FACULTY OF GOVERNANCE AND GLOBAL AFFAIRS

Guardians of the Climate

The Judiciary as a Security Actor in the Field of Climate Change?

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"Our task must be to free ourselves ... by widening our circle of compassion to embrace all living creatures and the whole of nature and its beauty."

~

Albert Einstein

Abstract

The end of the Cold War heralded a period of conceptual reorientation for the study of security. In recent years, the environment has increasingly been perceived as a potential security threat. Climate change is often understood as a 'wicked problem', meaning it is characterised by high complexity and uncertainty, as well as a divergence of viewpoints. The fact that anthropogenic climate change is a wicked problem allows for an understanding of why governments over-promise and under-deliver on the actions they intend to take to safeguard the planet from further warming. Governmental failure to implement successful climate change policies has been under judicial scrutiny in a number of countries. This paper aims to scrutinise the function of national judicial systems in the national climate change policy, a topic which has yet to receive significant attention by legal and security studies scholars worldwide. It will answer the following research question: *How can we understand the role played by the judiciary in encouraging liberal democratic states abide by their climate change commitments?* By drawing upon case studies from the Netherlands, the United Kingdom, New Zealand, and the United States of America – and placing these case studies in a global perspective – this study will address this its research question. It concludes that strict judicial oversight is crucial to encourage governments to follow through on climate change commitments. Government policy benefits from such rulings, as they reduce the 'wickedness' of climate change policy by making the national responsibilities and target clearer

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1. Introduction

The end of the Cold War heralded a period of conceptual reorientation for the study of security.[1] Breaking with the military, sovereignty-oriented definitions of security, the Copenhagen School of Security provided scholars and practitioners with the insight that, through discourse, every topic can potentially be made into a security topic.[2] In recent years, the environment has increasingly been perceived as a potential security threat.[3] As early as the 1980's, Governments and oil companies began acknowledging the potentially devastating impacts of human induced climate change.[4] By the mid-1990's, the international community agreed on the need to reduce greenhouse gas (GHG) emissions, particularly CO_2, to halt human induced climate change and retain a liveable planet for future generations. Moreover, in 2007 the United Nations Security council (UNSC) first discussed climate change as a threat to international security.[5]

Climate change is often perceived as a 'wicked problem', meaning it is characterised by high complexity and uncertainty, as well as a divergence of viewpoints.[6] In the case of climate change, the problem is also inherently transnational. This can provide a premise for various stakeholders, including governments, to evade direct responsibility.[7] The fact that anthropogenic climate change is a wicked problem allows for an understanding of why governments over-promise and under-deliver on the actions they intend to take in order to safeguard the planet from further warming. The government, bearing primary responsibility for the well-being and security of its citizens, ought to be the actor instigating change.

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[1] David A. Baldwin, "The Concept of Security" *Review of International Studies* 23 *(*1997): 9.
[2] Ole Waever, "Securitization and Desecuritization," in D. Lipschutz Ronnie (ed.), *On Security* (New York, Chichester: Columbia University Press, 1995): 56.
[3] Maria J. Trombetta, "Environmental security and climate change: analysing the discourse," *Cambridge Review of International Affairs* 21, no. 4 (2008): 585-586
[4] Ibid.
[5] United Nations, "Security Council Holds First-Ever Debate on Impact of Climate Change on Peace and Security," *United Nations Security Council Press Release* SC9000 (2007).
[6] Brian W. Head, "Wicked Problems in Public Policy," *Public policy* 3, no. 2 (2008): 102.
[7] Ibid.

Governmental failure to implement successful climate change policies has been under judicial scrutiny in a number of countries. A notable example of this is the *State of the Netherlands v. Urgenda Foundation.*[8] In this particular case, a national foundation successfully sued the government For not taking enough measures to ensure that GHG emissions would be limited further. The case was put before the *Hoge Raad* (Supreme Court of The Netherlands), which concluded the government to be in breach of Articles 6 and 8 of the European Charter of Human Rights.[9] The court went as far as declaring that the government did not do enough with regard to its climate change commitments. It, consequently, ordered the government to achieve a 25% reduction of CO_2 emissions compared to 1990 levels – as opposed to the previous target of a 20% reduction.[10] Further environmental awareness is present in judiciary systems across the world. Judicial review proceedings have seen various degrees of success in in New Zealand and, recently, in the United Kingdom (UK). The British Court of Appeal prohibited the government to construct a third runway at London Heathrow Airport because of the government's failure to take into account the Paris Agreement.[11] Additionally, a district court in the United States declared appropriate action to halt anthropogenic climate change a constitutional right, though this ruling was overturned in a higher court.[12] Nevertheless, the legal action and apparent willingness of courts to hold governments to account over the failure to live up or take into account its own climate change commitments is indicative of attempts made by the judiciary to assume a role as a driver of environmental security.

The increased relevance of judicial scrutiny of climate change policies could be described as a 'judicial turn' in environmental security. This judicial turn will be the central to this study. This

[8] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019).
[9] Ibid. 7.5.1.
[10] Ingrid Leijten, "Human rights v. Insufficient Climate Action: The Urgenda case," *Netherlands Quarterly of Human Rights* 37, no. 2 (2019): 113.
[11] Damien Carrington, "Heathrow third runway ruled illegal over climate change," *The Guardian* (2020): https://www.theguardian.com/environment/2020/feb/27/heathrow-third-runway-ruled-illegal-over-climate-change, accessed on 28-02-2020.
[12] Melissa Powers, "Juliana v United States: The next frontier in US climate mitigation?," *Review of European, Comparative & International Environmental Law* 27, no. 2 (2018): 199.

study will, however, refrain from focusing on the movements which bring such cases to domestic courts; a topic which, in recent years, has received extensive academic scrutiny. Rather, this paper aims to scrutinise the function of national judicial systems in the national climate change policy, a topic which has yet to receive significant attention by academics in the legal and security studies fields worldwide. This study attempts to fill the research gap by answering the following question: *How can we understand the role played by the judiciary in encouraging liberal democratic states abide by their climate change commitments?*

The research will be structured in the following manner. The subsequent chapter will outline the study's theoretical framework. Chapter Three concerns itself with the methodology, highlighting the ontological and epistemological assumptions of this paper. It will outline practical matter such as case selection and what sources to draw upon. Chapter Four will provide the reader with a contextual understanding of the onset of environmental politics, the subsequent securitization of climate change, and explain why governments have great difficulty living up to their climate change commitments. The next chapter will consist of four in-depth case studies into climate change litigation, in order to foster an understanding of court rulings. The case analysis obtained in Chapter Five will be distilled and examined in a global context in Chapter Six. In this chapter this study will identify the common factors of the four case studies, connect them to the global trends in climate change litigation, and outline a general theory of the role of national judiciaries in the securitization of climate change. Finally, this study will conclude that by providing clarity and enforceability, the judiciary plays an important role in reducing the 'wickedness' that impedes upon successful climate policy.

2. Theoretical Framework

This chapter will aim explain the primary concepts this paper draws upon. Additionally, it will locate the present study within the field of environmental security. Specifically, this chapter will elaborate upon securitization, environmental security, wicked problems, and the judicial turn in environmental security.

2.1. Security

Before delving into the specifics of securitization, this study should firstly clarify what it means by security. Influenced by (neo) realist thinking, security has been associated with military security exclusively. Influenced by Westphalian notions of state sovereignty within borders as well as a Hobbesian outlook on international relations – meaning that the interaction of states takes place in a situation of anarchy – the leitmotiv of security became the defence of one's territorial integrity against potential aggressors.[13] This limited the understanding of security to primarily to study of strategy and military capability.[14]

After the end of the Cold War, however, the rapid pace of globalisation as well as the decreased threat of interstate conflict demanded a critical reflection on what is considered security.[15] Threats to the state and its citizens such as terrorism, climate change and attacks in the cyber domain are inherently transnational in nature. Additionally, they do not necessarily fit in the military understanding of security previously predominant. Drawing upon Wolfers' deliberations on national security, Baldwin and Buzan, amongst others, noted that security was an essentially ambiguous and contested concept.[16] Moreover, Baldwin argued that security was in need of a definition. In search for such a definition he refined Wolfers' conceptualisation of security as "a low probability of damage to acquired values."[17] Baldwin's authoritative conceptualisation of

[13] David A. Baldwin, "The Concept of Security" *Review of International Studies* 23 *(*1997): 9-10.
[14] Ibid. 9.
[15] Ibid.
[16] Barry Buzan, "Rethinking security after the Cold War," *Cooperation and Conflict* 32, no. 1 (1997): 25.
David A. Baldwin, "The Concept of Security" *Review of International Studies* 23 *(*1997): 9-10.
[17] Ibid. 13.

security will serve as of this study's background understanding of all matters related to security. The reason for this choice is that Baldwin's definition is sufficiently precise but also leaves the necessary space for security topics to be defined by society – rather than observing security to relate to a fixed set of topics. Depending on the 'acquired values' a country has, it can apply security logic in a narrow or an extensive and comprehensive fashion. This understanding allows for non-traditional matters to be understood as security topics.

2.2. Securitization Theory

Following this understanding, *securitization theory* becomes a necessary concept to elaborate upon. Securitization theory is the answer of the Copenhagen School of Security to the ambiguity of security as a concept. It argues that ordinary policy matters can be elevated out of the normal policy realm through discursive acts.[18] When elevated to the security realm, the normal deliberative space disappears.[19] As a security topic, the use of extraordinary measures becomes imperative.[20] These extraordinary measures, according to the Copenhagen School, still involve a militaristic response. Consequently, some authors caution against the securitization of non-traditional security topics. These authors argue that the militaristic response stemming from securitization will have a negative impact on non-traditional security topics, such as the environment.[21] In this logic, the environment features as a prominent example of why securitization might not always be desirable. However, other authors, such as Trombetta, demonstrate that the securitization of non-traditional problems can effectively result in a change of the logic of securitization.[22] She applies this logic to the environment, arguing that securitizing the environment does not result in a militarised response

[18] Ole Waever, "Securitization and desecuritization," in D. Lipschutz Ronnie (ed.), *On Security* (New York, Chichester: Columbia University Press, 1995): 56.
[19] Ibid.
[20] Ibid.
[21] Daniel Deudney, "The case against linking environmental degradation and national security," *Millennium* 19, no. 3 (1990): 461-476.
[22] Maria J. Trombetta, "Environmental security and climate change: analysing the discourse," *Cambridge Review of International Affairs* 21, no. 4 (2008): 585-586.

to climate change, but does grant the problem of climate change the urgency, extraordinary measures, and funding that are required to combat it successfully.[23]

It will be of specific interest to this paper to analyse whether a specific version of securitization can be observed in the judiciary. As mentioned earlier, securitization relates to the making of policy, and therefore logically focusses on the executive and legislative branches of government. However, in absence of appropriate action of these branches, the judiciary may become a relevant object of scrutiny. The role of the judiciary in the securitization of climate change – 'judicial securitization' if you like – has not been subjected to significant academic scrutiny.

2.3. Environmental Security

Environmental security is still a very diffuse topic. Early studies of environmental security focused on the impact climatic factors have on conflict. Specific topics were the impact of drought and water resources on the emergence and evolution of armed conflicts, both inter- and intrastate in nature.[24] Over time, awareness of human induced climate change spread throughout the academic world and, later, the wider public and consequently the political sphere. Authors such as Trombetta and Dalby gained increasing prominence with their appeals to approach the environment and specifically climate change through the lens of security.[25] Global warming has and continues to result in consequences in other security-related fields. It is a driver of issues such as mass-migration from increasingly arid regions, poverty, terrorism, and conflict. The origins of the Syrian Civil War have by various security scholars been linked to climate change related droughts in the years prior.[26] In addition to being a driver of other security concerns, the heating of the planet poses direct risks to large populations on the planet. Sea-level rise is increasing the risk of deadly floods in regions

[23] Maria J. Trombetta, "Environmental security and climate change: analysing the discourse," *Cambridge Review of International Affairs* 21, no. 4 (2008): 585-586.
[24] Ibid.
[25] Ibid.
Simon Dalby, "Ecopolitical discourse: 'environmental security' and political geography," *Progress in Human geography* 16, no. 4 (1992): 516.
[26] Peter H. Gleick, "Water, drought, climate change, and conflict in Syria," *Weather, Climate, and Society* 6, no. 3 (2014): 338.

such as New York City, the Netherlands and Flanders, Bangladesh and the Jakarta region in Indonesia.[27] Political and social movements increasingly underline the importance of climate change. Protests, such as *Fridays for Future,* have seen the participation of young people from all across the globe. This combined, with the activism of academics and the rise of 'green politics', has led governments to increasingly treat the environment as a security issue. The 'European Green Deal' and the Paris Agreement are notable examples of the urgency felt by governments to act upon this problem.

