

Energy Efficiency How To Use Less Energy In Your Home And Save Money On Electricity

The majority of electrical energy consumed in most industrial facilities is used to run electric motors. Annual energy operating costs of electric motors usually far exceed purchase prices. For example, a typical 25 horsepower (hp) motor running at full load for 6,000 hours per year would consume nearly \$10,000 of electricity annually. An average purchase price for a motor of this size would be only \$500 to \$600. Energy efficiency decisions are important decisions that affect operating cost for the life of the equipment. By optimizing the efficiency of your motor-driven systems, you can increase productivity while achieving substantial energy and dollar savings. Opportunities for energy conservation are wide spread and applicable to new as well as old plants. It is important to note that majority of savings shall accrue not on the motor itself but on the motor-driven system as a whole. This 6 - hour Quick Book provides 20 different strategies to guide you into the electric motor evaluation process and highlights common ways you can improve system efficiency and reliability to achieve permanent long-term electric cost reduction. This course is aimed at students, electrical & control engineers, energy auditors, operational & maintenance engineers, contractors and system designers who are responsible for design and operation of the system. Learning Objective At the conclusion of this course, the reader will understand:

- Characteristics, types and classification of motors based on NEMA;
- Fixed and variable losses of induction motors;
- Power quality and impact of voltage/phase imbalance and power factor on motor performance;
- Motor efficiency v/s motor load and motor load v/s speed relationships
- Motor load estimation techniques;
- Comparison of Energy Efficient v/s Standard Motors;
- Cost evaluating methods & simple payback analysis of motor replacement;
- Application of variable speed drives on motor energy savings;
- Motor transmission efficiency using synchronous belts/soft starters;
- Starting systems viz. direct-on-line, delta star controllers;
- Motors repair or replacement decisions;
- Monitoring and maintenance practices.

A large amount of energy is consumed in the industry to meet the power needed for production processes. In order to meet the heat and mechanical power needs required for many industrial processes, natural gas, petroleum fuel, and electricity are mostly used as energy sources. In addition to the efficient use of energy in order to reduce operating costs in industrial applications, alternatives such as efficient use of energy for conservation of resources and climate, energy recovery, renewable energy preferences, and energy production from wastes are becoming more common. With proper energy management, it is possible to increase energy efficiency independently of the size of the industry and the technologies used in the process. The development of new alternatives for energy efficiency and saving is crucial to meet the growing world energy needs and to compete effectively with fossil fuels and thus reduce greenhouse gases. This small book is a collection of research and reviewed chapters dealing with energy-efficient materials and strategies in different conditions. The Editors would like to record their sincere thanks to the authors for their contributions.

Efficient Use and Conservation of Energy is a component of Encyclopedia of Energy Sciences, Engineering and Technology Resources in the global Encyclopedia of Life Support Systems (EOLSS), which is an integrated compendium of twenty Encyclopedias. The volume on Efficient Use and Conservation Of Energy discusses matters of great relevance to our world such as: Efficient Use and Conservation of Energy in the Industrial Sector; Efficient Use and Conservation of Energy in Buildings; Efficient Use and Conservation of Energy in the Transportation Sector; Efficient Use and Conservation of Energy in the Agricultural Sector; Using Demand-Side Management to Select Energy Efficient Technologies and Programs . These two volumes are aimed at the following five major target audiences: University and College students Educators, Professional practitioners, Research personnel and Policy analysts, managers, and decision makers and NGOs.

Household appliances encompass a large variety of equipment including the cold appliances (refrigerators and freezers), the wet appliances (washing machines, dishwashers and dryers), the space conditioning appliances (heaters, air conditioners, heat pumps, fans, boilers), the water heaters, the cooking appliances, a wide array of consumer electronics (such as TVs, VCRs, HiFi systems) and miscellaneous small appliances (such as vacuum cleaners, irons, toasters, hairdryers and power tools). Household appliances save a large amount of domestic labour to perform the household tasks, as well as provide comfort conditions and convenience to the household occupants. The European Community SAVE Programme has promoted the efficient use of energy, in particular in domestic appliances. SAVE has sponsored a variety of studies to characterise the use of the main household appliances and lighting and to identify cost-effective technical options to improve the energy efficiency, as well as to identify the strategies to promote the penetration of efficient equipment in the market place. National energy agencies, independent experts and appliance manufacturers have participated in the SAVE activities and have done a remarkable job. While the energy efficiency of the main household appliances has been improved, at the same time it was possible in most cases to improve the appliance performance, reliability and quality of service.

