

Chapter 1

Introduction: Climate Change and the Law

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Abstract The United Nations Framework Convention on Climate Change (UNFCCC) celebrates its twentieth anniversary in 2012. The two decades following its adoption have witnessed a significant evolution in legal responses to climate change. The international climate regime itself has grown considerably and evolved into a highly specialized area of international law and legal expertise. Its evolution has inspired the expansion of climate law also at the regional, national, subnational and transnational levels. The emphasis of climate law has traditionally been on mitigation, but adaptation, finance, technology and capacity building have recently asserted their place as key elements of climate change law and policy.

1.1 Exploring the Relationship Between Climate Change and the Law

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The international climate regime itself has grown considerably and evolved into a highly specialized area of international law and legal expertise. Its evolution has inspired the expansion of climate law also at the regional, national, subnational and transnational levels. The emphasis of climate law has traditionally been on mitigation, but adaptation, finance, technology and capacity building have recently asserted their place as key elements of climate change law and policy.

Given the enormous complexity of the underlying challenge, legal activity around climate change has witnessed the active exploration of innovative regulatory instruments and approaches. The range of legal approaches to mitigate greenhouse gas emissions include regulations, standards, environmental permitting, taxes, emissions trading, offsetting mechanisms, financing schemes and other inventive instruments. Meanwhile, the global average temperature is increasing and the impacts of warming are already observable on all continents. A failure to halt the continuing growth of global greenhouse gas emissions and turn them towards a declining trend is projected to have dramatic consequences for a number of countries, populations and ecosystems. Adaptation to the harmful impacts of climate change is therefore having a growing effect on normative systems governing, for instance, land use and agriculture, water resources, coastal management and health policy. The adaptation challenge is also increasingly drawing attention to links between climate change, biodiversity and human rights.

Against the backdrop of lively regulatory activity around climate change, this book sets out to explore the relationship between climate change and the law. Is climate change law emerging as a new legal discipline? If so, what common principles, objectives and other shared categories define it? How does climate change law relate to other areas of law? The book approaches these questions by exploring the rich diversity of international, regional, national, sub-national and transnational legal responses to climate change. While the book seeks to place the emphasis on doctrinal questions, its 30 chapters also address a range of substantive and institutional issues. They illustrate that normative activity around climate change has seen a lively exploration of new regulatory philosophies, harnessing innovative and flexible instruments. Furthermore, the active involvement of multiple governance levels and various non-state actors has stretched in many ways the conceptual boundaries of traditional jurisprudence. Given the global nature of the climate change challenge, countries sometimes seek to use climate law to influence the behavior of actors located outside their geographical boundaries. The European Union (EU), with its global climate leadership aspirations, is an obvious example. Others could, however, soon follow the suit. Such developments highlight doctrinal questions concerning the migration of legal norms and regulatory innovations on the one hand, and the legal implications of climate change unilateralism on the other. Because of its cross-cutting nature, climate change law can also easily affect neighboring areas of law. The relevant doctrinal questions in this regard relate to fragmentation and ways of making the relevant international legal regimes, such as those dealing with trade, biodiversity, human rights and climate change, mutually supportive. These are some of the broad themes explored in this book.

1.2 Structure and Organization

The book consists of five parts. Part I is dedicated to exploring climate law as an emerging legal discipline. In Chap. 2, Mehling therefore highlights the unique nature of the objectives, principles and instruments that form the normative acquis devoted to addressing climate change, which allows for a better definition of its boundaries vis-à-vis other areas of law and justifies its conceptual understanding as a distinct body of law. In Chap. 3, Kulovesi analyzes emergent trends in climate law and scholarship. She draws attention to questions concerning multi-level governance, migration of legal norms and relevance of the private sector and voluntary initiatives for climate law. In Chap. 4, Ekardt addresses the relationship between climate change, legal theory and justice, drawing a normative vision of a justice-based framework for global climate governance. His conclusion is that a governance framework based on the concept of “one human, one emission right” and a global system of transferable emission rights is the approach most likely to maximize enjoyment of freedom across generations and regions and, by extension, to achieve justice in climate policy.