2.4. Wicked Problems

The wicked problem, as a concept, was introduced by Rittel and Webber in 1973. They observed that modern problems are often difficult – if not impossible – to define, interconnected, and rely on political judgement rather than science for resolutions.[28] Or, in the words of Head, wicked problems are "inherently resistant to a clear statement of the problem and resistant to a clear and agreed solution."[29] Head goes on to order wicked problems as a product of three factors, complexity, uncertainty, and divergence.[30] A problem is considered to be 'wicked' when all three factors are high, as represented in figure 1, here below.

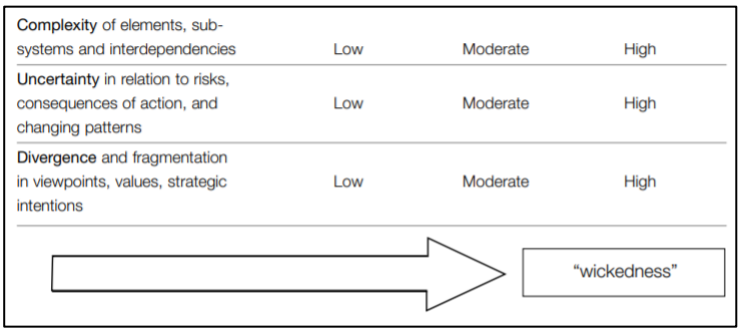

Figure 1: Wicked Problems (as per Head, 2008)[31]

[27] Susan Hanson et al., "A global ranking of port cities with high exposure to climate extremes," *Climatic change* 104, no. 1 (2011): 100.
[28] Horst W. Rittel, and Melvin M. Webber, "Dillemas in a General Theory of Planning," *Policy Science* 4, no. 2 (1973): 136-144.
[29] Brian W. Head, "Wicked problems in public policy," *Public policy* 3, no. 2 (2008): 102.
[30] Ibid. 103.
[31] Ibid.

Climate change is a particularly wicked problem. In academic literature, climate change is often classified as a 'super wicked problem'.[32] It is classified as such because, while conventional wicked problems might lack an adequate policy response, climate change has four additional problematic features: 1) There is a limited response time; 2) those responsible for the problem are also the ones needed to provide the solution; 3) the central authority needed on environmental matters is insufficiently strong; and 4) the problem is subject to irrational discounting – this concerns a situation where short-term gains are prioritised over long-term costs.[33] When one accounts for these four additional factors, it becomes apparent that producing a clear and effective response – or solution – to the problem of climate change is exceptionally challenging for governments. Evidence of this can be found in the trouble governments experience when attempting to abide by their climate change commitments in regards to agreements such as the Kyoto Protocol or the more contemporary Paris Agreement. The fourth factor, irrational discounting, is particularly troublesome. This process occurs because the causes of climate change are very diffuse and its impacts only measurable on the long term, whilst the costs of climate action directly impacts the electorate.[34]

2.5. The Judiciary and Environmental Security

The transnational nature of climate change has always required a law based approach. Since the 1990s, international treaties governing the responsibilities of individual states have been the cornerstone of the international community's response to threat of climate change. On the national level, however, climate change litigation has had little presence in climate change policy until very recently. In 2015, a Columbia Law School White Paper found that climate change litigation outside

[32] Kelly Levin, Benjamin Cashore, Steven Bernstein, and Graeme Auld, "Overcoming the tragedy of super wicked problems: constraining our future selves to ameliorate global climate change," *Policy sciences* 45, no. 2 (2012): 124. Richard J. Lazarus, "Super wicked problems and climate change: Restraining the present to liberate the future," *Cornell Law Review* 94 (2008): 1159-1160.
[33] Kelly Levin, Benjamin Cashore, Steven Bernstein, and Graeme Auld, "Overcoming the tragedy of super wicked problems: constraining our future selves to ameliorate global climate change," *Policy sciences* 45, no. 2 (2012): 124.
[34] Ibid.

of the US was rarely used as a tool to drive climate change policies.[35] Moreover, they found that "in fact, most jurisdictions have little or no climate change litigation at all."[36] Currently, Europe alone has seen over 150 climate change cases in national as well as EU jurisdictions.[37] This drastic increase in the number of climate change cases is indicative of the changing relevance of climate change litigation. Increasingly citizens, as well as NGOs, observe the courtroom as an important instrument to provide governments with the necessary clarity and incentives to create successful and serious climate change policies.

Legal questions have come to occupy the centre stage of environmental security.[38] The question of legal status was central to the negotiations on the Paris Agreement.[39] Scholars have shown significant attention to the outcomes of the *Urgenda* case in the Netherlands, in an attempt to understand the linkages between human rights and climate change.[40] Similar litigation is currently pending in before of various courts in Europe.[41] One might even speak of a recent 'judicial turn' in environmental security. Several academic studies have focussed on the topic of climate change litigation. However these studies provide legal analyses, outlining potential legal strategies or examining the impact of a particular case on a particular jurisdiction.[42] There is a critical gap in academic literature concerning the role of the judiciary as an important actor for providing environmental security. This paper will fill that gap by analysing the various legal approaches currently pursued in an attempt ensure sufficient efforts are undertaken to combat climate change.

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[35] Meredith Wilensky, "Climate change in the courts: an assessment of non-US climate litigation," *Sabin Centre for Climate Change Law* (2015): 9.
[36] Ibid.
[37] Elisa de Wit, Sonali Seneviratne, Huw Calford, "Climate change litigation update," *Norton Rose Fulbright Publications* (2020), https://www.nortonrosefulbright.com/en/knowledge/publications/7d58ae66/climate-change-litigation-update, accessed 02-05-2020.
[38] Jacqueline Peel and Hari Osofsky, "Climate change litigation," *WIREs Climate Change* (2020): 12.
[39] Daniel Bodansky, "The Legal Character of the Paris Agreement, *Review of European, Comparative & International Environmental Law* 25 no. 2 (2016): 142.
[40] Ingrid Leijten, "Human rights v. Insufficient climate action: The Urgenda case," *Netherlands Quarterly of Human Rights* 37, no. 2 (2019): 113-114.
[41] De Klimaatzaak, "Nederland Leert ons dat het Kán," *De Rechtzaak* (2020), https://www.klimaatzaak.eu/nl, accessed on 12-05-2020.
Friends of the Irish Environment CLG v. The Government of Ireland, IEHC 747 (2019): 5, 63, 76, 135.
[42] Jacqueline Peel and Hari Osofsky, "Climate change litigation," *WIREs Climate Change* (2020): 12.

3.Methodology

After introducing the topic of the study and outlining the theoretical framework, the current chapter will describe the study's methodology. This chapter is subdivided in two sections. The former section will outline theory, whilst the latter section will explore the method of this paper.

3.1. Theory

3.1.1. The constitutive approach

Despite its legal focus, this study is not a legal analysis per se. The interdisciplinary nature of the research question requires this study to operate on the nexus between the studies of law, security and (international) politics. The reason for this requirement is that one can only describe the role of the judiciary as an actor in environmental security by applying legal findings to the social realm in which definitions of security and politics are constructed.

Any well-written paper that concerns the social realm should make explicit the implicit assumption it holds concerning ontology and epistemology. Wendt's discussion of causal and constitutive theory provides an insightful starting point for such an endeavour. Wendt differentiates between theories based on premise of what they seek to explain. Firstly, he observes structural theories. These are theories occupied with uncovering causal relationships. Causal explanations concern situations that fulfil three prerequisites: 1) variables X and Y are independent; 2) X precedes Y in time; and 3) Y occurred by virtue of X.[43] As such theories are centred around the central principle of uncovering causal relationships, these theories ask questions of 'how' and 'why'.[44] Juxtaposed to structural theories, constitutive theories seek to "account for the properties of things by reference to the structures in virtue of which they exist."[45] Thereby, they violate the basic premises of causal explanations, as the variables lack independent existence and temporal

[43] Alexander Wendt, "On constitution and causation in international relations," *Review of international studies* 24, no. 5 (1998): 105.
[44] Ibid.
[45] Ibid.

asymmetry.[46] This study focusses on describing the function and role of the judiciary in a particular development – i.e. providing security in light of anthropogenic climate change. This renders it unfeasible to strictly observe Wendt's conditions for causal explanations. This paper will seek to understand the role of the judiciary by virtue of the meaning they provide to climate change policy. The nature of the research is therefore of a descriptive rather than causal nature. Hence, this study will follow a constitutive approach.

3.1.2. Constructivist Theory

Constitutive research corresponds largely with constructivist theory. Constructivism occupies the middle ground between rationalist and interpretivist theory.[47] Adler specifies that rationalist theories, albeit to different degrees, focus on what Wendt defines as causal explanations. They focus on matters in the material world, which can be observed objectively, in an attempt to capture their causal mechanisms in generalisable laws.[48] Interpretivist theories as for instance post-structuralism, on the other hand, observe the world as a hyper-subjective place. According to them the world we observe is constituted exclusively by our intersubjective understanding. Consequently, the interpretivist camp would argue that ideas are the only legitimate object of study in the social realm.[49] Constructivism occupies the middle ground between these camps, it studies: "the manner in which the material world shapes and is shaped by human action and interaction depends on dynamic normative and epistemic interpretations of the world."[50] Thus, constructivist theory would argue, observations from the material world obtain their meaning in the social world by virtue of the intersubjective understanding of their implications. This specifically relates to the objective of this study, as its goal is not so much to analyse particular judgements, but more their impact on the social reality of (international) security efforts to halt human induced climate change.

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[46] Alexander Wendt, "On constitution and causation in international relations," *Review of international studies* 24, no. 5 (1998): 106.
[47] Emanuel Adler, "Seizing the Middle Ground: Constructivism in World Politics," *European Journal of International Relations* 3, no. 3 (1997): 321-322.
[48] Ibid.
[49] Ibid. 326.
[50] Ibid. 322.

3.1.3. Ontology and Epistemology

Satisfying the aforementioned requirement of studies interacting with the social realm, this paper should elaborate upon ontological and epistemological assumptions. Constructivist approaches are ontologically based upon relativism.[51] This particular ontology assumes realities to be dependent on social and contextual factors for their subsequent construction.[52] Guba and Lincoln elaborate upon this, noting that one cannot differentiate these realities based on a degree of truthfulness, but ought to be understood in degrees of sophistication and the degree to which they are well-informed.[53] In terms of epistemology, constructivism is often, but not always, based on subjectivism. This paper will employ subjectivism as its epistemology as well. Subjectivism instructs authors to be aware and sensitive of their inherent personal biases. As knowledge is constructed by the author, personal biases are likely to be reflected in the author's findings.[54] This study has attempted to mitigate this dynamic by ensuring to include cases with a positive outcome for the environmental movement as well as cases with a negative outcome. Additionally, this paper actively included academic literature sceptical of the impact of climate change litigation, with the aim to limit the influence of the author's personal biases on the outcomes of the study.

3.2. Method

After outlining its theoretical assumptions, this paper will continue by elaborating upon its method. Particularly, it will outline the sub-questions, case selection, intended sources, and the limitations of the study.

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[51] Emanuel Adler, "Seizing the Middle Ground: Constructivism in World Politics," *European Journal of International Relations* 3, no. 3 (1997): 321-322.
Egon G. Guba and Yvonna S. Lincoln, "Competing paradigms in qualitative research," *Handbook of qualitative research* 2, no. 163 (1994): 109.
[52] Ibid.
[53] Ibid.
[54] Ibid. 110.