Energy efficiency is an essential topic nowadays. Several attempts have made to improve energy performance in buildings with particular attention to educational buildings for their high energy consumption. This thesis studies various buildings of the Technical University of Catalonia (UPC) with the aim of exploring the relationship between energy consumption and some parameters of the buildings such as floor area, occupancy, U-value, etc. The proposed methodology includes the definition of energy performance indicators based on data related to, energy consumption, weather data and buildings characteristics such as floor area, volume of the building and year of construction. Indicators are then applied to UPC buildings and finally obtained results are discussed. Results show that the occupancy and space use have a significant effect on energy consumption. Floor area and shape factor have also been found significantly influence the energy consumption. Moreover, the study compares the annual energy consumption in the north campus between 2011, 2012 and 2013, demonstrating that despite implementation of Energy Optimization Projects (POE), the energy consumption has increased in the north campus buildings.

Energy efficiency contributes to the main objectives of energy policy in the European Union: energy security, cost effectiveness and environmental benefits. However, the efficiency potential remains widely untapped. Will White Certificate Instruments, a new framework instrument to foster end-use energy efficiency, help to close the energy efficiency gap? The analysis compares the political process of choosing and designing White Certificate Instruments in Italy, France and Great Britain. The book shows that the type of policy instrument as well as its image has an influence not only on agenda-setting but also on the policy instrument's effectiveness due to interactions with existing energy efficiency discourses, regulatory traditions and the prevailing policy style.

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This manual provides a handy, straightforward summary of energy efficient building use. It assumes no prior knowledge of the subject. It looks at building fabric as well as building services. It provides background on building regulations, energy audits, how to calculate the cost effectiveness of new measures and looks at the latest 'green' issues and government tax policies. Why should I buy this book? It summarises the essentials, rather than dealing with complex theory. It is aimed at busy managers. Chapters include: energy efficient buildings; building design - passive environmental controls; building design - active environmental controls; life cycle costing and net saving; conducting energy audits; the economics of 'green' building; useful addresses.

The recent rise to prominence of renewable energy and energy efficiency has been driven by their potential to lower the environmental impacts of energy use. As these technologies mature they must demonstrate not only their environmental benefits, but also their economic competitiveness. The relative costs and benefits of each potential project, whether large or small, must be systematically modelled and assessed before they can be financed and implemented. *Renewable Energy and Energy Efficiency: Assessment of Projects and Policies* deals with the appraisal of such projects against financial and non-financial criteria, illustrating the assessment tools necessary to make appropriate, evidence based decisions as efficiently as possible. The most important technologies are first described, stressing their economic and performance characteristics. Key project appraisal concepts are then introduced, approaches to modelling the cash flows in energy projects are described, and the issues of uncertainty and optimisation are fully discussed. These financial concepts, together with methods for estimating greenhouse gas emissions, are extended to address aspects of energy policy. Illustrated with many case studies this is an ideal introduction to financial and non-financial appraisal techniques as applied to energy efficient and renewable energy technologies.

Thermal comfort and indoor air quality (IAQ) issues have gained significant interest in the scientific and technical community involved in building performance analysis and other related subjects. In terms of thermal comfort, the achievement and maintenance of a thermally acceptable indoor environment is affected by energy costs, and energy poverty is a widespread problem globally. There is a call for energy-efficient architecture for a developed and sustainable world. However, with the use of renewable energy that increased considerably in recent years, new technical challenges arose for the energy sector. Consumers are key players in this context, as flexibility in demand is crucial to cope with the intermittent nature of most renewable energy sources. Active demand-side participation is particularly important to ensure the efficient use of locally and globally available energy. Sustainability, human comfort, and healthy living environments have become top priorities. *Advancements in Sustainable Architecture and Energy Efficiency* explores how housing is a key health factor for individuals and looks at factors such as air quality, ventilation, hygrothermal comfort, lighting, physical environment, building efficiency, and other areas as important pieces in healthy architecture. It discusses how the poor application of these parameters can directly affect human health and how sustainable architecture provides a solution. Beyond just labeling the important facets of architecture for healthy living, this book will look at different perspectives of energy consumption and demand to ensure sustainable energy, increased energy efficiency, improved energy policies, and reasonable energy costs for homes. This book is ideal for architects, designers, engineers, energy engineers, environmental scientists, practitioners, researchers, academicians, and students interested in architecture that is both conducive to healthy living and energy efficiency.

