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Occupant Behaviour in Buildings: Advances and Challenges Green Building: Principles and Practices in Residential Construction Certain Expiring Tax Provisions Intelligent Communication, Control and Devices Technologies and Innovation Standards for Thermal Comfort The Residential Energy Audit Manual Beyond Environmental Comfort Urban Heat Stress and Mitigation Solutions Official Gazette of the United States Patent and Trademark Office ZEMCH: Toward the Delivery of Zero Energy Mass Custom Homes The Political Economy of Low Carbon Transformation Thermal Comfort in Hot Dry Climates Public Utilities Fortnightly Energy Abstracts for Policy Analysis Energy Healing at Home Thermal Comfort Assessment of Buildings HUD Research Thesaurus Comfort in a Lower Carbon Society

Intelligent Communication, Control and Devices Dec 07 2020 The book focuses on the integration of intelligent communication systems, control systems, and devices related to all aspects of engineering and sciences. It contains high-

quality research papers presented at the 2nd international conference, ICICCD 2017, organized by the Department of Electronics, Instrumentation and Control Engineering of University of Petroleum and Energy Studies, Dehradun on 15 and 16 April, 2017. The volume broadly covers recent advances of intelligent communication, intelligent control and intelligent devices. The work presented in this book is original research work, findings and practical development experiences of researchers, academicians, scientists and industrial practitioners.

Materials for Energy Efficiency and Thermal Comfort in Buildings Dec 31 2022 Almost half of the total energy produced in the developed world is inefficiently used to heat, cool, ventilate and control humidity in buildings, to meet the increasingly high thermal comfort levels demanded by occupants. The utilisation of advanced materials and passive technologies in buildings would substantially reduce the energy demand and improve the environmental impact and carbon footprint of building stock

worldwide. Materials for energy efficiency and thermal comfort in buildings critically reviews the advanced building materials applicable for improving the built environment. Part one reviews both fundamental building physics and occupant comfort in buildings, from heat and mass transport, hygrothermal behaviour, and ventilation, on to thermal comfort and health and safety requirements. Part two details the development of advanced materials and sustainable technologies for application in buildings, beginning with a review of lifecycle assessment and environmental profiling of materials. The section moves on to review thermal insulation materials, materials for heat and moisture control, and heat energy storage and passive cooling technologies. Part two concludes with coverage of modern methods of construction, roofing design and technology, and benchmarking of façades for optimised building thermal performance. Finally, Part three reviews the application of advanced materials, design and technologies in a range of existing and new building types, including

domestic, commercial and high-performance buildings, and buildings in hot and tropical climates. This book is of particular use to, mechanical, electrical and HVAC engineers, architects and low-energy building practitioners worldwide, as well as to academics and researchers in the fields of building physics, civil and building engineering, and materials science. Explores improving energy efficiency and thermal comfort through material selection and sustainable technologies Documents the development of advanced materials and sustainable technologies for applications in building design and construction Examines fundamental building physics and occupant comfort in buildings featuring heat and mass transport, hygrothermal behaviour and ventilation

Guide to Green Building Rating Systems

Dec 19 2021 The one-stop guide for choosing a green building rating system Today, sustainability is a growing concern for the architects, designers, builders, and owners of commercial and residential buildings. Meeting the requirements of a

rating system provides a metric to evaluate and set priorities. But the variety and complexity of methods available to assess the eco-friendliness of a building can seem overwhelming. Guide to Green Building Rating Systems informs readers about the rating system selection process. Comparing essential issues such as cost, ease of use, and building performance, this book offers solid guidance that will help readers find the rating system that best fits their needs. This easy-to-follow reference includes: An overview of the major national rating systems, including LEED®, Green Globes®, the National Green Building Standard, and ENERGY STAR® An in-depth look at each rating system, including its evolution, objectives, point structure, levels of certification, benefits, and shortcomings How the ratings systems work for different types of buildings—commercial, multi-family residential, and single-family residential construction Illustrated case studies from different climate regions with project descriptions, cost data, and lessons learned by design teams,

constructors, and owners An overview of local, regional, and international rating systems Guide to Green Building Rating Systems demystifies complex material, making this book an essential reference for building professionals engaged in, or wishing to pursue, sustainable building practices.