3.2.1. Structure and sub-questions

Structure-wise this paper has formulated three sub-questions which serve as the foundation for the three following chapters. These questions each interact with a specific part of the overarching research question. The sub-questions formulated for this study are:

1) Do governments take sufficient mitigating action with regards to climate change?
2) How do judicial systems in liberal democratic states respond to government inaction in the field of climate change?
3) How can we understand the role of the judiciary in a broader theory on climate change and Securitization?

These questions will be answered in separate chapters of this paper. Having covered these three different sub-questions, the study will incorporate the knowledge acquired in the separate chapters into an analysis chapter. The aim of this chapter will be to reflect on the similarities and differences in respect to the role of the judiciary in providing environmental security.

3.2.2. Sources

This study will draw upon both primary and secondary sources. The primary sources are transcripts and verdicts of environmental cases before national courts – to get an understanding of the extent to which courts interact with climate policy and the what legal reasoning is based upon. Additionally, it will also draw upon (inter)national agreements on the combatting and management of climate change as a means of contrasting current policy with the original commitments made by governments. This will be supplemented by the use of secondary sources – predominantly academic literature – which will allow this paper to place its understanding of the primary sources into a wider context, both drawing upon and contrasting it with contemporary academic understandings.

3.2.3. Case Selection

With regards to case selection, the paper has chosen to focus on liberal democratic states. The reason for this focus is that in these countries particularly both the rule of law and the separation of powers are most strongly established. This means that the judiciary in these countries is most free from political influence in its daily operation. Concerning the particular case selection in the fifth chapter – on national litigation – this paper has chosen to inquire into four different cases. These cases are 1) *Urgenda v. the State of The Netherlands;* 2) *R v. The Secretary for Transportation (UK),*;3) *Thomson v. The Minister for Climate Change Issues (New Zealand);* and 4*) Juliana v. The United States.* This case selection guarantees a representation of different legal systems – civil law vs. common law and monist vs. dualist systems – and different means by which climate change policy has been challenged – human rights law, international law, and constitutional law. Moreover, it includes cases from the three different regions most represented in the field of climate change litigation.[55] This results in a balanced case selection in terms of judicial systems and legal fields, in order to make generalised claims about the judiciary in liberal democratic states. Additionally, to prevent a selection bias influencing the results of this paper it has included both cases in which the outcome was positive and negative for the climate change groups. The case selection was influenced by the linguistic boundaries of the author. As proper understanding of linguistic nuance is crucial in fully grasp the meaning of court cases, this study has explored cases available in either Dutch or English.

3.2.4. Limitations

There are two limitations to the current study. The first limitation is that although there a lot of interesting and relevant climate change cases in liberal democratic states around the world, not all of which are available in English or Dutch. Possible relevant information concerning cases not available in English or Dutch thus has to come from secondary sources, limiting the potential depth of the study. Additionally, the process of holding governments accountable for failing to adhere to

[55] Elisa de Wit, Sonali Seneviratne, Huw Calford, "Climate change litigation update," *Norton Rose Fulbright Publications* (2020), https://www.nortonrosefulbright.com/en/knowledge/publications/7d58ae66/climate-change-litigation-update, accessed on 02-05-2020.

their climate change commitments is a relatively recent one. As a consequence, a significant number of relevant cases remain ongoing. Inferring the outcome of these cases could have impacted the study as any analysis would be mere speculation. At this point in time it is too early to take these cases into account. Follow-up studies may provide extra nuance to the findings of this study as a result of the outcomes of cases currently still before the courts.

4. Securitization of Climate Change

Before delving into any inquiry of legal efforts to provide climate security, the paper will first explore the relationship between securitization and climate change. This chapter will specifically outline why securitization of climate change has, thus far, failed to result in a security-driven response by governments. In three sections this chapter will outline 1) the growing awareness of human-induced climate change over time; 2) how this process resulted in the securitization of climate change; and 3) why, in spite of knowledge and urgency, governments fail to take the necessary measures with a diligence one would normally attribute to security topics.

4.1. The Advent of Environmental Politics

An awareness of the possibility that humanity could be responsible for changes in climate patterns originated in the 1970s.[56] Disregard for the environment as well as the worsening climatic conditions on Earth sparked the concern of academics and social movements alike.[57] Although this movement was initially more focussed on more local forms of pollution – e.g. polluted rivers, depleted lakes, and deforestation – it marked the naissance of the environmental movement and the environment as a political subject.[58] Climate change progressively became more at the forefront of environmental topics.

As early as the 1980s, large energy corporations such as Exxon and Royal Dutch Shell conducted internal studies to the environmental impact of burning fossil fuels.[59] A large study undertaken by Exxon displayed the causal relationship between CO_2 emissions and the average global temperature.[60] This study modelled the increase of atmospheric CO_2, in parts per million (PPM), over time. It linked the forecasted increase of $C0_2$ PPM in the atmosphere directly to the

[56] Christopher Rootes "Environmental movements" in David A. Snow, Sarah A. Soule, and Hanspeter Kriesi *The Blackwell Encyclopedia of Sociology* (Blackwell Publishing: Oxford, 2007): 608.
[57]Liliana Andonova and Ronald B. Mitchell, "The rescaling of global environmental politics," *Annual Review of Environment and Resources 35* (2010): 259.
[58] Ibid.
[59] Benjamin Frenta, "Shell and Exxon's secret 1980s climate change warnings," *The Guardian* (2018) https://www.theguardian.com/environment/climate-consensus-97-per-cent/2018/sep/19/shell-and-exxons-secret-1980s-climate-change-warnings, accessed 20-04-2020.
[60] Ibid.

average global temperature and predicted an increase in the average global temperature ranging from 2.8 to 3.2 degrees Celsius by the end of the twenty-first century.[61] The leadership of Exxon at the time was aware that such a warming climate could potentially have adverse impacts on global wellbeing and advised the aforementioned report to be spread widely throughout the company's top management in the hope that it would serve as "a basis for discussion."[62] In 1988, Shell came to similar conclusions.[63] It found a relationship between elevated CO_2 levels, as the result of the burning of fossil fuels, and the average global temperature.[64] It forecasted the effect to be even more significant than the expectations of the Exxon study.

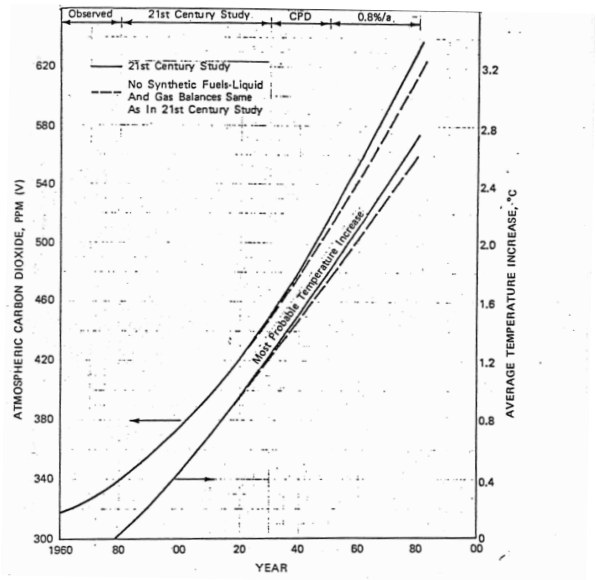

Figure 2: *Predicted increase of atmospheric CO_2 (PPM) and average global temperature over time* (Exxon)[65]

The Shell report also outlined the urgent need for measures to protect the climate before climate change becomes 'detectable', as it might at that point already be too late.[66] In spite of the awareness, action – political or corporate – was still lacking. Additionally, even though the report highlights

[61] M.B. Glaser, "CO_2 "Greenhouse Effect"," *Exxon Environmental Affairs Programs* (1982). 7.
[62] Ibid. 1.
[63] R. P. M. W. Jacobs et al., "The Greenhouse Effect," *Shell Environmental Conservation Committee* (1988).
[64] Ibid. 1.
[65] M.B. Glaser, "CO_2 "Greenhouse Effect"," *Exxon Environmental Affairs Programs* (1982): 7.
[66] R. P. M. W. Jacobs et al., "The Greenhouse Effect," *Shell Environmental Conservation Committee* (1988): 1.

that some models might be uncertain and future research will be needed, Shell outlines the need for stringent measures:

> "With very long time scales involved, it would be tempting for society to wait until then to begin doing anything. The potential implications for the world are, however, so large, that policy options need to be considered much earlier. And the energy industry needs to consider how it should play its part."[67]

The growing awareness of the climate change put the topic on the international political agenda in the late 1980's and 1990s. In 1988 the Intergovernmental Panel on Climate Change (IPCC) was established which produces assessment reports to provide objective academic insight into climate change to contribute to the efforts of states under the United Nations Framework Convention on Climate Change (UNFCCC), which was signed in 1992. This framework is the foundation for international cooperation on climate change and the basis for later international agreements such as the Kyoto Protocol, signed in 1997. The UNFCCC included the political promise of the planet's developed countries – the so-called annex-1 countries – to lead the planet's decarbonisation effort.[68]

In the twenty-first century scientific evidence for human induced climate change became stronger and the effects of this change became increasingly apparent. Consequently, public awareness of the climate change grew. Before the conclusion of the Paris Climate Agreement – the successor agreement to the Kyoto Protocol under the UNFCCC – over 75% of the population of OECD countries was aware of human induced climate change. Additionally, in these countries more than 70% of the 'aware' population considered climate change a 'serious threat'.[69] The support for environmental measures increased from a marginal faction to being common ground

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[67] R. P. M. W. Jacobs et al., "The Greenhouse Effect," *Shell Environmental Conservation Committee* (1988): 16.
[68] "United Nations Framework Convention on Climate Change," Opened for signature 03-06-1992, *United Nations Treaty Series* no. 1771, https://treaties.un.org/doc/Treaties/1994/03/19940321%2004-56%20AM/Ch_XXVII_07p.pdf: art. 2.
[69] Tien Ming Lee et al., "Predictors of public climate change awareness and risk perception around the world," *Nature climate change* 5, no. 11 (2015): 1016.

in the electorate of most developed countries.[70] This also led to a rise in environmental politics in advanced economies. Many countries, particularly in Europe, have in recent years seen a 'green wave'.[71] This term is a reference to the establishment and rise in popularity of political parties whose primary focus is on environmental issues. Simultaneously, public awareness of climate change and urgency for change culminated in a series of mass protests, mobilising millions of people around the world, inspired by the school strikes of the Swedish Greta Thunberg – who was nominated twice for a Nobel Peace Prize for her awareness-raising efforts.[72]

In summary, since the 1970s increasing evidence of human induced climate change has resulted in awareness of climate change issues to evolve from being an important issue for small segments of the population, to becoming the leitmotiv of influential socio-political movements – its concerns shared by the majority of the population of OECD countries.[73]

4.2. Securitization of the environment

Observing the increasing attention and political awareness surrounding the topic of climate change as a security threat, this paper will now inquire whether a degree of securitization occurred. As elaborated upon in the theory section of this study, securitization occurs when discourse lifts a particular phenomenon out of the political sphere and into the security realm. In order to foster an understanding of the securitization of climate change, this paper will thus have to analyse the discourse. When examining the discourse, various matters can be inquired into.[74] Public discourse occurs through various (social) media – various social media, newspapers, and talk shows are important forums of meaning making and intersubjective understanding. Additionally, one can look to official discourse, as acknowledgement of the security status of a phenomenon from

[70] Zack Grant and James Tilley, "Fertile soil: explaining variation in the success of Green parties," *West European Politics* 42, no. 3 (2019): 495-496.
[71] Ibid.
[72] Matthew Taylor, Jonathan Watts, and John Bartlett, "Climate crisis: 6 million people join latest wave of global protests," The Guardian (2019), https://www.theguardian.com/environment/2019/sep/27/climate-crisis-6-million-people-join-latest-wave-of-worldwide-protests, accessed on 21-05-2020.
[73] Tien Ming Lee et al., "Predictors of public climate change awareness and risk perception around the world," *Nature climate change* 5, no. 11 (2015): 1016.
[74] Karin Fierke, "Links across the abyss: Language and logic in international relations," *International Studies Quarterly* 46, no. 3 (2002): 340.