Energy is an essential resource in the daily lives of humans. However, the extraction and use of energy has an impact on the environment. The industrial sector accounts for a large share of the global final energy use and greenhouse gas (GHG) emissions. The largest source of industrial GHG emissions is energy use. The production and processing of aluminium is energy- and GHG-intensive, and uses significant amounts of fossil fuels and electricity. At the same time, the global demand for aluminium is predicted to rise significantly by the year 2050. Improved energy efficiency is one of the most important approaches for reducing industrial GHG emissions. Additionally, improved energy efficiency in industry is a competitive advantage for companies due to the cost reductions that energy efficiency improvements yield. The aim of this thesis was to study improved energy efficiency in the individual companies and the entire supply chains of the aluminium industry. This included studying energy efficiency measures, potentials for energy efficiency improvements and energy savings, and which factors inhibit or drive the work to improve energy efficiency. The aim and the research questions were answered by conducting a literature review, focus groups, questionnaires and calculations of effects on primary energy use, GHG emissions, and energy and CO₂ costs. This thesis identified several energy efficiency measures that can be implemented by the individual companies in the aluminium industry and the aluminium casting foundries. The individual companies have large potentials for improving their energy efficiency. Energy efficiency measures within the electrolysis process have significant effects on primary energy use, GHG emissions, and energy and CO₂ costs. This thesis showed that joint work between the companies in the supply chains of the aluminium industry is needed in order to achieve further energy efficiency improvements compared to the companies only working on their own. The joint work between the companies in the supply chain is needed to avoid sub-optimisation of the total energy use throughout the entire supply chain. Better communication and closer collaboration between all the companies in the supply chain are two of the most important aspects of the joint work to improve energy efficiency. An energy audit for the entire supply chain could be conducted as a first step in the joint work between the companies in the supply chains. Another important aspect is to increase the use of secondary aluminium or remelted material waste rather than primary aluminium. The companies in the Swedish aluminium industry and the aluminium casting foundries have come some way in their work to improve energy efficiency within their own facilities. However, the results in this thesis indicate that cost-effective technology and improved management can, in total, save 126–185 GWh/year in the Swedish aluminium industry and 8–15 GWh/year in the Swedish aluminium casting foundries. This thesis identified several demands regarding economics, product quality and performance, and environment placed on the companies and products in the supply chains that affect energy use and work to improve energy efficiency. These demands can sometimes counteract each other, and some demands are more important to meet than improving energy efficiency. This implies that improving the energy efficiency of the supply chains as well as designing products so they are energy-efficient in their use phase can sometimes be difficult. The results in this thesis indicate that it would be beneficial if the companies reviewed these demands to see whether any of them could be changed. Both the economic aspects and demands from customers and authorities were shown to be important drivers for improved energy efficiency in the supply chains. However, placing demands on energy-efficient production and a company's improved energy efficiency would require those placing the demands to have deeper knowledge compared to demanding green energy, for example. Requiring a company to implement an energy management system to ensure active work to improve energy efficiency would be easier for the customer than demanding a certain level of energy efficiency in the company's processes. Additionally,