Urban Heat Stress and Mitigation Solutions Jul 02 2020 This book provides the reader with an understanding of the impact that different morphologies, construction materials and green coverage solutions have on the urban microclimate, thus affecting the comfort conditions of urban inhabitants and the energy needs of buildings in urban areas. The book covers the latest approaches to energy and outdoor comfort measurement and modelling on an urban scale, and describes possible measures and strategies to mitigate the effects of the mutual interaction between urban settlements and local microclimate. Despite its relevance, only limited literature is currently devoted to appraising—from an engineering perspective—the intertwining relationships

between urban geometry and fabrics, energy fluxes between buildings and their surroundings, outdoor microclimate conditions and building energy demands in urban areas. This book fills this gap by first discussing the physical processes that govern heat and mass transfer at an urban scale, while emphasizing the role played by different spatial arrangements, manmade materials and green infrastructures on the outdoor microclimate. The first chapters also address the implications of these factors on the outdoor comfort conditions experienced by pedestrians, and on the buildings' energy demand for space heating and cooling. Then, based upon cutting-edge experimental activities and simulation work, this book demonstrates current and forthcoming adaptation and mitigation strategies to improve the urban microclimate and its impact on the built environment, such as cool materials, thermochromic and retroreflective finishing materials, and green infrastructures applied either at a building scale or at the urban scale. The

effect of these solutions is demonstrated for different cities worldwide under a range of climate conditions. Finally, the book opens a wider perspective by introducing the basic elements that allow fuel poverty, raw materials consumption, and the principles of circular economy in the definition of a resilient urban settlement.

Energy-smart Building for Increased Quality, Comfort, and Sales Jul 14 2021

Official Gazette of the United States Patent and Trademark Office May 31 2020

Home Comforts Sep 27 2022 Ranging from suggestions for the care of musical instruments to maintaining home safety, a celebration of and guide to the finer points of home-keeping offers a contemporary, creative, and positive take on a traditional subject

Managing Energy Use in Modern Buildings Aug 15 2021 This timely volume brings together case studies that address the urgent need to manage energy use and improve thermal comfort in modern buildings while preserving their historic significance and character. This

collection of ten case studies addresses the issues surrounding the improvement of energy consumption and thermal comfort in modern buildings built between 1928 and 1969 and offers valuable lessons for other structures facing similar issues. These buildings, international in scope and diverse in type, style, and size, range from the Shulman House, a small residence in Los Angeles, to the TD Bank Tower, a skyscraper complex in Toronto, and from the Calouste Gulbenkian Foundation, a cultural venue in Lisbon, to the Van Nelle Factory in Rotterdam, now an office building. Showing ingenuity and sensitivity, the case studies consider improvements to such systems as heating, cooling, lighting, ventilation, and controls. They provide examples that demonstrate best practices in conservation and show ways to reduce carbon footprints, minimize impacts to historic materials and features, and introduce renewable energy sources, in compliance with energy codes and green-building rating systems. The Conserving Modern Heritage series, launched in 2019, is written by

architects, engineers, conservators, scholars, and allied professionals. The books in this series provide well-vetted case studies that address the challenges of conserving twentieth-century heritage.

Adaptive Thermal Comfort: Principles and Practice Mar 22 2022 The fundamental function of buildings is to provide safe and healthy shelter. For the fortunate they also provide comfort and delight. In the twentieth century comfort became a 'product' produced by machines and run on cheap energy. In a world where fossil fuels are becoming ever scarcer and more expensive, and the climate more extreme, the challenge of designing comfortable buildings today requires a new approach. This timely book is the first in a trilogy from leaders in the field which will provide just that. It explains, in a clear and comprehensible manner, how we stay comfortable by using our bodies, minds, buildings and their systems to adapt to indoor and outdoor conditions which change with the weather and the climate. The book is in two sections. The first introduces the principles on which the theory of

