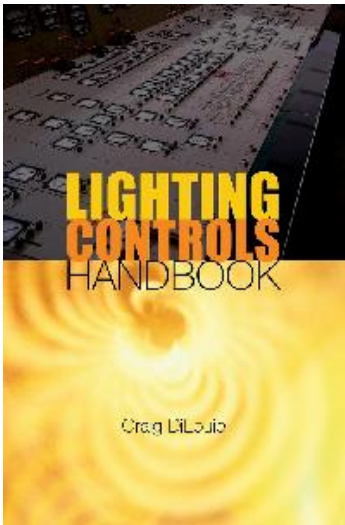
Author: Craig DiLouie

ISBN: 9781420069211

e-ISBN: 9788770222693

Price: £ 78.99 | \$ 110.00

Distributed exclusively by Routledge



Description:

Intended for energy managers, electrical engineers, building managers, lighting designers, consultants, and other electrical professionals, this book provides a practical description of major lighting controls types and how to apply them. It's a comprehensive step-by-step educational tour of lighting automation technology and its practical design and application, with useful discussion about the purpose and benefits of lighting controls, emphasizing the achieving of relevant energy savings, as well as support of occupant visual needs and preferences. The book shows readers how to take advantage of the many benefits of today's sophisticated controls, including expanded energy saving opportunities, and increased flexibility, reliability and interoperability.

In North, Central & South America 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778 9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Steam Turbines for Modern Fossil-Fuel Power Plants

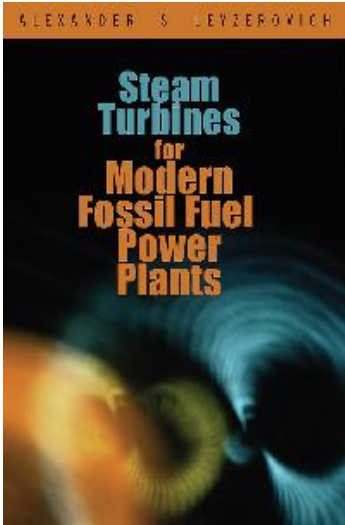
Author: Alexander S. Leyzerovich

ISBN: 9781420061024

e-ISBN: 9788770222679

Price: £ 100.00 | \$ 140.00

Distributed exclusively by Routledge



Description:

Presenting the newest approaches to the design and operation of steam turbines, this book also explores modern techniques for refurbishment of aging units. It covers recent engineering breakthroughs and new approaches to transient operating conditions, as well as improved information support for operational personnel. An authoritative guide for power plant engineers, operators, owners and designers on all of these crucial developments, this book fully describes and evaluates the most important new design and operational improvement opportunities for the full spectrum of today's steam turbines – from the newest and most advanced to the more common existing systems.

**In North, Central & South
America** 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

Web Based Enterprise Energy and Building Automation Systems

Editors:

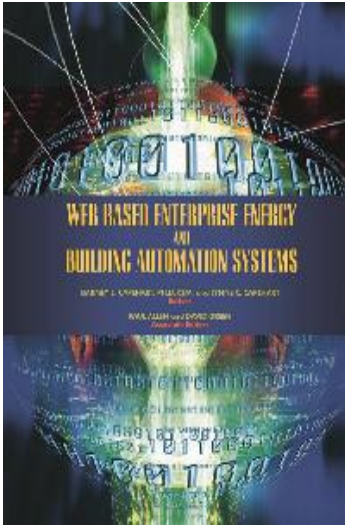
Barney L. Capehart and Lynne C. Capehart

ISBN: 9780849382352

e-ISBN: 9788770222525

Price: £ 160.00 | \$ 215.00

[Distributed exclusively by Routledge](#)



Description:

The capability and use of IT and web based energy information and control systems has expanded from single facilities to multiple facilities and organizations with buildings located throughout the world. This book answers the question of how to take the mass of available data and extract from it simple and useful information which can determine what actions to take to improve efficiency and productivity of commercial, institutional and industrial facilities. The book also provides insight into the areas of advanced applications for web based EIS and ECS systems, and the integration of IT/web based information and control systems with existing BAS systems.

River Publishers Series in Energy Engineering and Systems

Web Based Energy Information and Control Systems

Authors:

Barney L. Capehart and Lynne C. Capehart

ISBN: 9780849338984

e-ISBN: 9788770222464

Price: £ 155.00 | \$ 215.00

Distributed exclusively by Routledge



Description:

Advances in new equipment, new processes, and new technology are the driving forces in improvements in energy management, energy efficiency and energy cost control. The purpose of this book is to document the operational experience with web based systems in actual facilities and in varied applications, and to show how new opportunities have developed for energy and facility managers to quickly and effectively control and manage their operations. You'll find information on what is actually happening at other facilities, and see what is involved for current and future installations of internet-based technologies. The case studies and applications described should greatly assist energy, facility and maintenance managers, as well as consultants and control systems development engineers.