governmental actors in their public communication, strategies, and other documents can signal successful securitization.[75]

When looking into public discourse, a study by Schäfer, Scheffran, and Penniket provides an illuminating entry. In this study 101,000 newspaper articles from nine countries, published between 1996 and 2010, were analysed.[76] The authors of the study specifically analysed the presence of securitizing discourse and analysed this as a function of 1) the total amount of climate change related articles, and 2) the total number of newspaper articles.[77] The authors found an increasing trend of securitization in public discourse, especially strong in the OECD part of that study – US, UK, Canada, Australia, and New Zealand.[78] The authors concluded that a securitization of climate change is visible in mass media and that the threat of climate change to national security is particularly pronounced in 'western' countries.[79]

The securitization of climate change, however, is not exclusively to product of bottom-up securitization through mass media. Rather, it is a process that has largely been driven through speech acts of political leaders.[80] Signals of successful securitization of the topic are the common pledges to reduce global emission of greenhouse gasses since the 1990s. More notably, the decision to discuss the issue of climate change in the United Nations Security Council (UNSC) in 2007 was a strong indication that in international policy circles, the issue of climate change has increasingly been understood as a security issue.[81] The understanding of climate change as a security issue as such, has been the culmination of securitizing speech acts throughout the first decade of the twenty-first century: "Throughout the 2000s, a shift in the framing of climate change among

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[75] Karin Fierke, "Links across the abyss: Language and logic in international relations," *International Studies Quarterly* 46, no. 3 (2002): 340.
[76] Mike Schäfer, Jürgen Scheffran, and Logan Penniket, "Securitization of media reporting on climate change? A cross-national analysis in nine countries," *Security Dialogue* 47, no. 1 (2016): 87.
[77] Ibid.
[78] Ibid.
[79] Ibid. 91.
[80] Katie Peters and Leigh Mayhew, "The Securitization of Climate Change: A Developmental Perspective," In Stephen Brown and Jörn Grävingholt (*eds.*)*The Securitization of Foreign Aid* (London: Palgrave Macmillan, 2016): 212.
[81] United Nations, "Security Council Holds First-Ever Debate on Impact of Climate Change on Peace and Security," *United Nations Security Council Press Release* SC9000 (2007).

policymakers and think tanks (and practitioners, to a lesser extent) can be observed. A security narrative was applied to an issue previously confined to the environmental and/or developmental realm."[82] The EU played a significant part in the international securitization of climate change.[83] Through various speech acts it outlined the threat of changes to the global climate, mentioning 'climate change' twelve times in the 2016 EU Global Strategy. Moreover, countries such as France, the Netherlands, the United Kingdom, and Japan all mention climate change in their national security documents.[84] It has even been argued that the perceived security risk of climate change has served as a catalyst of European cooperation to European Union member states and that climate change is the central tenet of the union's security policy.[85] Even NATO, the world's strongest military alliance started treating climate change as a topic of security.[86]

It is thus clear that climate change has captured the forefront of security thinking in OECD countries. Discourse on climate change, both in mass media as well as by political actors suggests strong securitization of the topic.

4.3. Government Inaction

The previous section has established that both in public and policy discourse, the topic of climate change has become securitized. The final section of this chapter will engage with two matters. Firstly, it will demonstrate that despite careful securitization of climate change, insufficient action has been undertaken by governments. The second part of this section will engage with that matter and demonstrate why, in spite of its apparent securitization, decisive action by the executive and appears to be lacking.

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[82] Katie Peters and Leigh Mayhew, "The Securitization of Climate Change: A Developmental Perspective," In Stephen Brown and Jörn Grävingholt (*eds.*)*The Securitization of Foreign Aid* (London: Palgrave Macmillan, 2016): 215-216.
[83] Claire Dupont, "The EU's collective securitisation of climate change," *West European Politics* 42, no. 2 (2019): 385-386.
[84] France, Revue *Stratégique de Défense et de Sécurité Nationale* (2017): 31-32.
Ministerie van Buitenlandse Zaken, *Notitie Geïntegreede Veiligheids- en Buitenland Strategy* (2018): 15.
Japan, *National Security Strategy* (2013): 10-11.
Ministry of Defence, "the Future Starts Today," *Global Strategic Trends* 6 (2018): 14.
[85] Claire Dupont, "The EU's collective securitisation of climate change," *West European Politics* 42, no. 2 (2019): 385-386.
[86] Alexander Verbeek, "Planetary Security: the security implications of climate change," *NATO Review* (2019).

Despite global awareness of the impact of CO_2 emissions on climate change being around since at least the 1990s, countries around the world have failed to effectively decarbonise their economies. A study conducted by the International Energy Agency (IEA) shows that since 1990 energy-related CO_2 emissions have increased by almost a third.[87] 'Advanced economies', arguably the most capable of changing their economies, have not been able to reduce their overall energy related CO_2 emissions.[88] Furthermore, the presence of greenhouse gasses in the atmosphere (in CO_2-equivalent PPM) has continually increased.[89] Currently, the presence of atmospheric CO_2 averages at approximately 410 PPM, with - since 2010 - an average increase of 2 PPM per annum.[90] This is the highest average increase seen since the start of measurements. Extrapolating this increase, it becomes apparent that without drastic cuts in GHG emissions, the planet could transgress 450 PPM line – which is universally considered the threshold for keeping global warming underneath a 2 degrees Celsius increase in average temperature – as early as 2040.

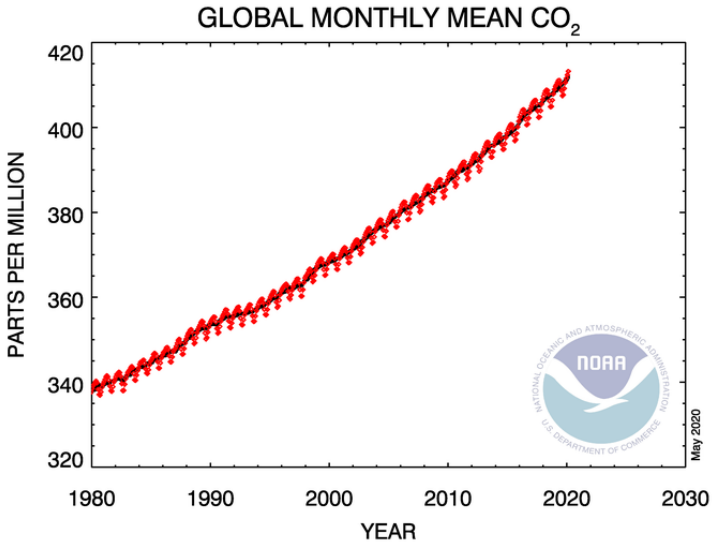

Figure 4: Global Monthly Means in Atmospheric CO_2 Concentration (in PPM)[91]

[87] International Energy Agency, "Global CO_2 Emissions in 2019," *Global Emission Trends* (2020), https://www.iea.org/articles/global-co2-emissions-in-2019, accessed on 25-04-2020.
[88] Global Monitoring Laboratory, "Trends in Atmospheric Carbon Dioxide," *National Oceanic and Atmospheric Administration,* https://www.esrl.noaa.gov/gmd/ccgg/trends/global.html, accessed 16-04-2020.
[89] Ibid.
[90] Ibid.
[91] Ibid.

This is even more worrisome when taking into account the fact that the current academic consensus is that a 1.5C boundary might be required to sufficiently reduce the pace of global warming to prevent reaching planetary 'tipping points'.[92] This is not to argue that countries do no take mitigating measures. Countries, specifically G20 economies, have been able to increase the share of renewable energy in their energy mix and globally the increase in CO_2 emissions per annum has been slowing, indicating that the peak in global emissions may soon be reached.[93] In spite of these promising trends, the fact of the matter is that global emissions are still on the rise, advanced economies have great difficulty decarbonising their economies, and the increase of atmospheric CO_2 PPM is at its highest level ever. This all is occurring close to thirty years after the international community acknowledged the danger of human induced climate change and fifteen years after climate change started to be understood as a security topic. It thus seems safe to conclude that (inter)national climate change mitigation strategies are not adequate for the challenge they are designed to face.

This brings this paper to the second issue of this section; *why* do governments take insufficient action to mitigate climate change? Even though the issue of climate change enjoys the status of a security problem and has been an important subject of international cooperation and diplomatic engagements in recent years, governments appear to be unable to introduce far reaching measures combatting climate change.[94] Various features, inherent to climate change, are at the root cause of this problem. Firstly, climate change is a transnational problem. It is caused by countries around the globe and its effects threaten every country. This creates opportunities for free-riding behaviour.[95] Decarbonising the economy is a costly endeavour in the short run, even though the impact smaller countries can potentially make is rather small on the global scale – resulting in

[92] Ove Hoegh-Guldberg et al., "Impacts of 1.5°C of Global Warming on Natural and Human Systems," *IPCC Special Report Global Warming of 1.5 °C* (2018): 183.
[93] Hsiao-Tien Pao and Chun-Chih Chen, "Decoupling strategies: CO_2 emissions, energy resources, and economic growth in the Group of Twenty," *Journal of Cleaner Production* 206 (2019): 913.
[94] Kelly Leving, Benjamin Cashore, Steven Bernstein, and Graeme Auld, "Overcoming the tragedy of super wicked problems: constraining our future selves to ameliorate global climate change," *Policy sciences* 45, no. 2 (2012): 127.
[95] Shahzad Ansari, Frank Wijen, and Barbara Gray, "Constructing a climate change logic: An institutional perspective on the "tragedy of the commons"," *Organization Science* 24, no. 4 (2013): 1014.

irrational discounting. Additionally, the effects of climate change only become apparent on the long term, when the environment hits so-called 'tipping points' – situations in which the carrying capacity of an ecosystem is overburdened to the extent that it can no longer support its previous function.[96] Furthermore, various effects of climate change such as forest fires, droughts, failed harvests, and insect plagues are only indirectly attributed to climate change, thereby obscuring the lethality and severity of the issue.[97] This creates the false assumption that the situation is less dire than the science shows it to be. To summarise these facts, the climate change issue is characterised by high complexity, uncertainty, and divergence, satisfying the criteria for a wicked problem. We can compare this to a securitized issue without these characteristics, such as the recent outbreak of the COVID-19 virus. During the outbreak of COVID-19, governments found it easy to attempt to resolve the securitized matter by drawing upon extraordinary measures. This was possible, as that situation did not satisfy the criteria of wicked problems. Governments understood the threat quickly and were incentivised to take early action to prevent the outbreak from worsening.

The failure of governments to take adequate action against climate change can thus be explained by understanding the security issue as a wicked problem. It is both difficult for governments to adequately appreciate the danger of climate change and it is economically incentivised – on the short term at least – to wait for other countries to take far reaching measures.

[96] Ove Hoegh-Guldberg et al., "Impacts of 1.5°C of Global Warming on Natural and Human Systems," *IPCC Special Report Global Warming of 1.5 °C* (2018): 183.
[97] Marc Davidson, "Wrongful harm to future generations: the case of climate change," *Environmental values* (2008): 476.

5. National Climate Change Litigation

This chapter will be dedicated to analysing national legal action regarding climate change. The first case study will illustrate the role of human rights law in environmental disputes. The London Heathrow case, featuring as our second outlines the potential strength of international treaties in holding governments to account. The third case study will examine the authority of courts to review government climate change targets. Lastly, the case study focussing on the United States, serves as an example of courts attempting to safeguard environmental security by drawing upon constitutional rights.