adaptive thermal comfort is based. The second explains how to use field studies to measure thermal comfort in practice and to analyze the data gathered. Architects have gradually passed responsibility for building performance to service engineers who are largely trained to see comfort as the ‘product’, designed using simplistic comfort models. The result has contributed to a shift to buildings that use ever more energy. A growing international consensus now calls for low-energy buildings. This means designers must first produce robust, passive structures that provide occupants with many opportunities to make changes to suit their environmental needs. Ventilation using free, natural energy should be preferred and mechanical conditioning only used when the climate demands it. This book outlines the theory of adaptive thermal comfort that is essential to understand and inform such building designs. This book should be required reading for all students, teachers and practitioners of architecture, building engineering and management – for all who have a role in

producing, and occupying, twenty-first century adaptive, low-carbon, comfortable buildings.

Thermal Inertia in Energy Efficient Building Envelopes Aug 27 2022 The design and construction of the appropriate building envelope is one of the most effective ways for improving a building's thermal performance. Thermal Inertia in Energy Efficient Building Envelopes provides the optimal solutions, tools and methods for designing the energy efficient envelopes that will reduce energy consumption and achieve thermal comfort and low environmental impact. Thermal Inertia in Energy Efficient Building Envelopes provides experimental data, technical solutions and methods for quantifying energy consumption and comfort levels, also considering dynamic strategies such as thermal inertia and natural ventilation. Several type of envelopes and their optimal solutions are covered, including retrofit of existing envelopes, new solutions, passive systems such as ventilated facades and solar walls. The discussion also considers

various climates (mild or extreme) and seasons, building typology, mode of use of the internal environment, heating profiles and cross-ventilation Experimental investigations on real case studies, to explore in detail the behaviour of different envelopes Laboratory tests on existing insulation to quantify the actual performances Analytical simulations in dynamic conditions to extend the boundary conditions to other climates and usage profiles and to consider alternative insulation strategies Evaluation of solutions sustainability through the quantification of environmental and economic impacts with LCA analysis; including global cost comparison between the different scenarios Integrated evaluations between various aspects such as comfort, energy saving, and sustainability

Energy Research Abstracts Jun 24 2022

Renewable Energy for Buildings Nov 17 2021 The book covers practical applications and experimental results of integrating renewable energy technologies, energy storage facilities, and intelligent

control and operation techniques into building energy systems. It introduces practical approaches to improving the energy systems of buildings in order to reduce energy consumption and cost. Renewable Energy for Buildings is suitable for retrofit engineers, energy engineers, and professionals, as well as researchers and developers in electrical engineering, architectural engineering, and mechanical engineering. Moreover, it can be used by undergraduate and graduate students to become familiar with the most recent developments in building energy systems. Examines the most recent developments in building energy systems; Looks at practical applications and theoretical aspects; Includes case studies.

Energy Abstracts for Policy Analysis Dec 27 2019

Standards for Thermal Comfort Oct 05 2020 Current Standards for Indoor Air Temperature are inappropriate in many regions of the world. This forces designers to use highly serviced buildings to achieve air temperatures that accord with the standards to the detriment of the

local and global environment. Standards for Thermal Comfort brings together contributions from around the world, reflecting new approaches to the setting of standards which can apply to all climates and cultures.

Thermal Comfort in Hot Dry Climates Feb 27 2020 With increases in global temperatures, the risk of overheating is expected to rise around the world. This results in a much higher dependency upon energy-intensive cooling systems and air-conditioners to provide thermal comfort, but how sustainable is this in a world where problems with the production of electricity are predicted? Vernacular houses in hot and dry central Iran have been adapted to the climate through passive cooling techniques, and this book provides a valuable assessment of the thermal performance of such housing. Shedding new light on the ability of traditional housing forms to provide thermal comfort, Thermal Comfort in Hot Dry Climates identifies the main cooling systems and methods in traditional houses in central Iran, and examines how

architectural elements such as central courtyards, distinct seasonal rooms, loggias, basements and wind-catchers can contribute to the provision of thermal comfort in vernacular houses.

