

International Political Economy Series

States and Markets in Hydrocarbon Sectors

Edited by
Andrei V. Belyi and Kim Talus



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States and Markets in Hydrocarbon Sectors

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Foreword

State–market interactions in the hydrocarbon sector are usually complex and impacted by multiplicity of actors, actions, circumstances, geopolitics, foreign policy considerations, and governing modalities, among many others. At the core operational level of such interactions are two actors: governments and companies. Government (of a state) with hierarchy of powers and authorities has structures of entities and institutions; issues and enforces laws and regulations; and draws and implements policies domestically and internationally. Companies (of varying forms of ownership structure and nationality) are involved in the four main subsectors of hydrocarbon industry: upstream, midstream, downstream, and marketing; all have significant role in the global market of hydrocarbons, especially petroleum (oil and gas).

The government–company nexus produces three spheres of relationships: the first is the government–government levels, comprising many different bilateral, regional, super-national, and international arrangements or cooperating modalities pertaining to hydrocarbon/petroleum. At this level, governments negotiate, conclude, and gain accesses to and implement international instruments, and by doing so they adhere to the norms of related international laws and relations among sovereign states as stipulated in the related arrangements, instruments, or cooperating modalities.

In addition to the bilateral channels, inter-governmental interactions on energy matters take place in many formal and informal forums. Among important energy-related formal international entities are Organization of the Petroleum Exporting Countries (OPEC), Organization of Arab Petroleum Exporting Countries (OAPEC), International Energy Agency (IEA), and Gas Exporting Countries Forum (GECF); and informal entities such as International Energy Forum (IEF), which was created in 1991 as a result of a rapprochement between oil-producing countries, as represented by OPEC, and developed oil-consuming countries, as represented by the IEA.

The second is government–company levels. The role of the state here could be a regulator, financier, partner, or any combinations thereof; and the petroleum company could be a national oil company (NOC – a state owned fully or partially, or could be a private or privatized entity) or a foreign international oil company (IOC). The relationship between

a host government (especially of a developing country) and an IOC is usually governed by agreements and/or contracts. Historically and at the upstream petroleum subsector, these agreements and/or contracts took the form of (colonial type) concessions, production sharing, conventional service contracts, and long-term service contracts (a hybrid of production sharing and conventional service contracts).

All matters related to the development of hydrocarbon projects are usually addressed thoroughly at this level of contractual interactions. Development phases; production levels; financial and economic factors such as funding, taxes, fees, costs, shares; rights and privileges; geological, technical, and technological factors, including transfer of technology and knowhow; local contents and concerns; environmental and safety factors, and so on are all well covered in the related negotiated complex contract of agreement. This level could also involve the 'financial sector' through funding banks such as the cases of petroleum reserves-based lending.

In a sense, these contracts are real manifestations of the relative strength of government/company and thus have significant impacts on the political economy of state-market interactions.

The third level covers company-company cooperation arrangement. Again the petroleum companies could be national (NOC – a state owned fully or partially or could be a private or privatized entity) or foreign international oil company – IOC. This form of company-company cooperation has become increasingly visible and recurring, especially in forming consortium, joint ventures, merger and acquisitions (M&A), and alike of IOCs from different affiliations and having varying degrees of internationalization stature. Many such forms of company-company cooperation are currently functioning, for example, in the Iraqi upstream petroleum development and in many cross-border pipelines (such as the recently concluded Gazprom and CNPC pipeline supplying Russian gas to China); other examples are the joint venture between Lukoil and ConocoPhillips (2005 NaryanmarNeftegaz (NMNG)) and ExxonMobil and Rosneft (deal regarding development partnership of the Black Sea and the South Kara Sea in the Russian Arctic).

Such forms of company-company cooperation are not done independently from the concerned host government. On the contrary, they are blessed and supported by the state, especially when such deals have vital geopolitical values in addition to economic significance and strategic flexibility, and thus they could represent an outstanding example of the complexity of the international political economy (IPE) of energy – the

case of the above-mentioned Gazprom–CNPC gas pipeline, especially if it lead to increased dependence of Japan and the Korean peninsula on Russian gas.