5.1. Urgenda v. The State of The Netherlands

5.1.1. Background

In late 2012 the Dutch foundation *Urgenda* sent a letter to inquire into the state of climate change policy by the government of the Netherlands. In its reply to this letter, the Dutch government argued that mitigating climate change by limiting the emission of GHG's, is inherently an international endeavour and cautioned for the effects of leading this endeavour. This would namely result in a 'leaking' effect, in which industries would move to countries with less rigid climate change regimes in place. However, at the time of writing, the Netherlands had the second lowest percentage of renewables included in its energy mix of all EU member states – averaging 6%, just before Luxembourg averaging 5%.[98] In the remainder of its response the government admitted that the: "collective, global effort at this moment is still insufficient to remain on track of an average global temperature increase of maximum 2 degrees [Celsius]."[99]

In spite of the apparent awareness of the urgency, The Netherlands was not living up to its own commitments. In the 1992 UN Climate Change Agreement, The Netherlands had been included as an 'Annex I state'. This category includes the world's wealthiest states, often relying on

[98] Stichting Urgenda, "Aanloop 2012-2013," *Rechtzaak tegen de Staat* (2020), https://www.urgenda.nl/themas/klimaat-en-energie/klimaatzaak/, accessed on 23-05-2020.
[99] Wilma Mansveld, "Reactie op uw Brief," *Ministerie van Infrastructuur en Waterstaat*. https://www.urgenda.nl/wp-content/uploads/BriefReactievandeStaatlp-i-m-0000002872.pdf. [translated to English].

heavily 'carbonised' economies. As per the treaty, Annex I states have a special responsibility to lead the effort against human induced climate change. In 2007 the IPCC decided that Annex I countries ought to reduce their CO_2 emissions by 25-40% by 2020 and 80-95% by 2050 compared to 1990 levels, in order to ensure the average global temperature rise remains below the 2 degrees Celsius limit.[100] The EU has argued multiple times that a reduction of at least 30% by 2020 would be necessary to obtain this goal.[101] Until 2011 the aim of the Dutch government was to ensure a national reduction of 30% by 2020.[102] However, after 2011 the government reduced its level of ambition to a 20% reduction in CO_2 emissions on an EU level.[103] As this lower level of reduction bears the risk of the planet reaching so-called environmental tipping point, risking irreversible damage to the environment, Urgenda opened proceedings against the State of The Netherlands in 2015.[104]

5.1.2. The Case

The case Urgenda brought before the district court of The Hague went to the Court of Appeal and even the Hoge Raad. All three courts ordered the Government of the Netherlands to reduce its CO_2 emissions with 25% compared to 1990 levels – rather than the 20% reduction pursued by the government.[105] The legal reasoning of Urgenda was based upon the European Convention on Human Rights (ECHR), which holds domestic legal value in the Dutch legal order. Urgenda argued that, following article 2 ECHR, a positive obligation rests on the government to protect the life of those within its legal authority.[106] Additionally, article 8 ECHR creates the obligation of the state to protect the right to home and family life.[107] From these articles logically follows that the government ought to take measures to reduce as much as possible 'real and imminent' risks that it

[100] Benoit Mayer, "The State of the Netherlands v. Urgenda Foundation: Ruling of the Court of Appeal of The Hague (9 October 2018)," *Transnational Environmental Law* 8, no. 1 (2019): 169-171.
[101] Ibid.
[102] Ibid.
[103] Ibid.
[104] Ibid.
[105] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019): 9.
[106] Ibid. 5.2.2.
[107] Ibid. 5.2.3.

is aware of.[108] Moreover, aligning this with article 13 ECHR, the government has the responsibility to safeguard the rights granted by the ECHR in national law. In the Urgenda case this was linked to the government's response to climate change, arguing that this bestowed upon the government the duty to do 'its part' in the international effort to limit human induced climate change.

The Supreme Court undertook an extensive review of current climate science. Drawing upon reports of the IPCC as well as other sources of climate science, the court established that it is imperative for the world to ensure that global average temperature does not increase more than 2 degrees Celsius above preindustrial levels.[109] Moreover, the court noted that even the 2 degree limit might be too high a threshold and mentioned that the academic consensus is that a 1.5 degree threshold might be required to ensure not to overstep the planet's environmental tipping points.[110] In 2007, the IPCC established that, in order to stay on track to achieve a global warming of less than 2 degrees, it is necessary that annex I countries reduce their CO_2 emissions by 25-40% in 2020. This has since been affirmed in the Conferences of State Parties (COPs) of the UNFCCC, in Bali, Cancun, Durban, Doha, and Warsaw.[111] As stated in the previous sub-section, the Dutch government lowered its ambition level in 2011 from a 30% to a 20% reduction. This was done, even though the government stated in a letter from 2009, that it was not convinced a two degree limit could be obtained in a situation where governments would aim for a reduction lower than the prescribed 25-40%.[112] Observing the environmental science behind climate change, the commitments of the government on the international level, and the government's own assessments over time, the court found the government put the inhabitants of the territory of the Dutch state at risk by not limiting its emissions by 25% in 2020.[113] Moreover, it ruled that the government was aware of the fact that it was doing so. Hence, the Hoge Raad concurred with the Court of Appeal

[108] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019): 5.3.2.
[109] Ibid. 7.2.1.
[110] Ibid. 4.4.
[111] Ibid. 2.2(20).
[112] Wilma Mansveld, "Reactie op uw Brief," *Ministerie van Infrastructuur en Waterstaat*, https://www.urgenda.nl/wp-content/uploads/BriefReactievandeStaatlp-i-m-0000002872.pdf [translated to English]
[113] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019): 9.

that the government's aim for a 20% reduction, rather than the necessary 25% minimum reduction violated articles 2 and 8 of the ECHR.[114] Hence, the government would be required to ensure a 25% reduction of CO_2 emissions by the end of 2020.

The Government of the Netherlands defended its decision not to reduce CO_2 levels by 25% based on various arguments. Firstly, it argued that extra measures might not result in tangible results, because it would create a 'waterbed-effect' on the European scale. Extra reductions by The Netherlands, would give other countries more space in the overall EU 'CO_2 budget'.[115] In other words, as the EU has a common reduction goal, further reductions by one state would incentivise other states to do less. The court, however, did not concur with this argumentation. It found that all states have their own national responsibility to cut their own CO_2 emissions. Moreover, it found the argument of government inaccurate as it currently does less – rather than more – than 26 out of 28 member states of the EU.[116] It could, therefore, not be understood to contribute to such a waterbed-effect. Secondly, the government argued that 'carbon leakage' would occur when it would step up its climate change commitments. Carbon leakage is a term meant to describe a situation in which companies move (parts of) their production process to countries with less stringent GHG reduction measures in place.[117] However, the government failed to prove that this would actually be the case when it would increase its 2020 commitments. Thirdly, the government argued that Dutch GHG emissions are rather small in an absolute sense, when compared to the total of global emissions. The government of The Netherlands could, therefore, not be expected to solve to problem and is dependent on a cooperation of the international community to counter human induced climate change.[118] The court, however, reasoned that even though the argument of the government might be truthful, it does not absolve the government of its responsibility to take

[114] Ingrid Leijten, "Human rights v. Insufficient climate action: The Urgenda case," *Netherlands Quarterly of Human Rights* 37, no. 2 (2019): 112-113.
[115] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019): 5.7.8.
[116] Ibid. 7.3.3 & 7.3.4.
[117] Ibid. 2.3.2.
[118] Ibid.

measures in its own territory to limit climate change as much as possible.[119] Lastly, the government argued that interference of the judiciary with its climate policy would be an offence to the system of the separation of powers.[120] Making policy is the prerogative of the executive and legislative branches, and not of the judiciary. However, the court rejected this argument, because the government was found to be in violation of human rights.[121] Consequently, measures to remedy this situation are required. Moreover, the court argued it was not giving the government an 'order to legislate', because it left complete freedom to the state on the matter of how to obtain a 25% reduction in CO_2 emissions.[122]

5.2. R. v. The Secretary of State for Transportation (UK)

5.2.1. Background

The function of the United Kingdom as a logistical hub is important to the United Kingdom's economic strategy. Centrefold to the strategy is the position of London as a hub for international long-haul aviation. In order to sustain this position, in face of competition by Paris, Frankfurt, and Amsterdam, the British government inquired into possibilities to increase the number of long-haul flights. Of the various possibilities considered, the construction of a third runway at London Heathrow Airport appeared most feasible in economic terms. The addition of the extra runway at the airport was forecasted by its advocates, to increase the number of flight movements at the airport from 473,000 to 740,000 and increase the number of passengers travelling via the airport from 80,000,000 to 130,000,000.[123] As 70% of the flights at London Heathrow are 'long-haul flights' – more than 4,100 KM – the environmental impact of such an increase would in all likelihood be significant, even on the grand total of UK GHG emissions.[124] This is especially

[119] *State of the Netherlands v. Urgenda Foundation,* NL HR 19/00135 (2019): 2.3.2.
[120] Ibid. 2.2.3.
[121] Ibid. 8.2.5.
[122] Ibid.
[123] Heathrow Expansion, *Bernefits for the UK,* https://www.heathrowexpansion.com/uk-growth-opportunities/facts-and-figures/, accessed 15-05-2020.
[124] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020): 2.

noteworthy because aviation is one of the few sectors in which a shift to renewable or sustainable energy sources is not considered to be technologically possible on the short- and medium term.[125]

Simultaneously, the Government of the United Kingdom subscribed to various international climate change agreements, culminating in the signing of the 2015 Paris Agreement under the UNFCCC.[126] In this agreement, the UK agreed to the common endeavour to not let global warming exceed 2 degrees Celsius, and strive to limit it to 1.5 degrees Celsius. Moreover, in 2009 the UK had already set ambitions for itself with regards to limiting its GHG emissions. These ambitions are supposed to result in a 90% reduction of GHG emissions in 2050.[127] Based upon the apparent rift between the UK's climate ambitions on the one side and the impact of a third runway at London Heathrow Airport on the other, *Friends of the Earth UK* decided to challenge the construction of the runway in court.

5.2.2. Case

Before inquiring into the details of this particular case, it is important to note that the British legal system differs from the Dutch system in the previous case study in two important respects. Firstly, with respect to international law the Netherlands upholds a monist system, whereas the UK has a dualist system. This means that upon ratification, treaties gain domestic legal value in the Netherlands, whereas in the UK ratified treaties have to be written into domestic legislation before they obtain legal value. Secondly, the Netherlands has a civil law system, whilst the UK's judiciary is rooted strongly in the common law system. In civil law systems codified law is the prime form of law. Contrastingly, the common law system gives significant legal value to 'parliamentary will' and legal precedents as well.

The expansion of London Heathrow with a third runway is arranged in the United Kingdom's Airports National Policy Statement (ANPS).[128] The court case was brought before the

[125] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020): 249.
[126] Ibid. 23.
[127] Ibid. 208.
[128] Secretary of State for Transportation, "New Runway Capacity and Infrastructure at Airports in the South East of England" *Airports National Policy Statement* (2018).

Court of Appeal (CoA) after a Divisional Court found the expansion of London Heathrow to be in accordance with the law. Both the Divisional Court and the CoA identified the following four issues to be of importance to the case: 1) Compliance with the 'Habitats Directive' (Council Directive 92/43/EEC); 2) compliance with the Strategic Environmental Assessment – 'SEA' – Directive (2001/42/EC); 3) compliance with the UK's climate change commitments; and 4) issues regarding relief.[129]

Specifically of interest to this study are issues two and three, as these issues relate to the UK's international climate change commitments. It was argued that the UK failed its commitment to the SEA Directive by failing to consider the Paris Agreement.[130] The 2008 Planning Act ensures the requirements of the SEA Directive.[131] It specifically outlines that when planning infrastructure projects, a national policy statement should include: "[A]n explanation of how the policy set out in the statement takes account of Government policy relating to the mitigation of, and adaptation to, climate change."[132] The Paris Agreement, the worlds primary document outlining the common goal to mitigate human-induced climate change, was signed by the UK on April 2016 and ratified in November of that year. Given the UK's dualist system, the Paris Agreement still does not hold legal value within the UK. However, the CoA inquired into statements made by government ministers, in policy documents as well as in front of parliament. Various statements "re-iterating Government policy of adherence to the Paris Agreement [were made] by relevant Ministers, for example the Rt. Hon. Andrea Leadsom MP and the Rt. Hon. Amber Rudd MP in March 2016."[133] The court concluded that the Paris Agreement had been part of 'government policy' in the meaning of the Planning Act, and since Parliament had considered it to be so, it follows that the executive should follow the will of parliament.[134]

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[129] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020): 10.
[130] Ibid. 12(5).
[131] William R. Sheate "Streamlining the SEA Process," in Gregory Jones QC, Eloise Scotford *eds. The Strategic Environmental Assessment Directive: A Plan for Success?* (Oxford: Hart Publishing, 2017: 188.
[132] United Kingdom, *Planning Act* (2008): art. 5(8).
[133] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020): 208.
[134] Ibid. 283.