Scientific and Technical Aerospace Reports Feb 18 2022 Lists citations with abstracts for aerospace related reports obtained from world wide sources and announces documents that have recently been entered into the NASA Scientific and Technical Information Database.

Residential Energy Consumption Survey Apr 10 2021

Certain Expiring Tax Provisions Jan 08 2021

Energy Sep 15 2021

Technologies and Innovation Nov 05 2020 This book constitutes the proceedings of the 5th International Conference on Technologies and Innovation, CITI 2019, held in Guayaquil, Ecuador, in December 2019. The 14 full papers presented in this volume were carefully reviewed and selected from 32 submissions. They are organized in topical sections named: ICT in agronomy; knowledge-based systems and

pattern recognition; internet of things and computer architecture.

Architecture - Comfort and Energy Oct 29 2022 In this book we seek to approach the architecture-energy combination and its relationship to human comfort and the environment .There are chapters on thermal comfort, low energy architecture dealing with various criterion for comfort in different parts of the World. The book also seeks to understand how previous generations lived in harsh climates and without abundant sources of energy, yet managed to design and build appropriate dwellings providing both comfort and harmony with the environment. Other chapters deal with the bioclimatic concept in Vernacular Architecture; the major role which climate plays at different locations and how this can dictate the shape and form of the buildings and save energy; the importance of micro-climate and its various elements and usage; ventilation and its importance in buildings and the technology for modern architecture.

Public Utilities Fortnightly Jan 26 2020 Includes, as a separate section, reprints

from Public utilities reports, annotated 1928-33, and from Public utilities reports (new series) 1934-

The Home Comfort Book Nov 29 2022 Are rooms of your house uncomfortable or unusable at different times of the year? Is your home drafty in winter? Do you get hit with a wave of heat walking upstairs in summer? Are mold or pests frequent problems in your home? Do you get big icicles in winter? Do you suspect your home is making you sick? Do you sleep better out of your house? Do you have a damp, dank basement? How about air quality problems like dust or odors? Are you ready to solve those problems? Then this book is for you. Before you can solve a problem, you need to understand what is causing the problem. This book explains how your home actually works so you can address root causes, not symptoms. We've seen far too many folks waste thousands of dollars addressing the wrong problem. Armed with this book, you can find the right pros to solve problems, understand if the work was done right, and even DIY many things yourself. This is the book I wish I had

when I entered the Home Performance eld. It connects theory to action and shows real world examples of work being done and the results achieved. It assumes you're a building science novice as well as smart and willing to learn. You'll learn about how your home works, what to look for in a new heating and cooling (HVAC) system, what kinds of insulation work best and why, how to choose and install the right bath fan, and more. Everything in this book is backed up by field experience, data, and an overwhelming passion to do things right the first time.

Beyond Environmental Comfort Aug 03 2020 Beyond Environmental Comfort highlights some of the key ideas that form the foundation of the field of environmental comfort and, at the same time, gives voice to some of the concerns and considerations on the limitations of the field as it stands today. Bringing together a range of foremost thinkers in their respective fields - Michel Cabanac, Derek Clements-Croome, Nick Baker, Harold Marshall, Juhani Pallasmaa, Dean Hawkes, and Constance Classen - this book argues for a

deeper appreciation of how environmental comfort may be understood in terms of our relationship with the environment rather than as independent qualities. For the first time these diverse views are brought together by Editor Boon Lay Ong to present insights into a world beyond what is normally covered in academic research. In the process, an attempt is made to define the field for the future. This book shows that it is by understanding just how environmental design needs to go beyond mere comfort and deal with well-being that we can meaningfully design our future.