Empirically the above-mentioned three spheres of government–company relationship do exist, one degree or the other, and have influential impacts on the global hydrocarbons sector. They cover the supply chain of hydrocarbons from micro/project levels through macro/national levels to mega/international levels; analytically they help in understanding the complex reality surrounding the state–market interactions in this vital sector and the IPE of hydrocarbons/petroleum.

Oil and gas are not only internationally tradeable commodities; they are also, but most importantly, strategic commodities for the producing, consuming, and transit countries. Security of supplies is seen as the cornerstone of national security, and with efficiency and environmental considerations it forms the pillars of the energy policies in the developed consuming nations.

For the developing countries, hydrocarbon reserves have sustainable development dimensions for their societies: transforming these depleting assets into sustainable human and real economy capacities. In reality, resource endowments in many of these countries had created a ‘rentier state’ with spreading ‘rent-seeking behaviour’ making these countries vulnerable to ‘resource curse’ attacks. Such attacks are real to the extent that they seriously threaten and could even dismantle the ‘nation state’, as evident in Sudan, Libya, Yemen, Iraq, and Syria. The evolution of recent disturbing events (the Arab Spring, which has been sadly turned out, thanks to Arab petro-dollars surpluses, to be Al-Qaida Spring of extremism, fundamentalism with apparent terrorism, violence, and destruction) in the Middle East and North Africa (MENA) region further complicates the scene by highlighting the geopolitical factors as real and effective determinants affecting both the roles of state–market and the production and export of petroleum in MENA region and oil prices. Considering the current (2014) deteriorated security situation in Iraq, it is worth recalling that many energy experts have been warning that future oil prices are more dependent on increasing Iraqi production than North American shale.

And with the increasing significance of cross-border pipelines and their role in the functioning of oil and gas markets and flow of supplies, the ‘transit countries’ possess important ‘locational rent’, which they tend to maximize economically and politically, and thus gain crucial position in the state–market interaction. Examples include the Ukraine

and the recent Iraqi Arbitration submission before International Chamber of Commerce (ICC) in Paris against Turkish government and Turkish Petroleum Pipeline Corporation (BOTAS) regarding Iraq–Turkey Pipeline (ITP) bilateral agreement between the two countries. Hence, there is a need for binding bilateral and multilateral rules and governing entities for such energy transit; in this sphere Energy Charter Treaty/Secretariat and other international entities have important role in related dispute settlements.

Environmental and transparency concerns are gaining increasing grounds and demonstrating impacts on policymakers and market agents in global energy arena. International calls for more and effective transparency in the extractive industries and the adoption of related legislations in the United States and the EU have enhanced the position of other actors and brought new actors comprising many civil society organization (CSO) or NGOs and other specialized entities assuming significant active role in the governance of the sector. Transparency International (TI), Publish What You Pay (PWYP), Global Finance Integrity (GFI), Revenue Watch Institute (RWI), and Natural Resource Charter (NRC) are only a few examples of such entities with important global reach.

Extractive Industry Transparency Initiative (EITI) is among these new actors with its elaborated ‘value chain’ framework covering essential issues relating to resource and revenue management for sustainable development; compliance procedures and modalities; specifics and scope of the country annual reporting requirements; and structure of a member country trilateral ‘Multi stakeholders group (MSG)’ representing government, industry (both national and foreign), and CSO. Today, EITI has 27 ‘compliant countries’, among them major oil/gas producers such as Iraq, Nigeria, Norway, Azerbaijan, and Kazakhstan; and 17 ‘candidate countries’, among them the United States, Indonesia, and Tajikistan. So far 35 countries have produced EITI reports, and from my own experience in assessing Iraqi and Yemeni reports they have, despite many flaws and shortcomings, increased the level of transparency significantly, especially in the area of export revenues. More importantly, the EITI has in fact expanded the core government–company nexus into broader State–Business–Society triangle, including foreign extractive companies working in the member countries.

Against this backdrop of complexity, multiplicity, and dynamics surrounding the role of states and market (government and companies) in the hydrocarbon/petroleum sector, the publication of this book is opportune. It contains an Introduction, 11 scholarly contributions, and

a Conclusion; all shedding further and informed insights and providing articulate analysis to help us understand better the interconnectivity of issues.