energy audits and demands on conducted energy audits could act as drivers for improved energy efficiency throughout the supply chains. This thesis showed that the most important barriers to improved energy efficiency within the individual companies include different types of risks as well as the cost of production disruption, complex production processes and technology being inappropriate at the site. Similar to the supply chains, important drivers for improved energy efficiency within the individual companies were shown to be economic aspects and demands from customers and authorities. However, the factors that are most important for driving the work to improve energy efficiency within the individual companies include the access to and utilisation of knowledge within the company, corporate culture, a longterm energy strategy, networking within the sector, information from technology suppliers and energy audits. Energi är en viktig resurs i människors dagliga liv, men utvinningen och användningen av energi påverkar miljön. Industrin står för en stor andel av den globala slutliga energianvändningen och de globala utsläppen av växthusgaser. Den största källan till industriella växthusgasutsläpp är energianvändning. Produktionen och bearbetningen av aluminium är energiintensiv och har stora utsläpp av växthusgaser och använder betydande mängder fossila bränslen och elektricitet. Samtidigt beräknas efterfrågan på aluminium öka avsevärt globalt till år 2050. Energieffektivisering är ett av de viktigaste medlen för att minska industriella växthusgasutsläpp. Dessutom är energieffektivisering inom industrin en konkurrensfördel för företagen på grund av de minskade kostnader som energieffektivisering medför. Syftet med den här avhandlingen var att studera hur energianvändningen kan bli effektivare i de enskilda företagen och hela försörjningskedjorna i aluminiumindustrin. Detta inkluderade att studera energieffektiviseringsåtgärder, potentialer för energieffektivisering och energibesparing samt vilka faktorer som hindrar eller driver arbetet med energieffektivisering. Syftet och frågeställningarna besvarades genom litteraturstudier, fokusgrupper, enkäter samt beräkningar av påverkan på primärenergianvändning, växthusgasutsläpp och energi- och koldioxidkostnader. Denna avhandling identifierade flera energieffektiviseringsåtgärder som kan genomföras av de enskilda företagen inom aluminiumindustrin och aluminiumgjuterierna. De enskilda företagen har stora potentialer för effektivare energianvändning. Energieffektiviseringsåtgärder inom elektrolysen har stor påverkan på primärenergianvändning, växthusgasutsläpp samt energi- och koldioxidkostnader. Denna avhandling visade att det gemensamma arbetet mellan företagen i aluminiumindustrins försörjningskedjor är viktigt för att uppnå ytterligare effektiviseringar av energianvändningen jämfört med om de individuella företagen skulle arbeta enbart på egen hand. Det gemensamma arbetet mellan företagen i försörjningskedjan är viktigt för att undvika suboptimering av den totala energianvändningen i hela försörjningskedjan. Bättre kommunikation och närmare samarbete mellan alla företagen i försörjningskedjan är två av de viktigaste aspekterna i det gemensamma arbetet för att uppnå effektivare energianvändning. En energikartläggning av hela försörjningskedjan kan genomföras som ett första steg i det gemensamma arbetet mellan företagen. En annan viktig aspekt är att öka användningen av sekundärt aluminium eller omsmält processkrot snarare än att använda primärt aluminium. Företagen i den svenska aluminiumindustrin och aluminiumgjuterierna har kommit en bit på vägen i deras arbeten mot effektivare energianvändning inom deras egna anläggningar. Dock visade resultaten i denna avhandling att kostnadseffektiv teknik och förbättrad energiledning totalt kan spara 126–185 GWh/år i den svenska aluminiumindustrin och 8–15 GWh/år i de svenska aluminiumgjuterierna. Denna avhandling identifierade flera krav rörande ekonomi, produktkvalitet och -prestanda samt miljö som ställs på företagen och produkterna i försörjningskedjorna och som påverkar energianvändningen och arbetet mot effektivare energianvändning. Dessa krav kan ibland motverka varandra och vissa krav är viktigare att möta än att effektivisera energianvändningen. Detta innebär att det ibland kan vara svårt att energieffektivisera försörjningskedjorna samt att designa energianvändande produkter så att de är energieffektiva i användningsfasen. Resultaten i denna avhandling visar att det skulle vara fördelaktigt om företagen granskar kraven för att se om något av kraven skulle kunna ändras. Både de ekonomiska aspekterna och krav från kunder och myndigheter visade sig vara viktiga drivkrafter för energieffektivisering i försörjningskedjorna. Om krav ställs på energieffektiv produktion och effektivare energianvändning inom ett företag behöver de aktörer som ställer kraven ha djupare kunskaper jämfört med om de till exempel skulle kräva användandet av grön energi. Ett krav på implementeringen av ett energiledningssystem för att säkerställa ett aktivt arbete med energieffektivisering skulle vara lättare för kunden att ställa än att kräva en viss energieffektiviseringsnivå i leverantörens processer. Dessutom kan energikartläggningar och krav på genomförda energikartläggningar fungera som drivkrafter för energieffektivisering i försörjningskedjorna. Denna avhandling visade att de viktigaste hindren mot energieffektivisering inom de enskilda företagen är olika typer av risker samt kostnader för produktionsstörningar, komplexa produktionsprocesser och att tekniken inte är applicerbar inom anläggningen. I likhet med försörjningskedjorna uppkom de ekonomiska aspekterna och krav från kunder och myndigheter som viktiga drivkrafter för energieffektivisering inom de enskilda företagen. Dock är de viktigaste faktorerna för att driva på arbetet med energieffektivisering inom de enskilda företagen tillgången till och utnyttjandet av kunskap inom företaget, företagskulturen, en långsiktig energistrategi, nätverkande inom branschen, information från teknikleverantörer och energikartläggningar.