Occupant Behaviour in Buildings: Advances and Challenges Mar 10 2021 Occupant behaviour in buildings is a point of interest for building designers around the world. Functional buildings have a significant energy demand; therefore, improving the thermal and energy performance of such buildings requires knowledge about the variables that influence them. However, to increase the potential for improving thermal and energy performance of buildings, studies must also consider the occupant’s interactions

with the built environment. The occupant behaviour influences the conditions of the internal environment through the occupation of indoor building spaces and through the interaction with building elements, such as air-conditioning, lighting, blinds and windows. Occupant Behaviour in Buildings: Advances and Challenges brings together reviews of these influential aspects, presenting updates on advances and questions that pose challenges in our current understanding of behavioural modeling and its application to building design. Special topics covered in the book include methods to survey occupant behavior, building design choices, occupant behaviour impact on a building's thermal and energy efficiency, and,finally, a simulation of occupants in a building. Key Features- Presents up-to-date information on occupant behaviour in buildings- Eight chapters, written by renowned researchers, provide readers with useful insights on the subject- Includes a case study of buildings in Brazil- Structured reader-friendly content- References for further

reading This reference is an informative resource for students and professionals in architecture, civil engineering, building information design, and urban planning. Readers interested in social and behavioural sciences will also gain insights on research methods that are helpful in investigating human behavior in urban dwellings.

HUD Research Thesaurus Sep 23 2019

The Citizen's Guide to Climate Success May 12 2021 Shows readers how we can all help solve the climate crisis by focusing on a few key, achievable actions.

ZEMCH: Toward the Delivery of Zero Energy Mass Custom Homes Apr 30 2020 In this book, leading international experts explore the emerging concept of the zero energy mass custom home (ZEMCH) – designed to meet the need for social, economic, and environmental sustainability – and provide all of the knowledge required for the delivery of zero energy mass customized housing and community developments in developed and developing countries. The coverage is wide ranging, progressing from explanation of the meaning of sustainable

development to discussion of challenges and trends in mass housing, the advantages and disadvantages of prefabricated methods of construction, and the concepts of mass customization, mass personalization, and inclusive design. A chapter on energy use will aid the reader in designing and retrofitting housing to reduce energy demand and/or improve energy end?use efficiency. Passive design strategies and active technologies (especially solar) are thoroughly reviewed. Application of the ZEMCH construction criteria to new buildings and refurbishment of old houses is explained and the methods and value of building performance simulation, analyzed. The concluding chapter presents examples of ZEMCH projects from around the world, with discussion of marketing strategy, design, quality assurance, and delivery challenges. The book will be invaluable as a training/teaching tool for both students and industry partners.

Advances on P2P, Parallel, Grid, Cloud and Internet Computing Oct 17 2021 This book presents the latest, innovative research findings on P2P, Parallel, Grid,

Cloud, and Internet Computing. It gathers the Proceedings of the 12th International Conference on P2P, Parallel, Grid, Cloud and Internet Computing, held on November 8–10, 2017 in Barcelona, Spain. These computing technologies have rapidly established themselves as breakthrough paradigms for solving complex problems by enabling the aggregation and sharing of an increasing variety of distributed computational resources at large scale. Grid Computing originated as a paradigm for high-performance computing, offering an alternative to expensive supercomputers through different forms of large-scale distributed computing, while P2P Computing emerged as a new paradigm after client-server and web-based computing and has shown to be useful in the development of social networking, B2B (Business to Business), B2C (Business to Consumer), B2G (Business to Government), B2E (Business to Employee), and so on. Cloud Computing has been defined as a “computing paradigm where the boundaries of computing are determined by economic rationale rather than technical limits”. Cloud computing

has quickly been adopted in a broad range of application domains and provides utility computing at large scale. Lastly, Internet Computing is the basis of any large-scale distributed computing paradigm; it has very rapidly developed into a flourishing field with an enormous impact on today's information societies, serving as a universal platform comprising a large variety of computing forms such as Grid, P2P, Cloud and Mobile computing. The aim of the book "Advances on P2P, Parallel, Grid, Cloud and Internet Computing" is to provide the latest findings, methods and development techniques from both theoretical and practical perspectives, and to reveal synergies between these large-scale computing paradigms.