While John V. Mitchell and Beth Mitchell (Chapter 1) suggest that many aspects of the oil industry IPE can conveniently be grouped into Susan Strange's four structures – production, finance, security, and knowledge – Pami Aalto (Chapter 2) asserts that the interdisciplinary IPE of energy is currently only emerging and in need of well-elaborated research programmes that would offer guidance vis-à-vis the division of labour and help to find the most promising areas of collaboration and energy policy which many of its practitioners have found to convey a highly complex subject matter badly in need of conceptual clarity.

Andrei V. Belyi and Andrey Makarychev (Chapter 3) aim to analyse the relationship between energy market trends in fostering infrastructural interdependencies, on one hand, and institutional integration at the regional level, on the other, and to uncover the most typical models linking regional institutions with energy markets. The rationale for their approach stems from two rather evident trends: firstly, the internationalization of the hydrocarbon sectors; and secondly, a growing importance of regions in international relations and IPE. The authors single out three possible categories of regions, influenced by Barry Buzan definition of international systems, societies, and communities.

In 'State Capitalism and the Politics of Resources' (Chapter 4), Wojciech Ostrowski argues that the negative impact of state capitalism on co-operation in various sub-levels of oil, gas, and minerals industry can be potentially offset by an evolution of the state–business relationships in resource-rich countries which can lead to the creation of a more predictable business environment for both inside and outside actors.

An important discrepancy between the European and Russian understanding of markets and of the state's roles was highlighted by Andrei V. Belyi and Catherine Locatelli (Chapter 5). Interestingly, this chapter tells that since the end of the Soviet Union, Russia's oil and gas sectors reflect opposing dynamics, the impact of which may drive a further reinforcement of national oil giant, Rosneft, whereas weakens gas company, Gazprom, positions both domestically and abroad.

The comparative approach by Isabelle Rousseau (Chapter 6) aims to analyse the main factors behind the identified heterogeneity of organizational and institutional frameworks governing the national oil companies of the Latin American countries. The author takes Mexico and Venezuela to test the following hypothesis: the heterogeneity

in governance models of the industry and the national companies depends, in large part, on the role the state has played in the creation and the development of the mining sector.

In light of state–market interrelations, Marat Terterov and Claudia Nocente (Chapter 7) suggest that events in post-Ghaddafi Libya demonstrate the vulnerability of political decision-making processes both domestically and internationally.

The chapter on ‘State–Market Interrelations in the US Onshore and Offshore Oil and Gas Sectors’ (Chapter 8) suggests that the unprecedented increase in US oil and gas production, fuelled primarily by the development of unconventional resources, ‘Fracking activity’, has been occurring within two distinct legal regimes and institutional frameworks: state-dominated for the development of onshore resources on predominately private lands and federal-dominated for the development of offshore resources in federal waters.

EU energy policy, according to Kim Talus (Chapter 9), is currently searching for the optimal regulatory framework. The previous overly market-based ideology is rapidly changing to a more interventionist policy based on public intervention for security of supply and, increasingly, also for environmental purposes. However, this change is not a complete return to old times of state intervention.

Philip Andrews-Speed (Chapter 10) asserts that the governance of China’s oil and gas industry remains more tight by the government than the coal or electrical power industries and shows how the move towards the market continues to be constrained by the institutional context and by the interests of key actors.

Another comparative analysis covers, this time, Australia and Japan. Vlado Vivoda (Chapter 11) identifies contrasting approaches to hydrocarbon sector by the two governments and highlights key similarities and differences between the two cases.

The above indicates, as the book concludes, that the complexity of state–market interrelations in energy is not a closed subject and will likely generate further academic and professional discussions.

I have greatly enjoyed and indeed benefited from reading this book, and I trust that students from a variety of academic disciplines, researchers, decision-makers and state bureaucrats, energy and petroleum professionals, CSO activists, and many others will feel the same.

Ahmed Mousa Jiyad
Independent Consultant and Scholar

Preface

Research on the role of states and markets in the hydrocarbon sector is highly topical. Many states and governments are reconsidering the influence that the public sector should have in this area. This applies to countries and areas like the European Union, Russia, the United States, as well as many other hydrocarbon-producing and consuming states. In some areas, this is a result of new hydrocarbon discoveries, in others it relates to factors like unsatisfactory progress in the energy markets or pollution and other negative externalities.