Under issue three the CoA also delved into the content of the Paris Agreement and compared it with the current UK climate change policy. The CoA found that the British climate change policy is amongst the most stringent in the world and the addition of an extra runway at London Heathrow Airport would not necessarily compromise the UK's efforts in combatting climate change. The ambition of the Paris Agreement is to strive to limit global warming to 1.5C above preindustrial levels. Even with the UK's ambitious climate change targets it is unsure whether this remains a realistic goal.[135] Hence, the court concluded that it is not 'highly likely', as the UK government argued, that the goals in the Paris Agreement will be reached when the UK opts to constructs a third runway.[136] Thereby it dismissed the government's argument that it did not need to take the Paris Agreement into account because of the UK's rigorous national climate change measures.[137]

Taking the conclusions under issue two and three in conjunction the court concluded that the UK Government had to take the Paris Agreement 'into account' before deciding on potential expansion of London Heathrow Airport. Given that the government failed to do so, the CoA ordered to halt the construction of a third runway until the government had adequately taken the agreement into account. This case proves an interesting precedent as it displays how the Paris Agreement was so fundamental to UK policy, that the government could not be considered to have taken its climate change policy into account without consulting the agreement. This is more relevant given the fact that the Paris Agreement was not incorporated in domestic legislation. Analysing the verdict, legal scholars have lauded the importance of the judgement:

[135] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020): 208, 216.
[136] Ibid. 221.
[137] Ibid.

> "The ruling is among the first to halt a specific infrastructure plan because of a state's failure to consider its obligations under the Paris Agreement. And although the ruling leaves open the possibility that a properly-considered plan in the future could still permit a new runway, the court's decision suggests a role for the Paris Agreement in preventing fossil-fuel dependent infrastructure projects even where domestic legislation has not kept up."[138]

The CoA judgement was said to have global effect as it constitutes the first time that: "a court has confirmed that the Paris agreement temperature goal has binding effect."[139] Dr. Le Quéré, member of the UK Committee of Climate Change and chair of the French Committee on Climate Change considered the verdict as enshrining the government's climate change commitments in law.[140] The scope to which the outcome forbids any kind of expansion, however, is debatable as the CoA was explicit in the fact that the government was required only to take the Paris Agreement into account.[141] If it were to do so, the expansion might legally continue afterwards. Nevertheless, the court sent a clear signal that the UK's climate change commitments will need to feature as a prominent factor in current and future policy. The fact that the government in the UK ought to take into account its own commitments is an important similarity with the Urgenda case.[142] As such, the verdict "sets an important precedent and will undeniably make it harder for the government to shrug off environmental responsibilities."[143] This was also recognised by the UK government which stated that it will not appeal to the verdict, and will take its climate change commitments seriously.[144]

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[138] Daniel Metzger and Hillary Aidun, "Major Development in International Climate Litigation in Early 2020," *Columbia Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/12/major-developments-in-international-climate-litigation-in-early-2020/, accessed 30-04-2020.
[139] Margaretha Wewerinke-Singh *in* Damian Carrington, "Heathrow third runway ruled illegal over climate change," *The Guardian* (2020), https://www.theguardian.com/environment/2020/feb/27/heathrow-third-runway-ruled-illegal-over-climate-change, accessed 15-04-2020.
[140] "Expert Reaction to Heathrow 3rd Runway Being Ruled Illegal by the Court of Appeal," *Science Media Centre* (2020), https://www.sciencemediacentre.org/expert-reaction-to-heathrow-3rd-runway-being-ruled-illegal-by-the-court-of-appeal/, accessed on 12-05-2020.
Haute Conseil pour le Climat, https://www.hautconseilclimat.fr/en/about/, accessed 12-05-2020
[141] R. (Friends of the Earth) v. The Secretary of State for Transportation, EWCA CIV 213 (2020):
[142] Veerle Heyvaert, "Beware of populist narratives: the importance of getting the Heathrow ruling right," *British Policy and Politics at LSE* (2020): 2.
[143] Ibid.
[144] Tanya Powley, Jim Pickard and Kate Beioley, "Government will not appeal as court blocks third runway at Heathrow," *Financial Times* (2020), https://www.ft.com/content/b0f89152-594b-11ea-a528-dd0f971febbc, accessed on 12-05-2020.

5.3. Thomson v Minister for Climate Change Issues (New Zealand)

5.3.1. Background

Thomson v. The Minister for Climate Change Issues concerns to a case put before the High Court of New Zealand. This particular case was brought to court by Sarah Thomson, a New Zealand law student, and challenges that the responsible minister had failed to set appropriate goals concerning the reduction of GHG emissions as per the countries Climate Change Response Act (2002).[145] This act incorporates New Zealand's responsibilities under the UNFCCC. It requires the relevant minister to set targets for the reduction in emissions as well as consider their revision upon publication of relevant findings by the IPCC.[146] The target set by the minister in 2011 concerned the aim of a 50% reduction of GHG emissions by 2050 compared to 1990.[147] This target, however, was not reviewed when the IPCC published its Fifth Assessment Report. Additionally, parties to the Paris Agreement have to publish their Nationally Determined Contributions (NDCs). The New Zealand Government set a 'provisional target' of 30% reduction by 2030 compared to 2005 levels.[148] In real terms, this amounts approximately to a reduction of just 11% under 1990 levels.[149] Thomson claimed that the New Zealand Government did not do 'its part' under the Paris Agreement.[150] If all developed countries would aim for such reductions, then the international objective of stabilising atmospheric GHG concentrations and stop further human induced climate change would not be met. Consequently, this would likely keep the planet on course for anthropogenic climate change to reach level dangerous to biodiversity and human wellbeing.

[145] Giulio Corsi, "A bottom-up approach to climate governance: the new wave of climate change litigation," *Initiative on Climate Change Governance Reflection* 57 (2017): 10.
[146] *Thomson v. Minister for Climate Change Issues,* NZHC 733 (2017): 76.
[147] Ibid. 53.
[148] Ibid.
[149] Ibid. 65.
[150] Giulio Corsi, "A bottom-up approach to climate governance: the new wave of climate change litigation," *Initiative on Climate Change Governance Reflection* 57 (2017): 7.

5.3.2. Case

Before the High Court of New Zealand, Thomson challenged the government on both its goals set under the 2002 Act, as well as its published NDC under the Paris Agreement and UNFCCC. Particular to this case, is that the court put significant emphasis on the question of justiciability of climate change policy. The court made elaborate reference to five cases in particular: 1) *Massachusetts v. Environmental Protection Agency* (United States, 2007)*;* 2) *Juliana v. The United States* (2016); 3) *Friends of the Earth v. Canada* (20090;4) *ClientEarth v. Secretary of State* (United Kingdom, 2015); and 5) *Urgenda v. The State of The Netherlands* (2016).[151] Particularly, the inclusion of the Urgenda case is an interesting because, as previously noted, the Netherlands observes a monist civil law system, whilst New Zealand judiciary follows a dualist common law system. This demonstrates the international impacts of climate change litigation, may even transgresses various legal systems. Drawing upon the five aforementioned cases, the High Court decided on the justiciability of climate change policy. The High Court noted that, although all five cases differed from the case at hand, the cases: "illustrate that it may be appropriate for domestic courts to play a role in Government decision making about climate change policy."[152] The High Court further highlighted that all of the courts in the five mentioned cases: "have held they have a proper role to play in Government decision making on this topic, while emphasising that there are constitutional limits in how far that role may extend."[153] Additionally, the High Court emphasised the role of the courts to ensure appropriate action is undertaken by governments, while leaving the content of policy exclusively to the political realm; a nod to the notion of Parliamentary supremacy within New Zealand's judicial system .

The High Court then assessed Thomson's challenges to New Zealand's climate change policy. The Court found particular merit in the claim that the minister failed to consider revising New Zealand's GHG emission target for 2050 after the publication of the IPCCs Fifth Assessment Report. At the time of the verdict, however, a general election had recently taken place in New

[151] *Thomson v. Minister for Climate Change Issues,* NZHC 733 (2017): 112-134.
[152] Ibid. 133.
[153] Ibid.

Zealand. The 2017 election, in which climate change policy featured prominently, resulted in a victory for the opposition Labour Party, who formed a government partially via a confidence and supply agreement with the environmentalist New Zealand Green Party. The new coalition government pledged to strive to obtain a nett-zero in GHG emissions by 2050 and change New Zealand's GHG emission reduction targets accordingly.[154] This made exploring this argument further a hypothetical exercise and the High Court declined to rule in favour of Thomson's challenge.[155] Crucially, however, it is important to note that the court found that it had the judicial standing to rule over this matter.

Regarding Thomson's second challenge, the court was not convinced that the Minister had made detectable errors which may have caused for the court to intervene.[156] The reason for this conclusion is that New Zealand, under its national targets, remains free to do more than it has pledged in its NDC under the Paris Agreement.[157] The court, therefore, could not conclude that the pledged reduction ran counter the New Zealand's national climate change ambitions.[158]

5.4. Juliana et al. v. The United States

5.4.1. Background

For its last case study, this paper will inquire into court case from the United States, which is home to the large majority of climate change litigation.[159] Most of these cases concern claims of individuals against private companies – often oil companies. Out of these 1143 climate change related cases, Juliana v. The United States stands out because: 1) the plaintiffs challenge the federal government directly and 2) they do so under American constitutional law.[160] The Juliana case

[154] *Thomson v. Minister for Climate Change Issues,* NZHC 733 (2017): 98.
[155] Ibid. 98.
[156] Ibid. 179.
[157] Ibid.
[158] Ibid.
[159] Elisa de Wit, Sonali Seneviratne, Huw Calford, "Climate change litigation update," *Norton Rose Fulbright Publications* (2020), https://www.nortonrosefulbright.com/en/knowledge/publications/7d58ae66/climate-change-litigation-update, accessed 02-05-2020.
[160] Hillary Aidun and Malia Libby, "Juliana in the World: Comparing the Ninth Circuit's Decision to Foreign Rights-Based Climate Litigation," *Columbia Law School: Climate Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/13/juliana-in-the-world-comparing-the-ninth-circuits-decision-to-foreign-rights-based-climate-litigation/, accessed 08-05-2020.

originated from twenty-one US citizens aged eight to nineteen, who jointly sued the US government because of its direct policy of continuing to "permit, authorize, and subsidize" the use fossil fuels as well as industries related to it.[161] They argued that this conduct by the federal government – aware of the implications of rising CO_2 levels to the environment – violated their right to a 'climate system capable of sustaining human life,' which they argued to be a constitutional right.[162] Moreover, in Juliana, the plaintiffs demanded a ruling which would require the government to create a strategy for the elimination of GHG emissions form fossil fuels and actively labour for the restoration of atmospheric CO_2 equivalent levels to its preindustrial standard.[163] In the original case, put to the District Court of Oregon, the judge considered access to a clean environment a fundamental right. When the case was not dismissed in court, *Juliana v. The United States* became the subject of much (inter)national media attention.[164] The government filed with the Court of Appeal of the Ninth Circuit, which evaluated the entire case.