Designing Comfortable Homes Jul 26 2022

The Political Economy of Low Carbon Transformation Mar 29 2020 Deep reductions in energy use and carbon emissions will not be possible within political economies that are driven by the capitalist imperatives of growth, commodification and individualization. As such, it has now

become necessary to understand the relationship between capitalism and the emergence of high energy habits. Using the examples of home energy, transport and food, The Political Economy of Low Carbon Transformation articulates the relationship between the politics of economic expansion and the formation of high-energy habits at the level of family and household. The book elaborates a theory of habit and how it can contribute to this relationship. It critiques mainstream green economy and green energy prescriptions for low carbon transformation that take economic growth for granted and ignore habits formed in a material world designed and built for high energy use. The book explores the growing number of communities around the world that are engaged in collaborative efforts to reform their community and household habits in ways that are less environmentally intrusive. It assesses their potential to make an impact on national and urban low carbon political agendas. The book is aimed at a large and growing interdisciplinary audience

interested in the relationship between political economy, consumption and sustainability.

Energy: a Continuing Bibliography with Indexes Jan 20 2022

The Home Energy Decision Book Jun 12 2021 This comprehensive survey of retrofitting options for increased energy efficiency covers both major reconstruction and smaller alternatives and explains how to do a home energy audit

Energy Healing at Home Nov 25 2019 Alternative medicine has never been so easy and accessible! Experience energy healing in the comfort of your own home. Use energy medicine for health, love, peace, joy, vitality, mental, and physical health. Praise for Grace Whisenant: "I have many friends that use crystals, and I'm pretty skeptical about them, but this book has given me a new perspective on them." - 5 Star Amazon Reviewer for The Healing Power of Crystals for Your Body, Heart, Mind & Soul What if you could be healthier? What if you could take seemingly simple steps to achieve healing in nearly any part of your body? What if I

told you that this practice can be done right from the comfort of your own home? Energy medicine can help you achieve your highest and greatest good by balancing your body's natural energies. In this easy to use guide, Energy Healing at Home, I will show you in simple steps how to harness your body's own healing powers. I will guide you through different energy healing techniques such as Reiki, chakra healing, crystals, Eden energy medicine, qigong, and yoga. Accept everything with an open and positive mind because we all know that the mind is a powerful thing. It's undeniable that even with all the scientific achievements the human race has achieved, we still can't fully understand how the mind works. I have been studying the power of healing crystals and gems for over 10 years now. In my research and trial and error, I also explored other energy balancing techniques. Each of these practices has it's boundaries and limitations to where I found that employing a mix of techniques worked best for me. I now write guest blog posts and conduct energy healing sessions from my

home for friends, family, and a select few paying clients. In my book, Energy Healing at Home, I will teach you everything I know about different energy medicine practices. Healing through your body's energy, your chakras, aura, and alignment, can be a powerful tool. Knowing how best to use this tool can only benefit you. My deepest wish is for you to be healed mentally, physically, spiritually, or whatever way you perceive is necessary. I hope you find something that works for you and your situation, whatever that may be. You will be amazed at how instantly energy healing can help you! In this book, you will learn about many different energy healing practices, including: Energy Medicine and Self-Treatment: Where It All Began The Six Pillars of Energy Medicine Donna Eden's Energy Medicine Reiki Traditional Chinese Medicine Acupuncture Tui na and Acupressure Moxibustion Cupping/scraping Nutrition Herbs/Medicinal Plants Qigong Ayurveda and the Chakra System Crystal Healing How to Use Energy Medicine At Home Basic Breathing Exercises Yoga Pranayama Techniques Easy Qigong

Breathing Exercise How to Clean, Activate, and Program Your Crystals How to Manifest Your Intention And an Honest Discussion About the Placebo Effect Beloved, I have tried my very best to explain the world of energy medicine to you in a way that is easy to understand. All I ask is that you have an open mind! You will want to click BUY NOW to add this title to your collection.