The contemporary international discussion in this area has so far focused on specific areas like the role of national oil companies or the impact of government policies in other specific areas like national supply reservations or local content requirements. This edited volume will approach the same question with a wider scope and will consider the role of states and markets in the hydrocarbon sector more generally. The book has a general scope in two ways: it is not restricted to a specific question or issue and it covers countries and regions in various locations globally.

One of the people that inspired the editors to initiate this project was the late Professor Thomas Wälde. He conducted research and spoke on these questions, recognizing that there is a role for both states and markets in complex areas like energy policy. Through many discussions with the editors, he very much influenced our thinking. We would like to dedicate this book to Thomas.

We would also like to thank the Centre for the EU–Russia Studies at the University of Tartu for its financial support, especially within the Jean Monnet Module of the European Commission as well as the Academy of Finland for research funding the project (276974) “Impact of Shale Gas in EU Energy Law and Policy; Regulatory and Institutional Perspectives”.

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Philip Andrews-Speed is a principal fellow at the Energy Studies Institute of the National University of Singapore. He has 35 years of experience in the field of energy and resources, having started his career as a mineral and oil exploration geologist before moving into the field of energy and resource governance. Until 2010 he was Professor of Energy Policy and Director of the Centre for Energy, Petroleum and Mineral Law and Policy (CEPMLP) at the University of Dundee, Scotland, UK. His recent books include *China, Oil and Global Politics with Roland Dannreuther* (2011) and *The Governance of Energy in China: Transition to a Low-Carbon Economy* (2012).

Andrei V. Belyi is a senior researcher at the Centre for EU Russia Studies (CEURUS), Institute of Government and Politics, University of Tartu, Estonia. He has also been a visiting lecturer at the University of Eastern Finland, Finland, and at CEPMLP, University of Dundee, Scotland, UK. Previously, he worked in Moscow, at the Higher School of Economics. Belyi has a number of publications related to energy security, EU–Russia energy relations, Russia’s energy policy, and international energy governance. In addition, he is a member of the editorial board of the *Journal of World Energy Law and Business*.

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Claudia Nocente received her BA in Political Science and International Relations from the University of Padua, Italy, and her MA from the University of Kent in Brussels in International Conflict Analysis with a dissertation on state sovereignty, enforcement of no-fly zones, and humanitarian intervention. She has a genuine academic and personal interest in the MENA countries and hopes to deepen her knowledge of the area. She has been working at the Energy Charter Secretariat Knowledge Centre since March 2013, and she is part of the research and event coordination team.

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Isabelle Rousseau has been a professor and a researcher at the Center for International Studies at El Colegio de Mexico since 1997. She is responsible for a research project on the Mexican oil industry. In addition, Rousseau has worked on Latin American oil and gas topics and has been an associated researcher at the Centre d'Études et de Recherches Internationales (CERI), Sciences Po (Paris). She collaborated with Chatham House on various assignments related to petroleum good governance. Rousseau has authored a number of related articles and edited two books entitled *Hacia la integración de los mercados petroleros en América* (2006) and *América Latina y Petróleo: Los desafíos políticos y económicos de cara al siglo XXI* (2010).

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Introduction

Andrei V. Belyi and Kim Talus

Markets, technologies, and policies constantly evolve at different levels in various countries, and this has led us to analyse these aspects as the drivers of energy policies. All have a policy and regulatory impact on market structures, which further stimulates technological development. It is noteworthy that the causes of the energy transition may either stem from the state or from market forces. Therefore, interaction between the state and the market is a key topic when analysing the hydrocarbon sectors.

The importance of the interaction between the state and the market has been repeatedly stressed, albeit without comprehensive theoretical analysis. For instance, a number of policy-oriented questions have emerged in the past decades regarding the oil and gas industries. The key questions include, among others, the following: can the state influence the hydrocarbon markets to its own advantage by limiting the effects of interdependencies? Or, can we argue that the interests of energy-producing states are inherently in conflict with those which import energy? Do the markets provide stability while states need only to ensure their predictability? This leads us to debate the very essence of the interaction between the state and the market and how this varies on a regional basis.