As the world faces the effects of climate change, countries are confronted with the challenge of how to adjust from a culture of excessive energy consumption and high greenhouse gas emissions to one of minimising their environmental footprint and achieving sustainability. Large-scale renewable energy infrastructure initiatives, such as solar school programs, are being promoted as a way to reduce national greenhouse gas emissions and increase awareness of the need for energy conservation. Unfortunately, little is known about the relationship between installing renewable energy technology on school buildings and the practice of energy saving strategies in schools. This work examines whether installing solar power systems is an effective catalyst for stimulating energy saving strategies in schools by investigating the findings from a mixed-methods study of a solar schools initiative in Australia. The question of whether schools with solar power installations come to view (attitudes) and use (behaviours) energy differently from schools without renewable energy technology is examined. A number of barriers to the implementation of successful solar school programs are also identified.

Study conducted at the Thevankurichi Kallupatti Block in Madurai District of Tamil Nadu, India.

ENERGY EFFICIENCY uses an applied scientific methodology and case studies to demonstrate and support: The need for the U.S. and the world to commit to energy and resource efficiency as the central goal in investing in electric, heat, and cooling infrastructure, the huge economic opportunity for using the inefficiency built into 20th century energy supply systems, especially, electric, to pay for the upgrades, replacements, and new production and distribution systems of the 21st century, the importance of adopting a standard, web-based energy infrastructure investment decision-making and risk management tool that will serve as a communication medium for all stakeholders to evaluate and compare energy infrastructure investment options and manage investment risks, expansions of the U.S. 'smart' grid investment to include evaluation and risk management of energy systems infrastructure investments not just electricity operations, the need to adopt a 'framework' for utilities, energy service companies, and customers to work together to close business deals, communicate and manage risks, and realize profits.

Energy is one of the most important factors of production. Its efficient use is crucial for ensuring production and environmental quality. Unlike normal goods with supply management, energy is demand managed. Efficient energy use—or energy efficiency—aims to reduce the amount of energy required to provide products and services. Energy use efficiency can be achieved in situations such as housing, offices, industrial production, transport and agriculture as well as in public lighting and services. The use of energy can be reduced by using technology that is energy saving. This Special Issue is a collection of research on energy use efficiency.

A large US utility recently began a project to determine whether the use of new energy-efficient end-use technologies and systems would economically achieve substantial energy savings (perhaps as high as 75% over current practice). Using a field-based demonstration approach, the Advanced Customer Technology Test (ACT2) for Maximum Energy Efficiency is providing information on the maximum energy savings possible when integrated packages of new high-efficiency end-use technologies are incorporated into commercial and residential buildings and industrial and agricultural processes. This paper details the underlying rationale, approach, results to date, and future plans for ACT2. The ultimate goal is energy efficiency (doing more with less energy) rather than energy conservation (freezing in the dark). In this paper, we first explain why a major United States utility is committed to pursuing demand-side management so aggressively. Next, we discuss the approach the utility chose for conducting the ACT2 project. We then review results obtained to date from the project's pilot demonstration site. Last, we describe other related demonstration projects being proposed by the utility.

Energy Efficiency: Concepts and Calculations is the first book of its kind to provide an applied, systems oriented description of energy intensity and efficiency in modern economies across the entire energy chain. With an emphasis on analysis, specifically energy flow analysis, lifecycle energy accounting, economic analysis, technology evaluation, and policies/strategies for adopting high energy efficiency standards, the book provides a comprehensive understanding of the concepts, tools and methodologies for studying and modeling macro-level energy flows through, and within, key economic sectors (electric power, industrial, commercial, residential and transportation). Providing a technical discussion of the application of common methodologies (e.g. cost-benefit analysis and lifecycle assessment), each chapter contains figures intended to be diagnostic, charts and examples from each sector, including the policies that have been put in place to promote and incentivize the adoption of energy efficient technologies. Contains models and tools to analyze each stage at the macro-level by tracking energy consumption and how the resulting data might change energy use Includes accessible references and a glossary of common terms at the end of each chapter Provides diagnostic figures, tables and schematics within the context of local, regional and national energy consumption and utilization