Part II focuses on international climate law. It addresses questions concerning architecture and institutions. Chapter 5 by Maguire analyzes objectives, principles and methods of climate law. It draws attention to the foundations of the international climate regime, including the Convention’s ultimate objective in Article 2, its key principles in Article 3, and the methods of the regime in Article 4. In addition, Maguire examines state sovereignty and responsibility, preventative action, cooperation, sustainable development, precaution, polluter pays and common but differentiated responsibilities, evaluating the incorporation of these concepts into the international climate regime. In Chap. 6, Bausch and Mehling survey alternative venues of climate change cooperation from an institutional perspective, assessing the past performance of different regimes and fora active in climate change mitigation, and inferring necessary conditions for their ability to contribute to meaningful progress in international climate cooperation. In Chap. 7, Vihma discusses the role of hard and soft law in the international climate change regime. His argument is that a notable turn toward soft law is taking place in terms of developed country mitigation commitments. He contends, however, that the UN regime is at the same time becoming harder by enhancing transparency of actions by all major economies. Chapter 8 by Doelle tracks the work of the Compliance Committee under Kyoto Protocol. He reviews the basic features of the Committee, including its Enforcement and Facilitative Branches, and provides an overview of the key issues brought before the Committee in 2006–2012. Doelle then assesses the effectiveness of the Enforcement Branch in light of the first seven issues of implementation brought before it.

As indicated above, the scope of international climate law has expanded from its original focus on mitigation and is now increasingly addressing questions related to adaptation, technology and finance. At the same time, questions concerning justice, equity and human rights are also crucial in the context of legal responses to

climate change. Part III is dedicated to such cross-cutting issues. In Chap. 9, Yamineva and Kulovesi describe and analyze the reformed framework for climate finance under the UNFCCC. They argue that the recent establishment of the Green Climate Fund constitutes an important milestone and progress has also been made in other respects. They conclude, however, that long-standing divides and mistrust between developed and developing countries have shaped the negotiations and continue to be reflected in their outcomes. In their view this, together with the lack of clarity over long-term sources of finance, casts shadows over the future effectiveness of the new framework. In Chap. 10, Eni-ibukun focuses questions concerning climate justice in light of experiences from the Kyoto Protocol's Clean Development Mechanism (CDM). She proceeds from the argument that justice considerations are intimately linked to the climate change, and that the climate change regime contains a range of provisions, tools and measures that seek to promote justice. One of such tools is the CDM. Eni-ibukun analyzes the CDM from the point of view of distributive justice, defining what distributive justice in the CDM means, examining what it should look like, and identifying the main causes for the lack of distributive justice in the CDM. In Chap. 11, Verschuuren discusses legal aspects of climate change adaptation. He provides an overview of the adaptation-related international legal obligations under the UNFCCC. He also demonstrates the impact of adaptation considerations on the relevant fields of law, highlighting marine and coastal adaptation, water management, biodiversity conservation, planning and land use, buildings and infrastructure, energy and telecommunications, and migration. Verschuuren argues that there are hardly any areas of law that are not impacted by climate change, and considers the need for changing the law to facilitate adaptation measures. Chapter 12 by Koivurova, Duyck and Heinämäki explores the relationship between climate change and human rights. The authors argue that while this linkage has been given little attention, its importance is likely to grow in the coming years. They demonstrate how climate change affects the enjoyment of human rights and has already led to a human rights petition against the United States. They also explore implications of human rights for the functioning of the climate change regime, such as the emerging rights to participate in environmental decision-making. They also consider whether human rights can, or even should, influence the future design of the climate change regime will be examined.

Given its complexity, climate change affects most sectors of the economy and society. For this reason, the international climate regime is closely related to several other international legal regimes in the form of overlapping subject matters and legal rules. These themes are explored in Part IV, which focuses on sectoral issues. In Chap. 13, van Asselt discusses the fragmentation of international climate change law and describes interactions between the relevant international legal regimes. He also examines various management strategies with a view to enhancing synergies and mitigating conflicts between climate-related international legal regimes. The conclusion by van Asselt is that the application of various strategies is necessary to manage the fragmentation of international climate law. Chapter 14 by Morgera draws attention to linkages between the international biodiversity and climate change regimes, and highlights ways in which international biodiversity law