The key aim of this book is to demonstrate that processes related to energy transitions are related to the nature of the interaction between the state and the market and that these are not linked in a linear fashion to the structural issues of reserve distribution or supply and demand levels. The importance of structural factors is not underestimated, but the book attempts to understand the institutional causes for energy transitions in time and in space.

In order to provide a comprehensive overview of regional energy transitions, a number of writers, drawn from various disciplines

ranging from international relations to energy law, have contributed to this book.

State–market interaction as a core topic of international political economy

In spite of important sectoral particularities, the analysis of state–market interaction in the hydrocarbon sectors requires general contextualization – an exercise which has already been carried out in respect of many other spheres of political economy. Indeed, the very debate on the relationship between the state and the market began with studies relating to the Industrial Revolution. A number of misleading assumptions exist to the effect that the Industrial Revolution was stimulated by economic policies of *libre échange*. One should not underestimate the role played by direct state support, protectionism, and the indirect stimulation of the economy through the development of national military industries (Bailroch, 1995). Classical political economists pointed to various institutional mechanisms by which new technologies were developed in various spheres of society. For example, the coal industry was far from being the main driver of the Industrial Revolution. On the contrary, it was the Industrial Revolution and the national policies related to it that increased the importance of the coal industry in global economic transactions. Although there had been a degree of technological and industrial development prior to the Industrial Revolution, the level of development it brought about underlined its political importance. In turn, this political importance stimulated various state policies directed towards supporting central banking systems as well as promoting coherent industrial policies together with science and innovation.

At the same time, the scale of innovation and the evolution of the market placed firm limits on state sovereignty. Capital-intensive technologies employed in the mining industry reinforced path dependencies and lock-in effects for long-term national policies. Moreover, the increased flow of information led to best practice transfer in law and other regulations. In many segments of the economic chain, from extraction of minerals to retail markets, cross-border influences have had a significant effect on state decision-making processes.

An important academic debate is taking place over growing interdependencies and the subsequent restriction of national policies. In particular, interdependencies have increased in various

economic spheres, including finance, investments, and trade in various commodity markets. In turn, interdependencies and the subsequent limits of state sovereignty in economic policies have generated a misleading belief in the 'invisible hand of the markets'.

The complex interaction between states and markets has attracted attention from a number of international political economy scholars. Works published by Susan Strange (1988) and Robert Gilpin (2001) sought to define the general rules of the state–market relationship. States seek to use the markets for their own strategic domestic and foreign policy purposes, whereas market institutions tend to bypass national borders, becoming international. In this context, limits are placed on national sovereignty as states are not always successful in orientating market institutions to their own advantage.

For a number of years, states have been considered as similar actors in international political economy. The Waltzian system (Waltz, 1979) views states as blank units of international relations. In contrast to such classical approaches, new trends in international political economy outline regional particularities in the techno-economic paradigm (Hayter, 2004). The core idea stems from the existence of region-specific path dependencies in relation to particular technological and economic structures, and a region-specific adaptation to global economic change. Regional interactions might partially reflect global economic trends (e.g. energy and mineral markets) but reflect local choices, preferences, perceptions of threats, and subsequent policy attitudes. Therefore, regions may evolve into specific embedded institutions, whose combination does not especially reflect global economic trends (Hayter, 2004). In particular, regional dynamics may reflect various forms of resource nationalism, cultural perceptions of land ownership and of contracts, as well as the existence of region-specific trade practices.

Therefore, regional institutions (interdependencies, perceptions of threat, economic and cultural particularities) play a crucial role in international political economy. The nature of state–market interaction significantly differs between, for example, North America and Europe, between the West and the post-command economies of the former Soviet Union (FSU), and between industrialized regions and developing post-colonial countries. On this basis, it becomes useful to understand how diverse states (and public bodies in general) behave in the context of specific economic constraints related to energy interdependencies. In turn, regional discrepancies also need to be assessed.

Hydrocarbon interdependencies viewed in the light of state–market interaction

This book primarily focuses on state–market interaction in the hydrocarbon sectors. The role played by energy is hardly underestimated in the study of international political economy. Indeed, both oil and gas have generated complex cross-border interdependency in terms of production and consumption, regulatory cross-influences, financial transactions, and inter-state security considerations (Barry Jones, 1994). The effects of regional and international interdependencies were felt in the aftermath of the oil shocks of 1973, which had a significant impact on the global economy. Furthermore, recent internationalization of the gas markets has given rise to new political considerations as regards energy security, new market risks, and new stimuli for technological development.