Energy Conservation in Residential, Commercial, and Industrial Facilities Apr 22 2022 An authoritative and comprehensive guide to managing energy conservation in infrastructures Energy Conservation in Residential, Commercial, and Industrial Facilities offers an essential guide to the business models and engineering design frameworks for the implementation of energy conservation in infrastructures. The presented models of both physical and technological systems can be applied to a wide range of structures such as homes, hotels, public facilities, industrial facilities, transportation, and water/energy supply systems. The authors—noted experts in the field—explore

the key performance indicators that are used to evaluate energy conservation strategies and the energy supply scenarios as part of the design and operation of energy systems in infrastructures. The text is based on a systems approach that demonstrates the effective management of building energy knowledge and supports the simulation, evaluation, and optimization of several building energy conservation scenarios. In addition, the authors explore new methods of developing energy semantic network (ESN) superstructures, energy conservation optimization techniques, and risk-based life cycle assessments. This important text: Defines the most effective ways to model the infrastructure of physical and technological systems Includes information on the most widely used techniques in the validation and calibration of building energy simulation Offers a discussion of the sources, quantification, and reduction of uncertainty Presents a number of efficient energy conservation strategies in infrastructure systems, including HVAC, lighting, appliances, transportation, and

industrial facilities Describes illustrative case studies to demonstrate the proposed energy conservation framework, practices, methods, engineering designs, control, and technologies Written for students studying energy conservation as well as engineers designing the next generation of buildings, Energy Conservation in Residential, Commercial, and Industrial Facilities offers a wide-ranging guide to the effective management of energy conservation in infrastructures.

Comfort in a Lower Carbon Society Aug 22 2019 Current expectations and standards of comfort are almost certainly unsustainable and new methods and ideas will be required if there is to be any prospect of a significantly lower carbon society. This collection reassesses relationships between people and the multitude of environments they inhabit in the context of increasing carbon intensities of everyday life. In this bold and unconventional volume historians, sociologists, environmentalists, geographers, and cultural theorists provoke and stimulate debate about the

future of comfort in a lower carbon society. These contributions are then subject to critical commentary from a range of academic and policy perspectives. The result is a book that promotes academic and policy discussion of the environmental consequences of indoor climate change around the world, and that offers new perspectives and strategies for moving towards a lower carbon future. This book was published as a special issue of Building Research & Information.

Thermal Comfort Assessment of Buildings

Oct 24 2019 A number of metrics for assessing human thermal response to climatic conditions have been proposed in scientific literature over the last decades. They aim at describing human thermal perception of the thermal environment to which an individual or a group of people is exposed. More recently, a new type of “discomfort index” has been proposed for describing, in a synthetic way, long-term phenomena. Starting from a systematic review of a number of long-term global discomfort indices, they are then contrasted and compared on a reference

case study in order to identify their similarities and differences and strengths and weaknesses. Based on this analysis, a new short-term local discomfort index is proposed for the American Adaptive comfort model. Finally, a new and reliable long-term general discomfort index is presented. It is delivered in three versions and each of them is suitable to be respectively coupled with the Fanger, the European Adaptive and the American Adaptive comfort models.

The Residential Energy Audit Manual Sep 03 2020 This fully updated edition is a guide for techniques and guidelines on implementing a residential energy audit programme. Step by step the manual shows how to perform an energy audit of the home, offering authoritative advice from energy specialists.

Super House May 24 2022 "Guides lay readers through the design of a custom residential house that emphasizes energy efficiency, comfort, environmental health, structural strength, fire safety, and beauty. Economy is achieved with conventional materials and building

practices. Also intended for home renovations and repairs. Includes a section on alternative energy technologies. Fully illustrated"--

Green Building: Principles and Practices in Residential Construction Feb 06 2021 GREEN BUILDING: PRINCIPLES AND PRACTICES IN RESIDENTIAL CONSTRUCTION provides a current, comprehensive guide to this exciting, emerging field. From core concepts to innovative applications of cutting-edge technology and the latest industry trends, this text offers an in-depth introduction to the construction of green homes. Unlike many texts that adopt a product-oriented approach, this book emphasizes the crucial planning, processes, and execution methods necessary for effective, environmentally sound construction. This text demonstrates that Earth-friendly products and energy-efficient materials take planning in order to make a building truly green. This visionary text helps students and professionals develop the knowledge and skills to think green from start to finish, empowering and inspiring them to

build truly sustainable homes. Important Notice: Media content referenced within the product description or the product text may not be available in the ebook version.

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