River Publishers Series in Energy Engineering and Systems

Rotating Machinery

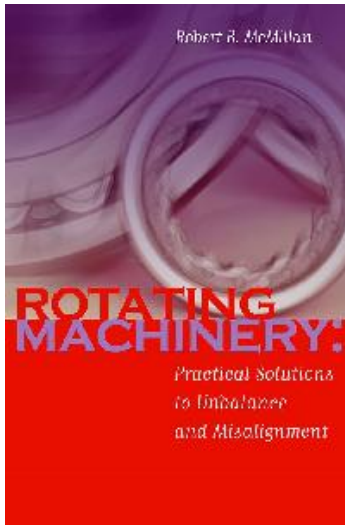
Author: Robert B. McMillan

ISBN: 9780824750527

e-ISBN: 9788770222433

Price: £ 80.99 | \$ 110.00

Distributed exclusively by Routledge



Description:

A theoretical and practical understanding of unbalance and misalignment in rotating equipment is presented here. These two conditions account for the vast majority of problems with rotating equipment encountered in the real world.;Numerous examples and solutions are included to assist in understanding the various concepts. Included is information on vibration and how it is used to determine the operational integrity of rotating machinery. Also detailed are the relationships between various vibration characteristics which provide an understanding of the forces generated within operating machinery when conditions of unbalance and misalignment are present. Resonance and beat frequencies are detailed along with sources and cures.;Also covered are proper inspection procedures, single plane and dual plane methods of balancing rotating equipment, the three circle method of balancing slow speed fans, advanced rim and face method of precision alignment, and the reverse indicator method of alignment plus much more to fortify the learning experience.



River Publishers

RIVER

River Publishers Series in Energy Engineering and Systems

Practical Controls

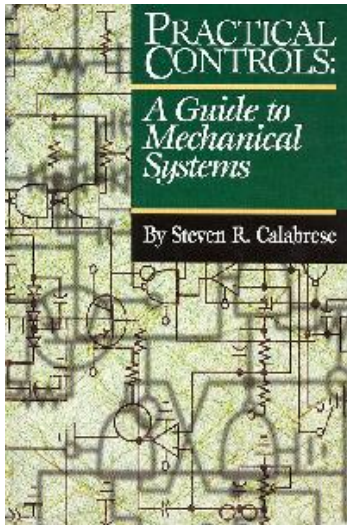
Author: Steven R. Calabrese

ISBN: 9780824746186

e-ISBN: 9788770222419

Price: £ 115.00 | \$ 155.00

[Distributed exclusively by Routledge](#)



Description:

Geared toward the HVAC professional, *Practical Controls: A Guide to Mechanical Systems* provides a solid foundation and well-rounded understanding of the role of controls in mechanical systems design and installation. This book takes a concise look at HVAC controls and controls methods - including electrical, electronic, and microprocessor-based controls and control systems. Using "real world" examples, it explores how various mechanical systems installed in today's facilities are best controlled. The text is a practical resource to controls contracting, providing basic rules, equipment guidelines, rules of thumb, pros and cons, and do's and don'ts.

**In North, Central & South
America** 1-800-634-7064 (toll-free)
orders@crcpress.com

In Australia and New Zealand +61 2 8778
9999
orders@tldistribution.com.au

In the United Kingdom/Rest of World
+44 (0) 1235 400524
tandf@bookpoint.co.uk

River Publishers Series in Energy Engineering and Systems

HVAC Procedures & Forms Manual, Second Edition

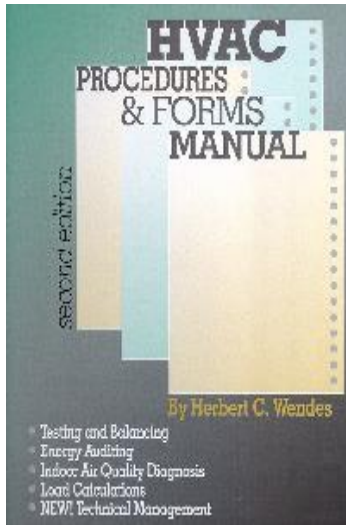
Author: Herbert C. Wendes

ISBN: 9780824709235

e-ISBN: 9788770222242

Price: £ 95.99 | \$ 130.00

Distributed exclusively by Routledge



Description:

Developed over the course of many years of on-the-job projects involving HVAC energy auditing, testing/balancing and cost estimating, and refined through feedback from thousands of engineers and technicians who have used them, the forms contained in this manual are concise, comprehensive, and optimally organized for easy reference. Complete sets of forms are provided for all aspects of testing and balancing, energy auditing, indoor quality diagnosis, and load calculations. The first edition, entitled HVAC Energy Audit & Balancing Forms Manual compiled these time-saving forms for the first time in a single reference. This enhanced second edition adds a new chapter on technical management, providing procedures for achieving thorough, systematic and accurate problem solving, troubleshooting and decision making in building systems management and contracting.

River Publishers Series in Energy Engineering and Systems

Revolution in Lamps

Editors:

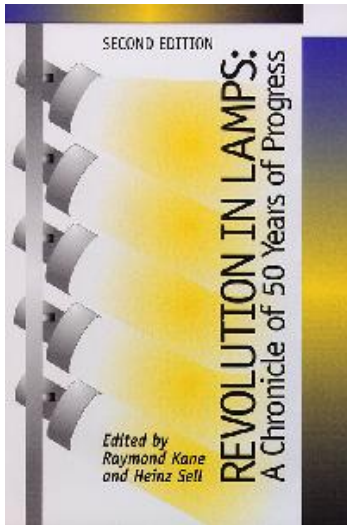
Raymond Kane and Heinz Sell

ISBN: 9780824709174

e-ISBN: 9788770222228

Price: £ 95.99 | \$ 0.04

[Distributed exclusively by Routledge](#)



Description:

Written for designers, engineers, architects and others involved with application of modern lamps and lighting systems, this book provides a comprehensive accounting of current lamp technologies, covering both the fundamental technologies on which they are based and trends in their use, both historical and current. You'll learn about how recent innovations such as those involving LEDs, electrodeless lamps, ballasts and circuitry are continuing to improve lamp efficacy, as well as how specialized lamp requirements have fostered development of special-purpose lighting, such as for non-visual, for health, and for high performance applications. The full spectrum of current lamp technologies are examined in clear, non-technical language with ample illustration.