Most of the scholars who have focused on international energy relations have emphasized the role played by structural factors in international political economy as regards energy. Studies focused on, among other topics, the alleged use made by hydrocarbon producers of energy as a foreign policy instrument, on the geopolitical rivalry between states competing for access to resources, and on the structurally opposing interests of hydrocarbon-producing and hydrocarbon-consuming nations in relation to energy markets (Kalicki and Goldwyn, 2006).¹ These approaches strongly underestimate the roles played by market trends, interdependencies, and best-practice transfers in energy policies. At the same time, the nature of energy interdependencies cannot be dissociated from political perceptions and political understanding. Interestingly, international energy interdependencies can be perceived in a different way in various regional political relationships.

It is worthwhile to underline the crucial role played by institutional factors in the early stages of the history of international political economy. In other words, it is important to focus on existing and historical patterns, which influence the behaviour of agents (i.e. states, companies, and societies) towards energy interdependencies. In particular, the role played by states in the energy sectors has to be understood by assessing policy drivers in the context of the background agenda. In particular, the nature of the influence of the state stems from both formal and informal relationships between public bodies and energy companies. Discrepancies between different policy drivers can generate different in-depth meanings for policy priorities, which can be identified in different countries and contexts.

A recent book entitled *Dynamics of Energy Governance in Europe and Russia* attempted to assess various approaches to energy governance within the European Union (EU) and its member states, in Russia and other FSU countries. Our objective consists of further delineation of the importance of institutional factors in international energy relations. For example, the conception of the role played by the state in the market, the conception of national control over resources, and regional perceptions of threat and path dependencies are crucial elements of oil and gas interdependencies. These institutional factors might play a more important role than the structural components of the interdependency in question. For instance, the distribution of resources, dependencies, and structure of markets take on either a greater or a lesser importance depending on the types of institutions involved at the national and regional levels.

Adapting these assumptions to energy markets, this book aims to demonstrate that the economic interests of market institutions do not always overlap with those of states, which tend to use market forces to bolster their long-term energy strategies, either with resource policies or with the provision of long-term energy security.

One of the core controversies with which most scholars focusing on hydrocarbon interdependency engage is the decoupling of energy security from energy dependency. Energy security is not inherent to energy dependency, but related to the stability of regional cross-border markets, norms, and practices. For example, the different degree of politicization of the coal and gas markets is linked to the fact that the international coal markets are subject to predictable norms and practices, which is not the case for natural gas. It is important to understand that energy relations vary over time and therefore do not exist independently of a specific historical context. A supply–demand pattern can exist for decades while the political climate in which that supply–demand pattern operates can change over time. In particular, institutions result from historical processes, which form cultural and social perceptions of threats related to hydrocarbon interdependencies.

On these grounds, this book aims to enlarge the geographical scope of the previous publication on the *Dynamics of Energy Governance in Europe and Russia*. Furthermore, this objective involves focusing on various aspects of the role played by the state in hydrocarbon interdependencies. This requires a careful interdisciplinary approach, which combines international political economy with a legal analysis of regulations and laws. Indeed, the legal and regulatory component

can be viewed as the main instrument by which the state may influence markets and interdependencies.

The role of regulation and law

The role played by states and other public institutions (i.e. supranational organizations in the case of the EU) in sector-specific market interaction is significant. The role of the state is most visible in the law, which can be viewed as the embodiment of government policies. Energy law and energy regulation are inextricably linked with energy policy. Both the state and the public sector use law and regulation as a tool to impact, for example, the design of the market or even public opinion in relation to the energy sector. In this respect, law is a frozen form of energy policy at a certain moment, but this policy evolves and is therefore bound to change the meaning and implication of the words. Rules relying on policy standards – for example, natural monopoly, security of supply, or public service – can change dramatically if such concepts undergo evolution or if their meaning and general acceptance collapse. These changes can be rapid, as in the case of change in technology, or gradual, as in the case of a change in the underlying policy approach to energy or energy markets. Such changes are more difficult to predict, though they can be recognized in retrospect.