5.4.2. Case

The Ninth Circuit Court agreed with the plaintiffs that human climate change was occurring and that its impacts are potentially devastating for the plaintiffs specifically, and the American people in general.[165] The court noted that: "copious expert evidence established that the unprecedented rise in atmospheric carbon dioxide levels stemmed from fossil fuel combustion and will wreak havoc on the Earth's climate if unchecked."[166] Moreover, it explored the link between climate change and government conduct. The Ninth Circuit court found not only that government inaction contribution to GHG emissions and subsequent climate change. It outlined that the government's policy actively contributed to the GHG emissions. In other words, it established a direct causal link

[161] *Juliana et al. v. The United States*, 9th Cir. 18-36082 (2020): 4.
[162] Anthony Reed, "Juliana v. United States," *Public Land & Resources Law Review* 10 (2020): 1.
[163] Ibid.
[164] Michael Burger and Jessica Wentz, ""The Trial of the Century": A Proview of how Climate Science Could Play Out in the Courtroom, Courtesy of Juliana v. United States," *Columbia Law School: Climate Law Blog* (2019), http://blogs.law.columbia.edu/climatechange/2019/01/07/the-trial-of-the-century-a-preview-of-how-climate-science-could-play-out-in-the-courtroom-courtesy-of-juliana-v-united-states/, accessed 12-05-2020.
[165] *Juliana et al. v. The United States*, 9th Cir. 18-36082 (2020): 4-5.
[166] Ibid. 4.

between the policy of the federal government and global warming. Therefore, the court also examined whether the plaintiffs were personally affected by climate change. The government argued that this could never be the case, because the implications of climate change affect everyone equally. Moreover, as the harm is general and not particular, the plaintiffs could not claim individual harm according to the US government. The court did not follow this line of argumentation. Rather, building upon established US case law, the court concluded that: "[T]he fact that a harm is widely shared does not necessarily render it a generalized grievance."[167] In contradicting the government's line of argumentation, the court established that the harm claimed by the plaintiffs was legitimate and personal.[168]

At the time of the conclusion of the Juliana case, various courts around the world had seen similar cases. Some courts urged national governments to change policies when the claimants successfully demonstrated their rights were infringed upon by government conduct with regard to climate change. An example of this is the Dutch Urgenda case. Other courts, however, declined to provide redress arguing that the government had correctly applied its discretion.[169] This occurred with the second claim in the Thomson case analysed in the previous section. The court in the Juliana case did neither. The majority held that the relief sought by the plaintiffs could not be granted, despite the fact that the executive and legislative branches of government have: "long promoted fossil fuel use despite knowing that it can cause catastrophic climate change, and that failure to change existing policy may hasten an environmental apocalypse."[170] In spite of the courts condemnation of standing government policy, it concluded that the challenges of the plaintiffs had to fail because the harm incurred was not able to be redressed by the court. It argued that to

[167] *Juliana et al. v. The United States*, 9th Cir. 18-36082 (2020): 19.
[168] Margaret Peloso, Lindsay Hall and Austin Pierce, "Juliana v. United States - Another Climate Case Dismissed as Nonjusticiable," *Lexology* (2020), https://www.lexology.com/library/detail.aspx?g=29e78359-c512-42d7-b797-8fb8e4ff2d3a, accessed 12-05-2020.
[169] Hillary Aidun and Malia Libby, "Juliana in the World: Comparing the Ninth Circuit's Decision to Foreign Rights-Based Climate Litigation," *Columbia Law School: Climate Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/13/juliana-in-the-world-comparing-the-ninth-circuits-decision-to-foreign-rights-based-climate-litigation/, accessed 08-05-2020.
[170] Ibid.

properly grant relief, the court had to formulate a policy and consistently review the implementation of that policy over the following decades. This, the court continued, would logically fall outside of this scope of the US legal system and be a breach of the US' separation of powers. Hence, it "reluctantly concluded that the plaintiffs' case must be made to the political branches or to the electorate at large."[171]

[171] *Juliana et al. v. The United States*, 9th Cir. 18-36082 (2020).

6. Judicial Securitization

Having analysed the cases in depth in the previous chapter, this study will now place its findings in a broader perspective. This chapter outlines *Judicial Securitization* as a new understanding of the ongoing phenomena identified in the previous chapters. Concretely, this will be done by firstly outlining the shared characteristics of the analysed cases. Hereafter, the chapter will briefly link these cases to broader international developments to display the international relevance. Then, this study will tie the common factors of this study together with the literature on securitization theory and wicked problems. It will do so by developing an understanding of the ongoing phenomenon, which is best identified under the name of judicial securitization.

6.1. Analysis of the Case Studies

In the first subsection of this chapter, this study will distil common factors from the four case studies. The four studies under scrutiny were conducted in different legal systems, different areas of law, and dissimilar circumstances. Given the differences between the case studies, similarities are especially interesting, as they might indicate more general trends in climate change litigation.

This section will compare the case studies on four carefully chosen factors. These factors are included in the study because they represent phenomena relating to different aspects of the research question as well as different stages in the litigation process. The first factor outlines whether courts consider climate change policy a matter they can rule upon. This forms the most fundamental part of climate litigation. The second factor, concerns the extent to which foreign jurisprudence has been taken into account in the court case. The inclusion of this factor is important to understand whether we can see the role of the judiciary in climate change policy as a global development. The outcome of the court case is the third factor the case studies are assessed upon. This factor will be assessed by whether or not the court's judgement was in support of a more rigorous climate change policy. As a last factor, the impact of the court's ruling will be assessed by outlining statements by government as well as whether policy changes occurred.

6.1.1. Justiciability

All four case studies put significant emphasis on the question of justiciability. In elaborate sections of the judgement, the courts explained whether climate policy could be a matter for courts to adjudicate on. The cases in the Netherlands, New Zealand, and the UK all found that courts can rule on climate change policy. The Court of Appeals of the Ninth Circuit in the US found the matter non-justiciable, particularly because it did not foresee a role for the judiciary in designing and reviewing mechanisms for mitigating climate change. This was seen as overstepping the separation of powers. A crucial factor for justiciability appears to be specificity.[172] In the Netherlands and New Zealand, the court had to consider specific targets and the validity thereof; in the UK the court could test whether or not the Paris Agreement needed to be included. These matters are of a concrete nature, because of which the courts feel enabled to rule on climate change policy. In the US, however, the plaintiffs wanted a reversal of overall US policy regarding climate change. This lacks specificity and hence it becomes problematic for any court to adjudicate on it properly.

6.1.2. Embeddedness in international developments

The cases in the Netherlands and New Zealand are strongly embedded in international legal developments. Particularly in New Zealand, extensive reference was made to four other climate change cases – including the Urgenda and Juliana cases. The Dutch Supreme Court made reference to a ruling in the American Supreme Court as well as jurisprudence in front of European Court of Human Rights. The London Heathrow case in the UK drew extensively upon cases in front of the Court of the European Union. Moreover, all three extensively reviewed their respective country's commitments under the Paris Agreement, Kyoto Protocol and the UNFCCC in general. Juliana v. The United States stands out, because it makes no reference to any jurisprudence outside of the US. Moreover, it made no reference to international treaties – which is a logical effect of the fact

[172] Paolo Davide Farah, "Urgenda vs. Juliana: Lessons for Future Climate Change Litigation Cases," *UCLA Symposium on Human Rights and the Climate Crisis* (2020): 1.

that, with the exception of the UFCCC, the US is no party to those agreements. This also represents the fact that the US judicial system attaches less value to international legal developments.[173]

6.1.3. Outcome

In terms of the exact rulings, the case studies differ significantly. In the Netherlands, the court actively changed the country's binding GHG reduction target and ordered the government to reach that target by the end of 2020. In the UK, the court did not set limits on the expansion of London Heathrow Airport, but demanded that the Paris Agreement would be taken into account in the decision-making process. Moreover, it concluded that the agreement was an inherent part of the government's climate change policy, providing the Paris Agreement legal significance even though it had not been adopted as such in UK law. In New Zealand, the court would have provided an extensive ruling on the government's target, but because government policy changed as a result of elections, it did not have to do so. Significantly, all three courts concluded that they could monitor and rule on the government's climate change policies. In the US, this was not the case. The court did outline existing causal relationships between the federal government's climate change policies and individual harm. It, however, found that changing the general direction of the government's policy is a matter for politics and not for the judiciary to actively partake in.

6.1.4. *Impact*

The impacts of the rulings in the Netherlands and the UK were most apparent. In the Netherlands, the Minister for Economic Affairs and Climate had to implement a plan to further lower the country's GHG emissions. As a result of this, a coal plant was closed years before it was originally scheduled to.[174] The government also invited the Urgenda foundation to help design measures to further reduce the emission of GHGs.[175] In the UK the government announced that it would not

[173] Melissa Waters, "Justice Scalia on the Use of Foreign Law in Constitutional Interpretation: Unidirectional Monologue or Co-Constitutive Dialogue," *Tulsa Journal of Comparative & International Law* 12 (2004): 159.
[174] Niels Markus en Frank Straver, "Urgenda is tevreden over beloofde klimaatmaatregelen: 'Dappere poging van het kabinet'," *Trouw* (2020) https://www.trouw.nl/duurzaamheid-natuur/urgenda-is-tevreden-over-beloofde-klimaatmaatregelen-dappere-poging-van-het-kabinet~bf2b737b/, accessed on 23-05-2020.
[175] Ibid.

seek further expansion at London Heathrow and will need to test future large infrastructure plans to the Paris Agreement. Moreover, both rulings are likely to have strong international ripple effects, which will be outlined in more detail in the next section. The New Zealand ruling did not impact existing policy because of a change in leadership after the election. It, however, does send a clear signal to future governments that they cannot attempt to change New Zealand's climate change commitments without the potential for legal repercussions. The US ruling has the least impact of the case studies, but has been noted to potentially pave the proverbial way for future, more specific, climate change claims.[176]

6.2. Global Perspective

The in-depth analysis of the previous chapter can be placed in a larger global trend. The number of climate change related court cases is rising quickly internationally.[177] Specifically in advanced economies the amount of climate change litigation has increase to significant number. In over thirty-three countries, climate change cases have been filed. The majority are concentrated in three regions: 1) North America (1163 cases), 2) The European Union & United Kingdom (152 cases), and 3) Australia & New Zealand (123 cases).[178] Not all cases are relevant to the scope of this research, as many cases are either still pending or primarily concerned with private law. Specifically, the potential for climate change related tort claims has been an interesting development in that field – as was the case in *Smith v. Fonterra et al.* in New Zealand.[179]

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[176] Hillary Aidun and Malia Libby, "Juliana in the World: Comparing the Ninth Circuit's Decision to Foreign Rights-Based Climate Litigation," *Columbia Law School: Climate Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/13/juliana-in-the-world-comparing-the-ninth-circuits-decision-to-foreign-rights-based-climate-litigation/, accessed 08-05-2020.
[177] Elisa de Wit, Sonali Seneviratne, Huw Calford, "Climate change litigation update," *Norton Rose Fulbright Publications* (2020), https://www.nortonrosefulbright.com/en/knowledge/publications/7d58ae66/climate-change-litigation-update, accessed 02-05-2020.
[178] Ibid.
[179] Daniel Metzger and Hillary Aidun, "Marjor Developments in International Climate Litigation in Early 2020," *Columbia Law School: Climate Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/12/major-developments-in-international-climate-litigation-in-early-2020/, accessed 20-04-2020.