contributes to the fight against climate change by addressing negative impacts on biodiversity and community livelihoods of measures to address climate change and adopting the ecosystem approach to climate change mitigation and adaptation. Morgeera argues that positive interaction between the international biodiversity and climate change regimes can promote a human rights-based approach to the development of the international climate change regime and its implementation at the national level. In Chap. 15, Savaresi focuses on the role of REDD+ (reducing emissions from deforestation and forest degradation in developing countries; and the role of conservation, sustainable management of forests and enhancement of forest carbon stocks in developing countries) in harmonizing overlapping international obligations relating to climate change, biodiversity and human rights. She highlights links between biodiversity and human rights law and the subject matter of REDD+, also demonstrating that some steps have already been taken to address potential overlaps. The question of overlaps is therefore not a merely theoretical one. Savaresi offers an account of the ongoing debate, providing a snapshot of its evolution, as well as some predictions on its outcome. In Chap. 16, Kulovesi focuses on the intersection between the international climate change and trade regimes. She identifies potentially sensitive areas in the relationship between the UNFCCC and the World Trade Organization (WTO), including sustainability requirements targeting processes and production methods, as well as measures targeting carbon leakage and competitiveness concerns. Kulovesi also highlights institutional and doctrinal challenges related to fragmentation of international law, identifying problems that could arise if a climate change related dispute was considered by the WTO dispute settlement system. She concludes that the trade and climate regimes are increasingly relevant for each other and that they are not necessarily rivals – both could benefit from identifying and promoting unexploited synergies between the two regimes. However, closer cooperation and institutional coordination may be needed in the future in order to avoid mutually unhelpful institutional and legal clashes. Chapter 17 by Bodle discusses the question of geoengineering. Bodle provides an overview of geoengineering techniques and the existing international law applicable to them. He indicates that geoengineering techniques are not prohibited as such, and are hardly addressed by international law. He therefore argues that they pose fundamental challenges to international climate law. According to Bodle, the main challenge for policy makers is deciding whether and how to get involved in geoengineering without providing an incentive or excuse for stepping away from reducing emissions. He also stresses the need to clearly separate scientific input and political decision-making.

Part V entitled “Comparative Climate Law” traces the evolution of climate change law and policy in a number of countries and regions. This part serves to demonstrate that developments at the international level have often given important impetus to the evolution of climate law and policy in several national jurisdictions and regionally. Still, many of the detailed solutions have been driven by domestic considerations. Part IV begins with a focus on North America. In Chap. 18, Mehling and Frenkil assess the landscape of climate and energy law in the United States, and identify procedural and structural obstacles to greater domestic policy ambition.

Glenn and Otero proceed to describe the evolution of the Canadian legal framework for climate policy in Chap. 19, explaining the controversial position of Canada with respect to the Kyoto Protocol as a consequence of inconsistent federal leadership. Following these two chapters on North America, the focus then shifts to the European Union (EU) and some of its Member States. In Chap. 20, Mehling, Kulovesi and de Cendra explore the development of climate law in the EU and suggest explanations for the leadership role that the EU has assumed on climate change in the international community – a role that goes so far as to include highly controversial unilateral measures. In Chap.s 21 and 22 Ekardt and Reid focus on national-level developments in Germany and the United Kingdom, respectively. Ekardt elaborates his interpretation of German climate law in Chap. 21, drawing a critical picture of the body of rules adopted in that country to counter climate change, and highlighting the unintended consequences of several measures, such as rebound effects from energy efficiency regulation and displacement effects from rules on renewable energy promotion. Chapter 22 by Reid indicates that there is no single legislative source for the United Kingdom's legal response to climate change. He explains that initial measures to tax large energy users, enable participation in the EU Emissions Trading Scheme and encourage renewable electricity generation have subsequently been joined by the Climate Change Acts operating at UK and Scottish levels. These Acts set demanding targets for reductions in greenhouse gas emissions and break new and uncertain legal ground in making these legally binding on Ministers. Reid also demonstrates that separate legislation in Scotland highlights the difficulties that dealing with pervasive issues, especially those with an EU and international dimension, pose for sub-national governments with distinct political ambitions but limited jurisdiction.