Over the past few decades, energy regulation has transcended national borders. This means that states often use similar terminologies in energy law and regulation, in investment right definition, and in various social and environmental liabilities. Nevertheless, the wording does not always correspond to the institutional understanding of the regulation in each state or region.

Globalization has influenced new perceptions of energy security threats and hence various national and regional reactions to global processes. However, regional and national specificities are still very important in the variety of reactions towards the globalization. The role played by public policies (China), non-market driven diversification (the EU), and the use of energy as a diplomatic tool (Russia) highlight various examples of the trend. These policies do not always reflect the logic of the markets and therefore political and economic perspectives often contradict each other. There is an emerging contradiction between the reshaping of national sovereignty and the vulnerability of states in the light of global market trends, on one hand, and the ever-present desire of states to control the markets, on the other. At the same time, these dynamics are different for export-dependent states, where

resource nationalism is often accompanied by non-acceptance of norms and practices emanating from the traditional 'old West'.

Interdependencies, institutions, and regions

Taking the above-mentioned theoretical debates into account, Part I analyses three main components of the international political economy of energy. These are mostly related to various dimensions of energy interdependencies, to the impact of such interdependencies upon institutions, and finally to the possible impact of hydrocarbon interdependencies and national institutions on regional integration–disintegration processes.

The first component consists of redefining energy interdependencies. Oil markets have long been international and gas markets are now becoming international. States are exposed to market volatilities and progressively take into account new economic realities. Hence, Part I mostly addresses horizontal transnational challenges for both states and markets in terms of international energy relations. Therefore, Chapter 1 by John V. Mitchell and Beth Mitchell assesses the different impacts of international political economy on hydrocarbons. Interestingly, state influence often wanes in trade transactions, as states become exposed to international trade and financial flows. At the same time, when looking at resource control, the role of national oil companies has only accelerated. Moreover, national oil companies go international and adopt new behaviour, which might be a faster adaptation to the challenges of globalization.

The second component consists of analysis concerning concrete institutional reactions to interdependencies. Although there is no consensus on the definition of institutions, institutional analysis offers a solid platform from which to demonstrate the role played by formal and informal practices and norms, all of which stem from their structural context. The common ground for an institutional analysis consists in providing a conceptual framework for long-term policy priorities, risks, and structural constraints (Peters et al., 2005). The book also includes discussion of the role of institutions in interdependent contexts. For this purpose, Chapter 2, by Pami Aalto, assesses the impact of hydrocarbon interdependencies on the development of state and market institutions.

This continuum is made up of actors at various levels. The first of these comprises 'informal institutions' representing long-term, historically developed abstract principles and practices such as sovereignty; trade, including the market and also other varieties of capitalism;

management of energy issues among the great powers; and energy diplomacy. The second level comprises 'formal institutions', which represent the organizational embodiment of informal institutions. These include states and supranational entities like the EU; companies; and international financial institutions. Thirdly, within formal institutions we may also discern more mundane 'policy-making institutions', which have a short-term impact on energy policy. These include energy and market regulators; sector-specific ministries and Directorate-Generals within the EU; committees and task forces; lobbyists and other interest groups.

Given this theoretical framework, the task of the energy analyst involves outlining how the continuum of informal, formal, and policy-making institutions impacts on particular markets in practice. By evaluating these long-term and short-term institutions, we may develop a realistic, policy-relevant idea of what states and markets may be expected to achieve in energy policy terms within a given timeframe.

The third component of the horizontal section focuses on the interaction between the interdependence of the hydrocarbon markets and regional integration–disintegration processes. Chapter 3, written by Andrei V. Belyi and Andrey Makarychev, analyses the importance of regional integration–disintegration processes. The main research objective of this chapter lies in seeking to understand whether energy can be a factor in regional integration. When assessing the institutional dynamics within energy interdependencies, one needs to understand that interdependence may be either positive or negative. A positive interdependence emerges when states are happy to cooperate with each other. By contrast, negative interdependence leads to mutual avoidance. In particular, mutual avoidance leads to a willingness to pay for various diversification projects, even though those may not be economically profitable. Integration and disintegration processes stem from deep-rooted policy practices, which lead to either the acceptance or rejection of common institutions. The interest that frames our approach consists in highlighting interactions between political (state-centred) and economic (market-centred) institutions, where regional institutionalization of energy relations is concerned, and in analysing the diversity of regional institutions. In some cases, energy impacts on the policy motivations of states, while in others it is merely a tool to achieve other objectives.

