

1. Record Nr.	UNINA9910299609503321
Autore	Morales Pedraza Jorge
Titolo	Electrical Energy Generation in Europe : The Current and Future Role of Conventional Energy Sources in the Regional Generation of Electricity / / by Jorge Morales Pedraza
Pubbl/distr/stampa	Cham : , : Springer International Publishing : , : Imprint : Springer, , 2015
ISBN	3-319-08401-1
Edizione	[1st ed. 2015.]
Descrizione fisica	1 online resource (468 p.)
Disciplina	333.79 551.6 621.042 662.6
Soggetti	Fossil fuels Energy policy Energy systems Climatic changes Fossil Fuels (incl. Carbon Capture) Energy Policy, Economics and Management Energy Systems Climate Change Management and Policy
Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Note generali	Description based upon print version of record.
Nota di bibliografia	Includes bibliographical references at the end of each chapters.
Nota di contenuto	""Preface""; ""Acknowledgments""; ""Contents""; ""About the Author""; ""Abstract""; ""1 General Overview""; ""Abstract""; ""1.1 Introduction""; ""1.2 Liquid Fuels""; ""1.2.1 Crude Oil""; ""1.3 Natural Gas""; ""1.4 Coal""; ""1.5 Energy Dependency""; ""1.6 Electricity Generation""; ""1.6.1 Impact of the Economic and Financial Crisis in Generation of Electricity""; ""1.6.2 The Use of Oil for Electricity Generation""; ""1.6.3 The Use of Natural Gas for Electricity Generation""; ""1.6.4 The Use of Coal for Electricity Generation"" ""1.6.5 Market Concentration in the Liberalized Power Generation Markets in Europe""""1.6.6 Electricity Generation Cost""; ""1.6.7 The Situation of the Energy Sector in the European Region""; ""1.7 Security

of Supplies"; "1.8 Investment in Energy Infrastructure"; "1.9 Environmental Impact"; "1.10 Energy Efficiency"; "1.11 Energy Savings"; "1.12 Access to Modern Energy Technology"; "1.13 European Internal Energy Market"; "1.13.1 Integrating National Markets"; "1.13.1.1 NordPool"; "1.13.1.2 Trilateral Coupling"; "1.13.1.3 Western European Market"; "1.13.1.4 Central West European Market"; "1.13.1.5 Regional Integration in South East Europe"; "1.13.1.6 North East Market"; "1.13.1.7 Baltic Market"; "1.13.1.8 Iberian Electrical Energy Market"; "1.14 New Initiatives"; "References"; "2 The Role of Oil in the Regional Electricity Generation"; "Abstract"; "2.1 General Overview"; "2.2 Reserves, Production, and Consumption of Crude Oil in Europe"; "2.3 Oil Pipelines"; "2.3.1 Oil Pipelines Within the EU"; "2.3.2 New Pipelines and Supply Routes for Oil"; "2.3.2.1 The Druzhba Oil Pipeline"; "2.3.2.2 The Norpipe Oil Pipeline"; "2.4 Oil Demand in the Transportation, Industrial, and Electricity Generation Sectors"; "2.5 Oil Price Evolution"; "2.6 The Participation of Oil in the Energy Balance in the European Region"; "2.7 Future Trends"; "2.8 Austria"; "2.8.1 Crude Oil Reserves"; "2.8.2 Production and Consumption of Oil"; "2.8.3 Import and Export of Oil"; "2.8.4 Electricity Generation and Consumption"; "2.8.5 Import and Export of Electricity"; "2.9 Belgium"; "2.9.1 Crude Oil Reserves"; "2.9.2 Production and Consumption of Oil"; "2.9.3 Export and Import of Oil"; "2.9.4 Electricity Generation and Consumption"; "2.9.5 Import and Export of Electricity"; "2.10 Bulgaria"; "2.10.1 Crude Oil Reserves"; "2.10.2 Production and Consumption of Oil"; "2.10.3 Import and Export of Oil"; "2.10.4 Electricity Generation and Consumption"; "2.11 Croatia"; "2.11.1 Crude Oil Reserves"; "2.11.2 Production and Consumption of Oil"; "2.11.3 Import and Export of Oil"; "2.11.4 Electricity Generation and Consumption"; "2.12 Czech Republic"; "2.12.1 Crude Oil Reserves"; "2.12.2 Production and Consumption of Oil"; "2.12.3 Import and Export of Oil"

Sommario/riassunto

Maximizing reader insights into the current use of conventional energy sources (such as fossil fuels) in the generation of electricity in the European region, this book addresses several key issues including: potential ways European countries could expand their energy sector in the coming years; the impact on the climate, the level of energy reserves, different efficiency measures that could be adopted to reduce the consumption of fossil fuels in the generation of electricity, and current and future energy production and consumption trends, amongst other topics. Covering both how the use of fossil fuels for the generation of electricity can be reduced, and how to increase the current level of participation of those energy sources with a minimum negative impact on the environment in the energy balance of the different European countries, this book describes the main economic aspects related to the use of conventional energy sources for electricity generation and provides information on possible regional energy integration mechanisms and their potential impact on the generation of electricity. 'Electrical Energy Generation in Europe' is designed as a useful tool for government officials, energy experts, and the private and public power industry, among others, during the preparation of future energy plans and in the identification of the possible role that the different types of conventional energy sources available in the region could play in the production of electricity during the coming decades. The book is also suitable for use as teaching material in pre-graduated and post-graduate studies on the use of different types of

conventional energy sources for electricity production within different European countries.