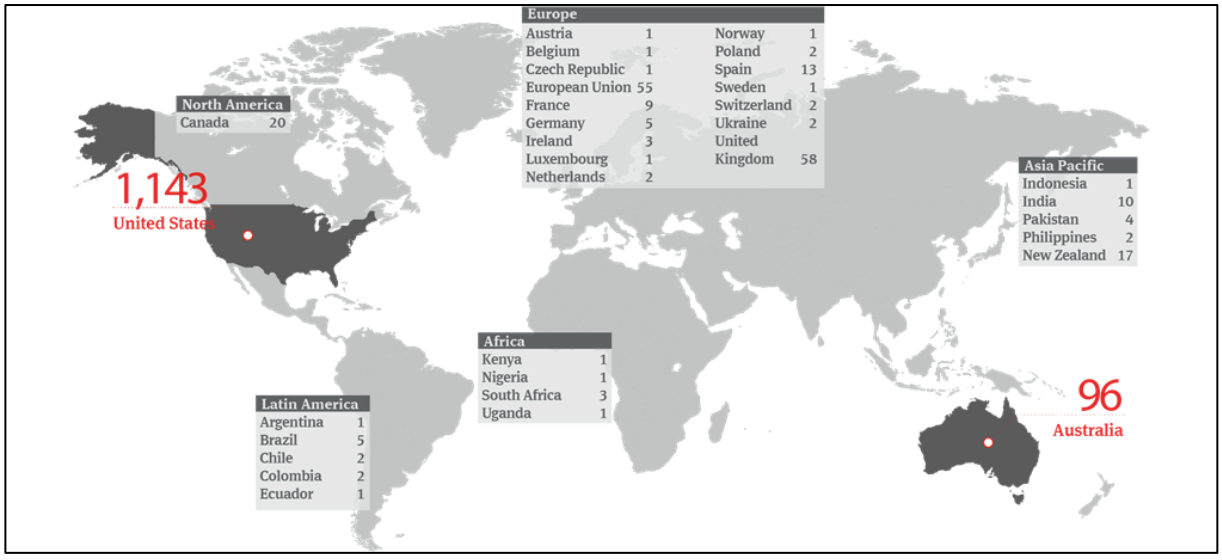

Figure 3: Distribution of Climate Change Litigation Worldwide[180]

However, various cases have been concerned with government responsibility primarily. The environmental groups often responsible for bringing these climate change cases to court communicate with each other, exchanging best practices and strategies to hold their governments to account. This has for instance happened with the *Klimaatzaak* in Belgium, which has drawn elaborately on the Urgenda case.[181] However, not only do these cases have a transnational impact on environmental groups, judges as well observe international developments curiously. It is in this light that particularly the Urgenda and London Heathrow cases analysed in the last chapter are most relevant. These cases were both ground-breaking rulings nationally and are likely to have an international impact. In Ireland, multiple references to the Urgenda proceedings were made in a similar lawsuit which was, because of its importance, granted to appeal directly to the Supreme Court of Ireland.[182] The Heathrow and Thomson cases will likely be observed closely in other commonwealth countries in regards to the domestic legal status of the Paris Agreement and the

[180] Daniel Metzger and Hillary Aidun, "Marjor Developments in International Climate Litigation in Early 2020," *Columbia Law School: Climate Law Blog* (2020), http://blogs.law.columbia.edu/climatechange/2020/03/12/major-developments-in-international-climate-litigation-in-early-2020/, accessed 20-04-2020.
[181] De Klimaatzaak, "Nederland Leert ons dat het Kán," *De Rechtzaak* (2020), https://www.klimaatzaak.eu/nl, accessed on 12-05-2020.
[182] *Friends of the Irish Environment CLG v. The Government of Ireland*, IEHC 747 (2019): 5, 63, 76, 135.

potential for large infrastructure projects to fail in the future when climate change considerations are not taken into account adequately.

6.3. A New Understanding: *Judicial Securitization*

In this last sub-section, one task remains for this study: providing a generalisable theory of the role of the judiciary in securitization. As this paper has shown in previous chapters, climate change can be conceived of as a wicked problem – a problem characterised as having a high complexity, uncertainty, and divergence. Moreover, the transnational nature of climate change makes the question of national responsibility a difficult one. These characteristics make it difficult for governments to create policies capable of tackling climate change. Despite widespread securitization of human induced climate change, governments are not nearly doing enough to keep global warming within ranges that are considered relatively safe. Even reaching targets agreed upon internationally - sometimes even enshrined in domestic legislation - appears difficult for many liberal democratic states. The 'wicked' characteristics of the problem of climate change appear to render governments unable to provide the leadership otherwise provided in times of (inter)national crisis. As a consequence, the securitization of climate change does not have the effects one would normally observe. Schematically, this can be illustrated by the figure shown below:

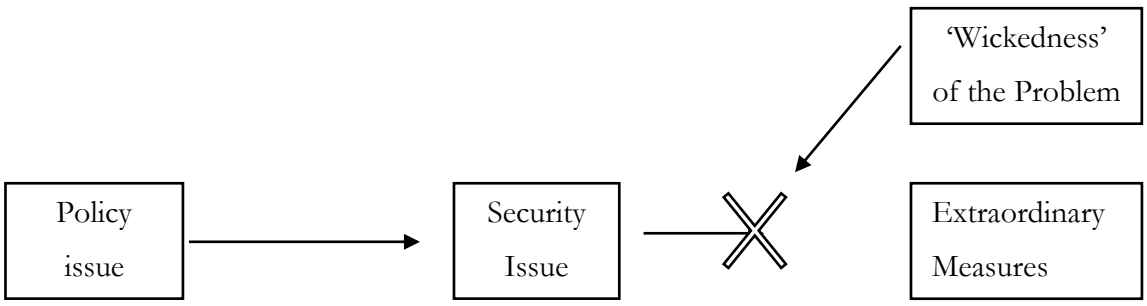

Figure 5: Schematic representation of the securitization of climate change

This is where the judiciary plays a vital role in safeguarding the process of securitization. In a situation in which governments provide goals for their policy but consistently fail to live up their own ambitions – thereby putting their own citizens at risk – the judiciary plays a vital role in making

the responsibilities of the government enforceable. This does not mean formulating policy options, which would breach any standard with regard to the separation of powers, but rather entails holding the government to its own formulated policy targets. As seen in the case studies, courts can transform a fuzzy set of responsibilities and targets to clear and comprehensible duties. By providing clarity and enforceability of the specific responsibility of governments, the judiciary effectively makes a transnational phenomenon into a national problem. This provides governments with clear borders within which it ought to operate. The wickedness of the problem is thus reduced, such as schematically outlined in figure 6:

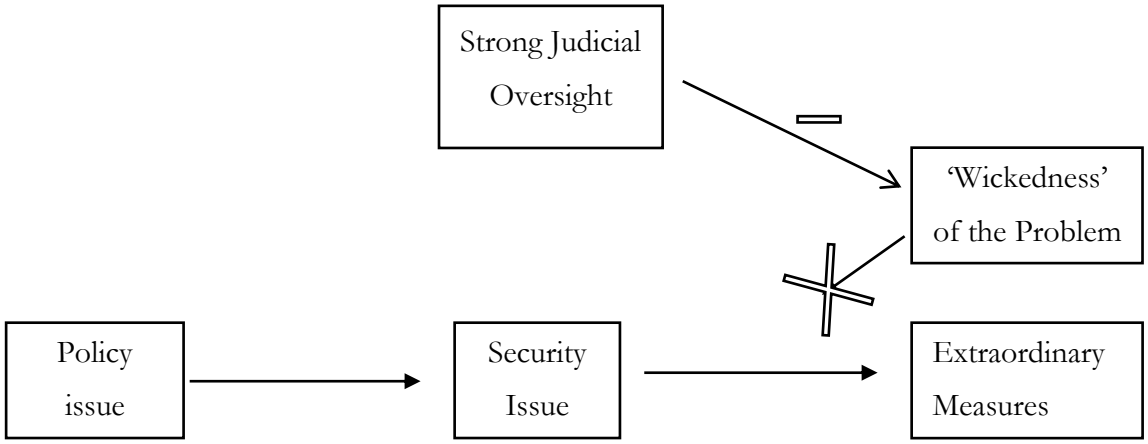

Figure 6: Schematic representation of judicial securitization

The reduction of the wickedness of the problem results in the fact that governments can make focussed policy, aimed at reaching clear and enforceable targets. Due to proper safeguarding of governments' climate change commitments, the judiciary guarantees that the government can take concrete action. This allows for the mechanism of securitization to follow its standard trajectory. This understanding of the role of the judiciary is not present in existing academic literature. This 'theory of judicial securitization', is this paper's contribution to ongoing research into the climate change and security. It provides a better understanding of a matter currently still understudied. moreover, judicial securitization allows for an understanding of a factors crucial to the successful securitization of climate change.

7. Conclusion

In the past chapters this paper has sought to combine insights from the security field with international legal developments to understand more properly the role played by the judiciary concerning climate change policy. Three sub-questions were formulated to help guide this paper in answering its research question. This conclusion will therefore first revisit its answers to these sub-questions before answering its research question.

With regard to its first question – *Do governments take sufficient mitigating action with regards to climate change?* – this paper found that in spite of widespread securitization of climate change in advanced economies, on average governments of these countries are troubled to take sufficient mitigating measures. Moreover, various factors can aid the explanation why climate change does not see sufficient government action, but its status as a 'wicked problem' is generally recognised as an important factor it the explanation why governments fail to take measures.

Chapter Five interacted with the second sub-question. This question reads: *How do judicial systems in liberal democratic states respond to government inaction in the field of climate change?* In analysing four vastly different case studies it found that in all cases the courts commented on the government's climate policy and foresaw a causal link between climate policy, climate change, and the wellbeing of citizens. Moreover, it found that when climate change cases formulate clear challenges concerning precise data or remedial action, courts are willing to hold the government to account for its insufficient action.

The last sub-question was the following: *How can we understand the role of the judiciary in a broader theory on climate change and Securitization?* In Chapter Six, this paper outlined common factors from the four case studies. It connected these common factors with the global developments on climate change litigation. The study displayed that climate change litigation is a transnational effort, in which judiciaries worldwide observe developments in other countries closely. The study then proceeded to outline an understanding of 'judicial Securitization'; a situation in which the judiciary

formulates clear boundaries for the government to facilitate it to undertake the security measures required for with securitized phenomenon.

Having outlined the answers to the sub-questions, this paper can proceed to its final undertaking; answering the research question. This study was designed to answer to following question: *How can we understand the role played by the judiciary in encouraging liberal democratic states abide by their climate change commitments?* Drawing upon the answers to the sub-questions, this study concludes the following. The role of the judiciary in liberal democratic states vis-à-vis climate change policy is a particular one. As with other policy realms, courts have the responsibility to hold the government to account when it acts in contradiction to its own rules or policies, or when it violates the rights of its citizens. Climate change policy was a field in which such strong judicial oversight was not present before, as indicated by the effort courts put into explaining the justiciability of the matter. Moreover, such oversight is crucial to climate change policies. Governments have trouble 'solving' the wicked problem and take sufficient action. In this study it became apparent that government policy benefits from such rulings, as they reduce the 'wickedness' of climate change policy by making the national responsibilities and target clearer. For similar reasons, governments have welcomed outcomes in climate change litigation, even when these outcomes defeated the original government position. By reducing the wickedness, the judiciary allows for 'normal' securitization mechanism to occur, safeguarding effective climate change policy, ultimately enhancing the security of people all over the world.

The advancements of climate change litigation do not exclusively relate to national litigation. Albeit outside the scope of this research, it is import to highlight in this conclusion the potentially important role of the international court system. Developments in this area are inquiries to the usefulness of either a ruling or advisory opinion by the International Court of Justice on the responsibility of large emitters of GHGs to states directly threatened by climate change – such as the small island states of the Pacific. Concerning criminal international law, a push has been made for the inclusion of 'crimes against the environment' as a category under the Rome Statute. These

developments can have a profound impact on the role of international courts on climate change policy and might strengthen international accountability. As mentioned, the precise substance of this matter was outside the scope of this research. However, the understanding of the role of the judiciary in the securitization of climate change, as provided in this paper, can also aid our collective understanding of the role of the international judicial system. This particular matter does, at this point, require further academic scrutiny.

The current developments in climate change litigation are still ongoing. Many cases inspired by the success of Urgenda are still in process. The outcomes of these cases will ultimately strengthen or weaken the described process of judicial securitization in the future, particularly as courts worldwide observe other's rulings on this matter. Further research should be dedicated to this matter. Moreover, additional research should be conducted into the effects of such climate change rulings on government policy in the long run. Hopefully, this study can pave the way for further interdisciplinary academic inquiries into the matter of climate change litigation.

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