In Chap. 23, Yamineva discusses the evolution of climate law and policy in Russia. She argues that for a long time, Russia's climate policy remained underdeveloped and lagged behind other countries. The presidential term of Dmitry Medvedev and his modernisation agenda brought about the necessary transformation as the Climate Doctrine adopted in 2009 acknowledged the anthropogenic nature of climate change, setting principles and goals for mitigation and adaptation policies. She also discusses the development of a comprehensive framework for energy efficiency and energy conservation arguing that, if fully implemented, it will lead to significant reductions in greenhouse gas emissions. In Chap. 24, Mascher and Hodgkinson describe developments in Australia. They discuss the Clean Energy Act 2011, which will, for the first time, introduce a carbon price into the Australian economy. They argue that the passage of the Act marks a momentous step forward for Australia, a country that until now has been dominated by a domestic climate change policy of 'no-regrets.' Chapter 25 by Kimura focuses on the evolution of climate change law and policy in Japan. She explains that the Japanese regulatory approach combines a framework law, the Law Concerning the Promotion of the Measures to Cope with Global Warming, and specific laws, as well as the proactive use of voluntary approaches such as Keidanren's Voluntary Action Plan. Unique policies have also been introduced, including the Japanese Voluntary Emissions Trading Scheme and bilateral offset mechanisms. According to Kimura, the, Japanese

decision not to participate in the second commitment period under the Kyoto Protocol spells out a gloomy future for a quick passage of the Basic Bill to Cope with Global Warming Bill.

The next four chapters describe national developments in the four largest emerging economies, namely China, India, South Africa and Brazil. Chapter 26 by Tung is dedicated to climate law in China. He argues that China has taken significant steps to advance sustainable development and transition to a low carbon economy. Since 1994, a national sustainable development strategy has underpinned the creation of policies and law that directly and indirectly impact the environment and climate change. While indicating that the policy and legislative process has been broadly successful, Tung also draws attention to problems. In conclusion, he offers recommendations on how problems could be avoided and how sustainable development objectives and principles could be strengthened in the implementation of Chinese laws and policies directly or indirectly impacting climate change and low carbon economy objectives. In Chap. 27, Patodia Rastogi analyzes the development of India's national climate change strategy. She argues that India, along with most other developing countries, has viewed climate change as an environmental concern that first and foremost must be addressed by the industrialized west. According to her, development challenges are India's priority and domestic action on climate change has been minimal and in so far that it existed, it has primarily been viewed as a 'co-benefit' of another policy. Patodia Rastogi argues that in 2008, a dramatic shift was seen in India's approach to addressing climate change due to the release of the National Action Plan on Climate Change, a comprehensive framework policy where climate change is the central focus. In Chap. 28, Kidd and Couzens describe climate change responses in South Africa. They argue that despite a long history of climate policy development, there is insufficient legislation addressing climate change. They discuss relevant policy documents, including the 2011 White Paper on the National Climate Change Response and also consider South Africa's energy policy. They conclude that continuing on the current path means that it will be extremely difficult to reconcile the goals of strong economic growth and poverty alleviation with environmental protection generally, and South Africa's international commitments in the climate change issue-area specifically. In Chap. 29, Machado-Filho describes climate change policy and legislation in Brazil. He highlights common obligations for all Parties established under Article 4.1 of the UNFCCC. He then focuses on recent policies and legislation on climate change adopted in Brazil, which are fundamental for the implementation of commitments under the UNFCCC. Machado-Filho argues that new developments, including the voluntary quantified target for reducing emissions announced in 2009 and encapsulated in the National Policy on Climate Change, demonstrates that Brazil has moved from "due diligence" measures, with a view to respecting the obligations formulated under international law, towards the goal for real contribution to the combat against climate change.

Finally, in Chap. 30, Aguilar and Recio provide an overview of the evolution of climate law in Latin American countries, arguing that climate change law in Latin America is in its infancy, although advancing at a steady pace. They explain that

most countries in the region have adopted soft law instruments, including climate change strategies, and, in some cases, climate change plans of action or sectoral action plans for adaptation or forestry. Brazil, Mexico, Colombia and Ecuador have more coherent legal frameworks for climate change, although only Brazil had adopted a substantive climate change law at the time of writing. Aguilar and Recio conclude that frameworks related to climate change mitigation are more advanced than those dealing with adaptation, even though several Latin American countries identify adaptation as a key priority for their future development. They also argue that policy implementation remains challenging, with mainstreaming across sectors, allocation of budget resources and presidential support being identified as crucial elements and recurring challenges. The chapter also finds that sub-national entities are increasingly involved in the development and implementation of climate change policy tools at the local level.