The three components form a single research topic which comprises the assessment of the influence of the institutional component outlined above on the structural component. More particularly, Part I seeks

to understand the impact of political institutions on international interdependencies in hydrocarbons.

Control over resources: A single concern with varied approaches

Control over resources is one of the crucial aspects of hydrocarbon interdependencies. In this regard, a basic distinction must be drawn between states endowed with energy resources and those which import energy. This also involves a distinction between energy policy and resource policy. Energy policy is about markets, security of supply, and efficiency. It is about government policies aimed at securing energy resources at the least possible cost, including social costs. Modern energy policy typically relies on the markets, at least to some extent, to provide efficiency and security. Government energy policy is geared to the provision of a supply of energy at low cost in order to promote the competitiveness of the national economy as a whole.

On the other hand, resource policy is about government strategy to maximize revenue and exercise sovereignty. It is often related to a country's more general development policies. In this regard, government policy focuses on maximizing resource revenue. The objective is to squeeze as much revenue as possible from the resources, before they run out. The revenue thus derived is then (ideally, though not always in practice) used to develop the overall economy or to attain other similar objectives. The strategy is not very different in terms of energy resources and other types of resources, such as precious metals and so forth.

This distinction is drawn as the drivers behind the two are different. With a degree of generalization, one might suggest that one essential difference between the two is that energy policy is about security of supply, whereas resource policy is about security of demand. This is a significant difference and distinguishes the policies of producing and consuming states. Of course, producing states will also have an energy policy in place, which can be linked with the resource policy.

In Chapter 4, Wojciech Ostrowski highlights the main ideological divide regarding the energy sector, which occurs between liberal economies and state capitalism. In most cases, energy-rich countries tend to gain certain strengths from their reserves in order to either attract more foreign investment (liberal approach) or gain greater political power (resource nationalist approach). However, discrepancies between these perspectives also depend on national and regional characteristics.

As analysed in Chapter 7, written by Marat Terterov and Claudia Nocente, the Middle East remains the most complex area of policy-economic interrelationships. Latin America analysed by Isabelle Rousseau, in Chapter 6, offers an interesting example of changing resource regimes between states and also over time. Resource nationalism has specific political regional characteristics. Oil reserves are often interpreted by states in this region as instruments of regional influence, which can take on a strong ideological dimension. Isabelle Rousseau's comparison of Mexico and Venezuela evidences different political attitudes towards resources.

Russia remains a *sui generis* case, which does not fit the profile of a 'classic' petro-state (Gufstanson, 2012). Russian energy policy is based on a developed state structure, backed by a large scientific and engineering establishment. Although corruption and non-transparency do exist, most of the hydrocarbon export revenues are repatriated to Russia. Russia has developed its own conception of gas markets, which is certainly challenged by recent developments in the internationalization of transactions in blue fuel. Chapter 5, written by Andrei V. Belyi and Catherine Locatelli, constitutes a case study of Russia in this respect.

Various regional studies of hydrocarbon-export-dependent economies demonstrate the importance of historical institutions, cultural background, and political specificities, which impacts on various state attitudes towards resources and markets. Although path dependencies exist in most of these cases, the type of resource nationalism exhibited varies.

Hydrocarbon-consuming states: Between competition and market stability

State and market interrelationships are very specific in energy-consuming countries – that is, states which have a significant demand for fossil fuels, even where there is some domestic production which does not create export dependency on energy commodities. In most cases, states tend to influence markets through regulatory measures. Nevertheless, these measures still differ between North America and Europe as well as between the 'old West' and emerging Asian economies. One may observe that some of these states are also hydrocarbon producers.

The United States is the most interesting and debated case because of the shale gas revolution which has taken place there. Conventional wisdom tends to attribute this revolution to free market forces and the private property system. While these certainly played a role, a little known