Energy saving in buildings through cost and energy-intensive measures, such as the application of additional building materials and technologies, is only possible with a great consumption of resources and CO2 emissions for their production. For low energy buildings, the investment costs, including user costs and governmental subsidies, are generally high, and construction is not always economically viable in consideration of the national capital in the present economic conditions of most countries. For these reasons, it is first of all necessary to apply cost and resource-efficient measures to save energy in buildings and then make use of additional cost and energy-intensive measures by improving the thermal envelope, the HVAC system or by installing energy generating systems. One of the most cost effective and ecological methods of energy saving in buildings is the reduction of energy requirements through climate responsive architecture. Due to the fact that energy saving through the optimization of architecture is not only cost-neutral, resource-efficient and carbon-neutral but also has a very high energy-saving potential, the first and most important strategy to save energy should be an optimized and climate responsive design. Energy saving through optimized architectural design is economically and ecologically sustainable. The development of building simulation science in the last decades has made it easier to study the energy performance of buildings. Tools have made it possible to predict the complex behavior of buildings regarding the climate. Except for the comparison of different building typologies to find the most efficient, there are no other methods to achieve energy savings through the architectural design, which can be applied by a variety of building types and climates. Therefore, in order to encourage the optimization of architectural design, it is necessary to improve these methods which represent strategies to significantly reduce the energy demand of buildings. Architectural Energy Efficiency is a parametric method which separately studies the effects of various energy-related architectural factors on the energy demand of buildings by using dynamic energy simulations to find the, from an energy efficiency point of view, optimum value for each of these. The architectural factors include orientation, building elongation, building form, opening ratio in different orientations, sun shading, natural ventilation etc. The research process that led to the formulation of the Architectural Energy Efficiency method is based on a series of simulations carried out by a dynamic simulation software tool

(DesignBuilder) to calculate the energy demands of a building with different variants for a single architectural feature. The aim of the simulations is to find an optimum set of energy-related variables that result in the best and most efficient energy performance for a specific building type and climate. This method of efficiency illustrates the effects different architectural features have on the various energy demands of buildings. The criteria are derived from the application of this method for a specific building occupation and climate, and can be applied in the design process of buildings, which leads to improvements of the energy performance and a reduction of resource consumption. As the architectural design affects the heating and cooling as well as the lighting energy demands of buildings, the optimum value of each factor must be based on these three aspects. The heating, cooling and lighting energy demands of buildings all behave very differently. Therefore, these three energy demands together (i. e. the sum of heating, cooling and lighting energy) must also be applied as a criterion to study the building energy performance and find the optimum value for each architectural feature. The criteria for selecting the best variant can not only be based on the total energy demand, but should also consider the primary energy demand, the CO2 emissions, energy costs (for heating, cooling and lighting), life cycle costs, etc. The application of these findings to the architectural design of buildings minimizes the energy demand, the CO2 emissions and energy costs of the building, does not, however, affect the initial building costs. The advantages of energy saving through optimizing the architectural design are not only the improvement of the building's energy performance, but also the fact that the energy saving is cost and resource-efficient. This means that the energy demand of a building will decrease without increasing the investment costs of the building and without consuming any resources and energy for the production of additional building materials. The cost and resource efficiency contributes towards the economic and ecological sustainability of a building during the full life cycle.

In comparing the degree of efficiency in energy production and the uses to which energy resources are allocated in Mexico with those in other countries, this book addresses three basic questions: What are the major reasons for differences in energy efficiency between industrial economies and a newly industrializing country like Mexico? To what extent is energy conservation possible in the Mexican economy? And what are the social and economic benefits of more efficient use and conservation of energy in comparison with their costs? Using the history and operations of two state-owned energy agencies, PEMEX and the Federal Electricity Commission, as case studies, the authors explore the patterns of energy use in all major sectors of the economy and discuss the prospects for energy-saving policies between the mid-1980s and the end of the century.

Management, Efficiency, Fuelless energy sources, Energy conservation, Energy consumption, Vocabulary, Energy technology, Energy sources, Terminology

This publication is based on the discussions of an expert group meeting, held in November 2002, which considered issues relating to the promotion of greater end-use energy efficiency in in the Asia and Pacific region, in support of a sustainable energy future. The meeting drew a number of conclusions (focusing on the four major energy-intensive sectors of industry, road transport, construction and buildings, and domestic electrical appliances) which will inform future policy development.

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